# \*\*\*Backstopping DA\*\*\*

## 1NC Shell

#### **High oil prices are driving investment and growth in renewables**

Armstrong 2011

[Dan, Higher oil prices spur production of renewable energy resources, T Magazine, Ernst & Young, <http://tmagazine.ey.com/insights/higher-oil-prices-spur-production-of-renewable-energy-sources/>, accessed 7-14, ACS)

The past year has marked a watershed in R&D spending on alternative energy. Surging oil prices, aggressive government policies and plummeting manufacturing costs came together to create exponential growth – albeit from a low base – in power generated from non-traditional sources. New challenges also emerged: fiscal austerity forced some governments to scale back incentives, while power demand in emerging markets, particularly China, led to a modern-day coal rush. Yet the acceleration of solar and wind power, the take-off in electric vehicles and high levels of investment suggest that the era of fossil fuels is coming to a close – not tomorrow or next year, but within the lifetimes of much of the world’s population. More than 60 countries – including every nation in Europe as well as provincial governments from Ontario to Rajasthan – have established incentives to drive investment in alternative energy. According to HSBC, governments around the world, led by China and the US, have allocated over US$430b in spending for green investment themes. Sweden has announced that it intends to be 100% carbon-neutral by 2050, power all cars with renewables by 2030 and heat the country using no fossil fuels by 2020 – and so far it is ahead of schedule. Meanwhile, the EU has set a goal of 20% reliance on renewables nine years from now and is considering a goal of 45% by 2030. California is aiming higher: 33% reliance on renewables by 2020.

#### **(Insert Link – The plan reduces oil prices)**

#### Quick drop in US consumption of oil causes prices to bottom out, centralizes energy power in Middle East oil, turns the case

Carey, 3

(John, 2/23, Senior Correspondent in BusinessWeek’s Washington bureau, Bloomberg Businessweek, “Taming the Oil Beast,” <http://www.businessweek.com/stories/2003-02-23/taming-the-oil-beast>, Accessed: 7/4/12, GJV)

Yet reducing oil use has to be done judiciously. A drastic or abrupt drop in demand could even be counterproductive. Why? Because even a very small change in capacity or demand "can bring big swings in price," explains Rajeev Dhawan, director of the Economic Forecasting Center at Georgia State University's Robinson College of Business. For instance, the slowdown in Asia in the mid-1990s reduced demand only by about 1.5 million bbl. a day, but it caused oil prices to plunge to near $10 a barrel. So today, if the U.S. succeeded in abruptly curbing demand for oil, prices would plummet. Higher-cost producers such as Russia and the U.S. would either have to sell oil at a big loss or stand on the sidelines. The effect would be to concentrate power--you guessed it--in the hands of Middle Eastern nations, the lowest-cost producers and holders of two-thirds of the known oil reserves. That's why flawed energy policies, such as trying to override market forces by rushing to expand supplies or mandating big fuel efficiency gains, could do harm.

#### **Also tanks the global economy**

Nelder 9 (Chris, Energy Futurist/Analyst/Writer, 3/4/09,Energy and Capital, The Sleeping Threat of Low Oil Prices, <http://www.energyandcapital.com/articles/oil-prices-opec/838>) DD

If you need any more proof that the markets are not an efficient discounting mechanism, look no further than the price of oil. Oil prices in the high $30s to low $40s are nothing short of a ticking time bomb under the world economy, but you wouldn't know it from watching the commodity markets. Once the global downturn slashed $100 off the price of a barrel, the issue of oil supply seemed to simply fall off the radar of market observers. Falling oil demand is all that anyone seems to care about, but we may pay dearly for taking our eye off the ball of supply.

## Uniqueness – Renewable transition now

### Transition to Renewables now

#### Rapid growth in renewables now

Ellis 7-10-12

[Vicki, “Rapid Growth” in store for renewables, Energy Live News, <http://www.energylivenews.com/2012/07/10/%E2%80%9Crapid-growth%E2%80%9D-in-store-for-renewables/>, accessed 7-14, ACS]

Renewable power generation is expected to have “rapid growth” over the next five years according to a new International Energy Agency report which predicts the coming-of-age of the sector. Despite economic uncertainties in many countries, the report says, global power generation from hydropower, solar, wind and other renewable sources is projected to increase by more than 40% to almost 6 400 terawatt hours (TWh). That’s roughly one-and-a-half times current electricity production in the United States. Maria van der Hoeven, the IEA’s Executive Director said: “Renewable energy is expanding rapidly as technologies mature, with deployment transitioning from support-driven markets to new and potentially more competitive segments in many countries.” The Agency’s first-ever Medium-Term Renewable Energy Market Report looked at 15 key markets for renewable energy, which currently represent about 80% of renewable generation.

#### Renewables transition now

The Pembina Institute, no date

(Renewable energy, The Global Energy Transition, <http://www.pembina.org/re/global>, accessed 7-14, ACS)

A global transition to renewable energy is already underway. Renewable energy offers an alternative to conventional sources and grants us greater control over future energy prices and supply. Individuals, businesses, and communities can meet their energy needs through local, distributed energy production that provides additional economic benefits including jobs and community development. Public and private sector investment in renewable energy is growing rapidly. Increased awareness of renewable energy opportunities and government policies supportive of renewable energy development are helping to speed this transition to a sustainable energy future. Examples of supportive policies and innovative financing solutions from countries around the world provide examples and opportunities for Canada to pursue.

#### Transition to renewables is underway, but federal policies that alter oil prices will damage prospects

Blair, Kay, and Howe, CaRDI, 2011

[Adam, David, and Rod, Transitioning to Renewable Energy: Development Opportunities and Concerns for Rural America RUPRI Rural Futures Lab Foundation Paper No. 2, Community and Regional Development Institute (CaRDI) Cornell University July 2011, p. 5-6]

Americans appear to be on an inevitable cusp of change. Even short-term projections past the economic sluggishness that persists in 2011 foresee increasing oil scarcity leading to increased liquid fuel costs.2 Such analyses suggest that the systems of commerce, transportation, and land use settlement that evolved under twentieth century conditions of low cost transportation fuels will come under increasing stress. Climate change debates, in particular, are increasingly reshaping the contours of tension between environment, economy, equity, and energy policy. Awareness of U.S. dependence on imported oil is longstanding. Yet our current transportation system remains overwhelmingly based on oil. Fossil fuels more generally remain the dominant source of energy for our other major consuming sectors: residential, commercial, and industrial. Nevertheless, in recent years, the need to respond constructively to problems associated with our nation’s continuing dependence on oil, domestic but polluting coal, and other nonrenewable fossil fuels has again seemed more urgent. Concern about reducing carbon emissions has in particular focused new attention on replacing the leading role coal plays in electricity production. Renewable energy use is already increasing rapidly and will undoubtedly play a growing role in meeting future energy needs. However, the speed with which this will and should happen is contested, remains contingent, and is in any event policy dependent. In general it is clear that a rapid increase in the supply of renewables is possible and indeed already underway. What is much less clear is how far and fast a truly systemic transition can take place. The issues and promise of renewable energy are inextricably tied to the parallel issues and promise associated with the alternatives.

#### Renewables will account for 50% of energy use by 2035

Blair, Kay, and Howe, CaRDI, 2011

[Adam, David, and Rod, Transitioning to Renewable Energy: Development Opportunities and Concerns for Rural America RUPRI Rural Futures Lab Foundation Paper No. 2, Community and Regional Development Institute (CaRDI) Cornell University July 2011, p. 12-13]

How long will it take to transition to renewables? No one can answer this question definitively. But it is clear that a critical factor to consider in energy transitions is the importance of the pace and scale of change. How rapid do careful observers anticipate a transition might be, and under what conditions? A recent report by the National Academy of Sciences (2010, p. 6) projects that favorable circumstances and policy would likely allow renewables to more than double in importance and generate up to 20% of the nation’s electricity needs by 2020 (a more rapid transition than in the EIA projection cited above). To reach further, beyond a 50% supply sometime after 2035, would be feasible but require both “scientific advances… and dramatic changes in how we generate, transmit and use energy.” Despite the apparent authority behind these predictions, others provide starkly contrasting, though not necessarily mutually incompatible, windows into the future. Thus glass-half-full analysts have suggested that a plan to supply, “100% of the world’s energy, for all purposes” by wind, water and solar resources Transitioning to Renewable Energy 13 by 2030 does not face ‘an insurmountable hurdle’” (Jacobsen and Delucchi, 2009, p. 58), while a glass-half-empty analyst cautions more forebodingly that, “renewable energy \*alone+ cannot sustain a consumer society” (Trainer, 2007). Almost by definition, much more change is possible over longer time periods—counted in generations, amortization and investment lifecycles, forest regeneration timelines, and the like, than can occur over time frames measured by the return on investment timeframes of private sector investors or the election cycles of the public sector. The debate over the effects of energy use and greenhouse gas emissions is but one salient example: complex energy and climate systems simply cannot be transformed wholesale overnight, no matter how strong the will to do so. On the other hand, many familiar and important social, technological, and economic changes have happened relatively quickly. There are many examples of rapid adoption and diffusion of technology, for example, generally driven by a combination of technological improvements, markets, and policy (including security policy) forces. A post-war sampling includes microcomputers, automobiles, telephones, cell phones, and the Green Revolution in agriculture. Infrastructure examples include the Internet, the interstate highway system, rural electrification, and rural broadband. Yet the continuing lack of adequate access in many rural areas to broadband, and the long time frame and focused policy it took to fully electrify rural areas, strike cautionary notes for rural America. Experience suggests that attention needs to be also paid to the relation between rural public policy and private sector investment. This caution is also a salient reminder that energy transitions tend to be uneven, raising a variety of equity issues about divisions between regions, rural and urban places, and rich and poor.

### Oil companies investing in Renewables

#### Oil companies are involved in developing renewable energy now

McLamb 11 (Eric, CEO and Founder of the Ecology Communications Group, "Fossil Fuels vs. Renewable Energy Resources," 9-6, http://www.ecology.com/2011/09/06/fossil-fuels-vs-renewable-energy-resources/)

The oil, coal and natural gas companies know these are serious problems. But until our renewable energy sources become more viable as major energy providers, the only alternative for our global population is for these companies to continue tapping into the fossil fuel reserves to meet our energy needs. And you can pretty much count on these companies being there providing energy from renewable sources when the fossil fuels are depleted. Many oil companies, for example, are involved in the development of more reliable renewable energy technologies. For example, British Petroleum Company, today known as BP, has become one of the world’s leading providers of solar energy through its BP Solar division, a business that they are planning on eclipsing their oil production business in the near future.

#### Oil companies invest in renewable energy

Cekerevac 7-2 (Sasha, BA in Economics with Finance specialization, Senior Editor at Lombardi Financial," http://www.investmentcontrarians.com/stock-market/investing-in-green-energy-through-big-oil/262/)

But the shocker for many is that some of the leaders in green energy development have been oil stocks, such as BP p.l.c. (NYSE/BP). Oil stocks have spent billions of dollars on green energy initiatives. BP, for one, has invested over $7.0 billion since 2005. While some might think this is just a PR stunt, I disagree. The truth is that oil stocks like BP see the potential for large corporate profits over the next century. While corporate profits through oil production have been significant, even firms like BP know there’s a limit to how much they can extract. It’s just common sense to use the corporate profits from oil to develop new green energy sources. Since 2005, the BP Alternative Energy division has grown from just a couple of employees to 5,000 currently. The hunt for corporate profits involves biofuel, wind or solar energy, and any other possible avenue to generate green energy. All of life is based on incentives, and the drive to increase corporate profits is the purest of all. Without this drive, we would be nowhere near as technologically advanced as we are today. Oil stocks should not be reprimanded for their hunt for corporate profits. This is the goal of everyone in business, from a large organization to a small business owner. Without corporate profits, you have no business and no economy. Everything we have in this world, from cars, to skyscrapers, to air conditioning, has come from one source: the drive to generate corporate profits. Don’t applaud an ice cream maker and then denigrate oil stocks just because you don’t like the product. The market is the truth.

## Renewables

### High Oil Prices spur Renewable Energy

#### High oil prices are driving a shift to renewables

U.S. Department of Transportation 2008

(U.S. Department of Transportation, 8-2008, U.S. Department of Transportation, “Impact of High Oil Prices on Freight Transportation: Modal Shift Potential in Five Corridors Technical Report,” <http://www.marad.dot.gov/documents/Modal_Shift_Study_-_Technical_Report.pdf>, 7-10-12, GHK)

In the short run, higher oil prices will undoubtedly have an impact on the rate of growth of the global economy, as oil has such a significant role as a factor of production in agriculture, basic raw materials, manufactured products, and service industries. For agriculture, oil impacts as much as 20-50 percent of total costs, for raw material industries 20-30 percent, for manufacturing industries 10-20 percent, and for service industries 5-10 percent.4 However, while increased oil prices will slow the growth, and in the short term may limit or cut production, there are in many cases a wide range of substitutes for oil that could replace oil given time. For example, in the generation of power, the electricity supply can within the short or medium term switch from oil to natural gas, coal, nuclear, solar, and even wind alternatives. In addition, a range of conservation measures may be applied on the demand side. Changing to these new fuel sources will allow the production and consumption markets to expand after a short-term hiatus. As a result, oil will tend to become more focused into specific “products” such as, fertilizers for agriculture, or feed stock for plastics and chemicals as low cost substitutes will be harder to develop in the short and medium term (0-10 years) in these areas. In the longer term (10-15 years)5 liquefied coal or cellulose-based alternatives (e.g., bioplastics) will likely be developed that can substitute for oil. Overall, therefore, while the prices of today may be moderated by substitution, the worldwide expanding demand for oil is likely to be a consistently upward pressure on oil prices, and result in oil prices stabilizing at far higher levels than were experienced in the 1990’s or before 2005. This will result in a short or even medium downturn in the U.S. and world economies shaving 1 or 2 percentage points per year off U.S. GDP.

#### Alternative energy growth now- high oil prices key

NASDAQ 6-28 ("Alternative Energy Stock Outlook - June 2012 - Industry Outlook," http://community.nasdaq.com/News/2012-06/alternative-energy-stock-outlook-june-2012-industry-outlook.aspx?storyid=152050)

Historically, the growth outlook of alternative energy companies has been directly related to the state of the economy and inversely related to the prices of petroleum products. While that relationship remains in place, other macroeconomic uncertainties are weighing on the sector's fortunes. The recent trend of lower stock prices, higher spreads on investment-grade corporate bonds, a stronger dollar and increasing financial strains in the Eurozone are contributing to a less-robust picture going forward. The bleak picture in U.S. has been offset only through increases in home prices and falling energy prices. Of the macroeconomic uncertainties, the most significant is the recent re-intensification of a Eurozone debt crisis, which has the potential to drag the global economy into another recession. The region's problems are contributing to a flight toward dollar-denominated assets that is resulting in a stronger dollar, lower yields on term Treasury securities, and declines in major European equity indices. The yield on the 10-year Treasury Note is hovering around all-time lows of around 1.5%. This has resulted in widening the spread between corporate bonds versus the treasury. Going forward, as the Fed continue to sell shorter-dated assets and uses the proceeds to buy longer-dated securities, effectively removing duration from the market, longer-dated yields will be kept lower than would otherwise be the case. As a result, we expect the 10-year Treasury note yield to hover around 2.0% in fiscal 2012, reflecting both persistent flight-to-quality effects and the impact of Operation Twist. Overall, the outlook for the U.S. economy appears to have lost momentum, with a host of variables showing weakness in the last few months. The Fed's extension of Operation Twist and downgrading of its growth outlook are reflections of this emerging unfavorable trend. That said, the expectation is that the U.S. economy will continue to expand a moderate pace, which given all problems in Europe and questions about China, has be considered a favorable outlook. Another direct fallout of the Eurozone crisis is weakness in global oil demand leading to oil prices going down. However, the blame for the southward oil prices also falls on Saudi Arabia increasing production. To add to the woe, high U.S. crude stocks and worries about China's growth outlook have been weighing on investor sentiment, weakening oil prices to a ten-month low. Partly offsetting this unfavorable view has been a tightening global supply picture in view of the geopolitical fallout over Iran's alleged nuclear ambitions and strong demand from developing countries. With a muddled home front, the question now lies largely upon the slowdown in China and the recession in Europe and the effect it will have on the U.S. growth momentum. The apparent 'decoupling' between not-so-bad U.S. prospects and a sub-par outlook abroad has nevertheless a bearing on the alternative energy sector, primarily because of restricted government spending levels. This reduced demand environment due to overburdened government finances has come at a particularly inopportune time for alternative energy operators due to the sector's supply glut. The gradually emerging solar photovoltaic (PV) industry fortunes are currently on tenterhooks. On the one hand, the core European markets of Germany, Italy and Spain historically accounting for the lion's share of solar products are fast nearing maturity. To counter this tepid growth, the companies are increasingly focusing on the Chinese, Indian and U.S. markets. However, as things currently stand, with supply growth far outstripping demand growth, and firms without deep pockets may not be able to sustain over the longer run. The pain is made acute by the steady ramping of low-cost China based players grabbing market share from the U.S. and European contenders who have a higher cost structure. On the other hand, China's new solar power tariff regime is clear pointers for investors to look beyond the near-term earnings horizon for healthier performance. The U.S. Energy Department in its monthly Short-Term Energy Outlook for June lowered its outlook for oil prices in the second half of the year from what they projected the month before. Consequently, we believe that the oil price downside will only drag downward the emerging positive alternative energy narrative. A worldwide industry association for the solar photovoltaic electricity market, the European Photovoltaic Industry Association (EPIA), forecasts that the power generated from solar modules in Europe could be competitive in relation to conventional forms of energy by the end of the current decade. The major solar markets under survey were Germany, Italy, France, Spain and Britain. A number of traditional utility companies have growing alternative energy operations. But the fortunes of some of these companies, particularly those with significant fossil-fuel exposures, are less attractive than their peers. In the utilities space, we are less optimistic about the prospects of TransAlta Corporation ( TAC ), UNS Energy Corporation ( UNS ), UIL Holdings Corporation ( UIL ), Portland General Electric Company ( POR ) and ITC Holdings Corporation ( ITC ). Conversely, favorable rate cases and stable sales growth in their respective service areas make companies like National Grid plc ( NGG ), Unitil Corporation ( UTL ), Atlantic Power Corporation ( AT ), Duke Energy Corporation ( DUK ) and NiSource Inc. ( NI ) more attractive. A major growth area in this space is solar energy. The U.S. has a lot of catching up to do, despite enormous potential, to get anywhere close to the global leaders. Solar Energy Industries Association (SEIA) is the U.S. trade association of approximately 1,100 companies in the solar energy industry. Per SEIA, in fiscal 2011, the U.S. solar energy industry grew 109% year over year to reach 1,868 MW, which represents 7% of all PV globally, up from 887 MW and 5% of global installations in 2010. According to the SEIA, this unprecedented growth was spurred in part by declining installed solar photovoltaic (PV) system prices, which fell 20% in fiscal 2011 on the back of lower component costs, improved installation efficiency, expanded financing options, and a shift toward larger systems nationwide. Per the SEIA, the U.S. solar bullishness continued in the first quarter, with new installations of 506 MW of PV, up 85% year over year. As for wind energy, per the American Wind Energy Association (AWEA), the U.S. had a total of 48,611 MW of installed wind power at the end of the first quarter of 2012. The agency is confident that future growth would be vibrant riding on friendly legislations, concern about global warming, green consumer movement and rising demand for traditional sources. According to the EPIA, the cumulative global installed PV capacity stood at almost 67.4 GW at the end of 2011, compared to only 39.7 GW at the end of 2010. The agency reports that almost 21 GW of this growth occurred in Europe. In fiscal 2011 the two biggest markets, Italy and Germany, accounted for nearly 60% of global market growth. The number of markets reaching more than 1 GW of additional capacity during fiscal 2011 rose from 3 to 6. In 2010 the top 3 markets were Germany, Italy and the Czech Republic; in 2011 Italy led, followed by Germany, China, the U.S., France and Japan, each with over 1 GW of new capacity. Here we take a look at the alternative energy space and attempt to identify this nascent industry's strengths and weaknesses. OPPORTUNITIES Environmental advantage: Solar power is the most benign electricity resource. Solar cells generate electricity without air or water emissions, noise, vibration, habitat impact or waste generation. Over time, rapid population growth, depletion of non-renewable conventional sources, and escalating pollution levels will help shape a much more pronounced global focus on renewable projects. The long-term bullishness is shared even by oil goliaths like Royal Dutch Shell plc ( RDS.A ) and BP plc ( BP ) who expect that by fiscal 2050, one-third of the global energy needs will come from renewable sources. In this space we are bullish on waste management service provider, Covanta Holding Corp. ( CVA ), which has tied the majority of its service contracts under long-term agreements with inflation escalators. Fuel risk advantage: Unlike fossil and nuclear fuels, alternative energy has no risk of fuel price volatility or delivery risk. Although there is variability in the amount and timing of sunlight in the day, season and year, a properly sized and configured system can be designed to ensure high reliability while providing a long-term, fixed-price electricity supply. In this context the one name we are bullish about is Ormat Technologies Inc. ( ORA ) which engages in the geothermal and recovered energy power business. In light of the Fukushima Daichi episode in Japan, the global focus has tilted towards solar in a big way. Germany plans to phase out nuclear power plants by 2022. This move will definitely boost solar fortunes in one of its largest global markets. Location advantage: Unlike other renewable resources such as hydroelectricity and wind power, solar power is generally located at a customer's site due to the universal availability of sunlight. As a result, solar power limits the expense and losses associated with transmission and distribution from large-scale electric plants to the end-users. For most residential consumers seeking an environment-friendly power alternative, solar power is currently the only viable choice. Environmental legislation: Alternative energy companies are increasingly benefiting from new legislation in the U.S. stipulating installation of renewable sources of electricity generation as mandated by Renewal Energy Standards (RES). As of now there are 29 states and the District of Columbia in the U.S. that have RES legislation in place. Another 8 states also have nonbinding goals for adoption of renewable energy sources. At the federal level, Congress has extended the 30% federal investment tax credit (ITC) to both residential and commercial solar installations until December 31, 2016. Also, under the American Reinvestment and Recovery Act (ARRA), the U.S. Treasury Department earlier implemented a program to issue cash grants in lieu of investment tax credit for renewable energy projects. The wind sector has also benefited significantly from the production tax credit (PTC) over the last few years. It was started in 1992 as a part of the Energy Policy Act of 1992. Subsequent to that it has received life extension of half a dozen times. In the first decade of a renewable energy facility's lifespan the PTC provides a $0.022/ kilowatt-hour investment tax credit benefit. Our favorites in this space is Juhl Wind, Inc. ( JUHL ). Subsidy programs: Governments, most notably in China, Japan, Canada, U.K., Australia, India and the Middle East, have increased their financial support for solar projects. In China, governmental authorities recently adopted a national feed-in tariff (FiT) policy for large scale alternative energy projects. China also expanded the Golden Sun Program, an upfront cost subsidy program, aimed primarily at distributed generation. In addition, according to the current draft of the 12th 5-year plan for solar energy, the government intends to raise the 2015 goal for total cumulative solar energy capacity to 15 GW and 50 GW by 2020. Owing to its Chinese focus we are keeping a close watch on Sino Clean Energy Inc. ( SCEI ) which operates as a third party commercial producer and distributor of coal-water slurry fuel. In Europe, the European Union's goal of a 20% share of renewable sources in the energy basket by 2020 will keep the flow of new projects going. Specific solar energy stocks under our coverage that stand to benefit from this environment include Ascent Solar Technologies Inc. ( ASTI ), bearing a Zacks #2 Rank (short-term Buy rating). In Australia, the solar industry is driven by several regulatory initiatives that support the installation of solar PV modules in both rooftop and free-field applications, including the federal government's nationwide Renewable Energy Target, which has set a renewable energy goal for Australia of 20% by 2020. Clean Energy Finance Corporation and Australian Renewable Energy Agency, both established in 2011, will begin implementation in 2012. In India, the National Solar Mission includes a goal of installing 22 GW of solar power by 2022. In the Middle East and Africa, several countries have announced sizeable solar targets, although policy mechanisms are not yet firmly established. In the Kingdom of Saudi Arabia, a solar policy with targets and incentives is expected in 2012. The size of the program is expected to be tens of gigawatts of solar by 2030, or as early as 2020. In the United Arab Emirates, Abu Dhabi has set a target of sourcing 7% of electricity supply from renewables by 2020. In January 2012, Dubai announced plans for a 1 GW solar farm by 2030. In Morocco, the government has set a 2 GW solar goal by 2020. Other markets such as Algeria, Egypt, Jordan, Kuwait, Oman, Qatar and Tunisia are also actively promoting solar and issuing tenders. Fortunes tied to crude: Alternative energy stock prices generally rise and fall in direct proportion to the price of crude oil. While in times of high oil prices this may present an opportunity, it also increases volatility in the sector. Per EIA, world crude consumption grew by more than 1 million barrels per day (bpd) in 2011 to a record-high level of 88.1 million bpd from 87.1 million bpd in 2010.

### Low Oil Prices hurt Renewable Energy

#### Low oil prices hurt alternative energy innovation

Fast Company 7-2 (Founded by two former *Harvard Business Review* editors. "What Happens To Clean Technology Innovation If Oil Prices Drop?," http://www.fastcoexist.com/1680107/what-happens-to-clean-technology-innovation-if-oil-prices-drop)

Peak oil, the point where world oil production reaches an apex and then begins an inexorable decline, was a cult concept until the end of the last decade, when concern about a downward spiral in oil supplies--heightened by high oil prices--reached a fever pitch and the idea that we might run out of oil reached the mainstream. In many ways, this was a good thing; it created a space for alternative energy innovation to grow. But surprisingly, a new report (PDF) from Leonard Maugeri, a former oil executive and current fellow at Harvard’s Belfer Center for Science and International Affairs, warns: "oil supply capacity is growing worldwide at such an unprecedented level that it might outpace consumption. This could lead to a glut of overproduction and a steep dip in oil prices." That dip in oil prices would mean cheaper gas, certainly, but it could put a serious damper on how far we’ve come in the search for non-fossil-fuel-based energy solutions. It’s all thanks to technology and investment in exploration by oil companies, who are increasingly using "unconventional" oil extraction techniques in shale oil fields, tight oil fields (oil fields that only make sense to drill when advanced techniques like hydraulic fracturing and horizontal drilling are used), and tar sands. In fact, says Maugeri, these techniques might allow the U.S. to be the second biggest oil producer after Saudi Arabia by 2020. Good news for our oil-powered economy? Maybe. But the environmental risks are disturbing. Maugeri admits that hydraulic fracturing, or "fracking," can cause water and land contamination, though he plays down those risks. And we’re already seeing the potential ramifications of tar sands projects in Canada. Regardless of whether or not peak oil will soon be upon us, one thing is clear: A glut in oil will be dangerous for energy innovation. And even if we have enough oil to last us until the end of time (we don’t), the climate-related ramifications of continuing to use oil at our current pace will catch up to us in the near future. This isn’t like the 1970s, where oil shocks got Americans seriously thinking about alternative energy. When that crisis ended and the country was once again awash in cheap oil after, energy innovation ground to a halt, and nobody thought twice. But if we find ourselves in a situation where oil production capacity rises by 17.6 million barrels daily until 2020 (as Maugeri predicts), chances are that energy innovation will once again slow--and unlike in the 1970s, we don’t have a relatively stable climate that allows us to delay on implementing these technologies. As MIT Technology Review explains, there is no real reason why the solar industry should be impacted by oil prices. But some people may not know that oil isn’t used much to generate electricity, lessening their enthusiasm for alternative technologies. Electric vehicle rollouts would almost definitely be directly hurt by ultra-cheap oil prices; who cares about spending tens of thousands on unfamiliar car technology when you can rely on gas-powered cars that are cheap to fill up? Some might argue that electric cars aren’t actually emissions-free since they plug into electricity sources like coal, but increasing the amount of renewable energy on the grid (something that could be threatened by an oil-price collapse) would alleviate the problem. A dip in oil prices might be nice in the short term, but there will probably be major consequences.

#### Low oil prices threaten renewable energy

Doering 7-2 (Christopher, Writer at the Gannett Washington Bureau "Gridlock in D.C. may give edge to renewables," http://www.desmoinesregister.com/article/20120702/BUSINESS01/307020017/1013/SPORTS1401/?odyssey=nav%7Chead)

The Renewable Fuel Standard has been a financial boon to the Iowa economy, creating jobs and helping to prop up corn prices. The measure, which will require 36 billion gallons of renewable fuels to be used in 2022, up from 9 billion in 2008, has been central to helping shape Iowa’s more than $20 billion renewable energy industry and making it a major financial force for the state’s economy. This year alone, the standard requires the use of 13.2 billion gallons of alternative fuels, with most of it coming from corn. Iowa is the nation’s largest ethanol producer, with 41 plants that in 2011 produced about 3.7 billion gallons. The surge in natural gas production in the United States, which has resulted in record low natural gas prices, poses a major threat to renewable energy. Natural gas prices fell to a 10-year low of $1.902 per million British thermal units twice earlier this year. But since the April low, market prices have increased 45 percent to about $2.75 per million British thermal units, reflecting strong demand from utilities and unseasonably warm temperatures across much of the country. In addition to creating a new threat to renewable fuels, the surge in new oil and natural gas production further highlights the geographical and political division between grain-dependent biofuel states in the Midwest versus the fossil fuel juggernaut of Texas.

#### Clean energy is hurt by cheap gas prices

Harvey 5-29 (Fiona, Environment Correspondent at The Guardian. "'Golden age of gas' threatens renewable energy, IEA warns," http://www.guardian.co.uk/environment/2012/may/29/gas-boom-renewables-agency-warns)

A "golden age of gas" spurred by a tripling of shale gas from fracking and other sources of unconventional gas by 2035 will stop renewable energy in its tracks if governments don't take action, the International Energy Agency has warned. Gas is now relatively abundant in some regions, thanks to the massive expansion of hydraulic fracturing – fracking – for shale gas, and in some areas the price of the fuel has fallen. The result is a threat to renewable energy, which is by comparison more expensive, in part because the greenhouse gas emissions from fossil fuels are still not taken into account in the price of energy. Fatih Birol, chief economist for the IEA, said the threat to renewables was plain: "Renewable energy may be the victim of cheap gas prices if governments do not stick to their renewable support schemes." Maria van der Hoeven, executive director of the IEA, told a conference in London: "Policy measures by governments for renewable energy have to be there for years to come, as it is not always as cost-effective as it could be." Shale gas fracking – by which dense shale rocks are blasted apart under high pressure jets of water, sand and chemicals in order to release tiny bubbles of methane trapped inside them – was virtually unknown less than ten years ago, but has rapidly become commonplace. In places like the US, the rising price of energy has made such practices economically worthwhile.

## OPEC will drop prices

### OPEC will drop prices to curb renewables

#### Oil companies such as OPEC lower prices to detract from alternative energy

Richard, 10

(Michael Graham, editor-in-chief for Treehugger, 8/17, Treehugger, “OPEC Needs Low Oil Prices Because it Keeps Alternative Energy Down,” <http://www.treehugger.com/corporate-responsibility/opec-emneedsem-low-oil-prices-because-it-keeps-alternative-energy-down.html>, Accessed: 7/9/12, GJV)

The Atlantic has a [good piece](http://www.theatlantic.com/business/archive/2010/08/why-opec-doesnt-mind-low-oil-prices/61557/) about OPEC, everybody's least-favorite cartel. It shows pretty clearly why OPEC is probably the most effective enemy of renewable energy. The way they do it is by going against their short-term interests and keeping oil prices relatively low (at least low compared to the kind of prices they could create if they choked off supply more) to assure their long-term market-share and keep alternatives to oil down.Stephen Schork, an energy industry analyst, had this to say about the situation: OPEC is more concerned about long-term market share than they are about short-term price gains. Therefore with lower oil prices, what you're actually doing is raising the entry barrier for alternative fuels. I speak with OPEC regularly, and this is consistently their main concern is about the political shift of the sentiment in the U.S. especially towards alternative fuels. The cheaper you make OPEC oil, the harder you make it to bring alternative fuels to bring on. So no, I don't think OPEC is that concerned. It's simple economics. If oil is more expensive, hybrids, plug-in hybrids, electric cars, buses, trains, walking, biking, etc.. All seem more attractive. But since OPEC has a lot of control on oil prices, they can see the threats coming and try to squash them, or at least keep them in check as much as possible. They won't always be able to increase supply enough to drop prices dramatically, but they certain have enough control to shape the market. And from their point of view, it's not even a total loss. If oil prices are lower, people will consume more, meaning that they'll sell a higher volume, partly making up for the low prices. Peak oil could change all that and reduce the cartel's margins, but OPEC's market manipulations will have left us less prepared to face peak oil than we would otherwise have been.

#### Oil companies lower prices to detract from alternative energy usage

Batten and Caldwell, 08

(Kit, Senior Fellow at Center for American Progress, Jake, Senior Fellow at Center for American Progress, 3/24, Center for American Progress, “Energy Diversity Dividends: Biofuels Lower Oil Prices,” <http://www.americanprogress.org/issues/2008/03/energy_diversity.html>, Accessed: 7/11/12, GJV)

New commodities market analysis by Merrill Lynch & Co., Inc. proves the point the Center for American Progress has been making for a while now—that the boom in biofuels production is reducing the cost of oil around the world. That conclusion may seem improbable given the dramatic run up in oil prices over the past five years. But the analysis by Merrill commodities market strategist Francisco Blanch (as [reported today](http://online.wsj.com/article/SB120631198956758087.html?mod=todays_us_page_one) by the Wall Street Journal) says that: “Oil and gasoline prices would be about 15 percent higher if biofuel producers weren't increasing their output. That would put oil at more than $115 a barrel, instead of the current price of around $102. U.S. gasoline prices would have surged to more than $3.70 a gallon, compared with an average of a little more than $3.25 today.” This is precisely the point made by the Center for American Progress in its recently published Progressive Growth series of economic papers, particularly our [Capturing the Energy Opportunity](http://www.americanprogress.org/issues/2007/11/energy_chapter.html) paper, as well as in our earlier report, [Fueling the New Farm Economy](http://www.americanprogress.org/issues/2007/01/farm_economy.html). In both papers, we explained the link between diversifying our nation’s sources of energy and the corresponding fall in energy prices that would follow from diversification

#### Countries lower oil prices to divert attention from alternative energy

Patrascu, 11

(Daniel, Editor for Autoevolution, 5/30, Autoevolution, “Saudi Prince: Low Oil Prices May Stop West from Shifting to Alternative Energy,” <http://www.autoevolution.com/news/saudi-prince-low-oil-prices-may-stop-west-from-shifting-to-alternative-energy-35945.html>, Accessed: 7/11/12, GJV)

With the barrel of oil now priced at over $100, the big consumers are beginning to show signs of anxiety, and that did not pass unnoticed in one of the largest oil producing countries of the world, Saudi Arabia. A price somewhere in the $70-$80 area would be to the liking of Saudi Prince Al-Waleed bin Talai, grandson of the man who founded modern Saudi Arabia, not because it would help the already huge fuel spending of countless nations, but because it would slow down the rate at which some of the wealthiest western nations are adopting new, green technologies. This statement, made by the Prince in an interview with CNN, reflects, probably for the first time, the unease with which oil producing countries are regarding the explosion of green technologies. Seen until recently as a simple passing mood, the determination with which countries like the US are embracing alternative fuels and power sources has convinced countries like Saudi Arabia that the until now overstated reduction in foreign oil dependence is not just talk. Far from being an official position, but coming from the mouth of one directly involved, the statement may have some impact on the Organization of Petroleum Exporting Countries (OPEC) meeting which is scheduled to take place on June 8. At the same time, more pressure begins to come from the International Energy Agency (IEA), who has begun asking oil producing countries to at least increase the supply of oil, in order to stop what might become a big problem for the global economy.

#### Countries lower oil prices to divert attention from alternative energy

Baker, 8

(David R., Chronicle Staff Writer, San Francisco Chronicle, “Low oil prices take wind out of renewable fuels,” <http://www.sfgate.com/green/article/Low-oil-prices-take-wind-out-of-renewable-fuels-3264286.php>, Accessed: 7/11/12, GJV)

Not everyone likes seeing oil prices plunge. This decade's historic high prices for oil and natural gas have stoked the rise of renewable power and alternative fuels. As fossil fuel prices smashed record after record, options like ethanol, hybrid electric [cars](http://www.sfgate.com/autos/), solar power and wind looked better and better. Now oil costs less than half what it did this summer. Ditto natural gas. If prices keep dropping and stay down, future fuels like cellulosic ethanol and biodiesel will have a harder time competing. So will solar and wind power projects, which compete against power plants that burn natural gas. Public interest in alternative energy may dwindle as well. "The excitement has subsided in the last few months," said [Brian Youngberg](http://www.sfgate.com/?controllerName=search&action=search&channel=green&search=1&inlineLink=1&query=%22Brian+Youngberg%22), senior energy analyst with the [Edward Jones](http://www.sfgate.com/?controllerName=search&action=search&channel=green&search=1&inlineLink=1&query=%22Edward+Jones%22) investment company. "When oil comes down, there's still interest, but it's not as passionate. That's a potential risk." To many in the alternative energy world, it feels like a rerun of a movie they've already seen, one with an ugly ending. American interest in renewable power and alternative fuels swelled during the oil shocks of the 1970s, which exposed the country's deep dependence on imported petroleum. But after the price of oil hit a record high in 1981, it crashed and took the country's interest in alternatives with it. Alternative-energy entrepreneurs hope this time will be different. No matter how far oil drops, the fear of global warming won't go away, they say. That should keep both the public and the government interested in tapping energy sources that don't add to climate change.

#### Countries lower oil prices to divert attention from alternative energy progress

Kyle, 8

(Steven, Editor for Scientific American, 12/16, Scientific American, “For Alternative Energy's Sake--Keep Oil Prices High,” <http://www.scientificamerican.com/article.cfm?id=keep-oil-prices-high>, Accessed: 7/11, GJV)

As oil and related energy prices soared to record highs over the past two years, interest in alternative fuels soared, too. Hybrid cars have appeared seemingly overnight, and proposals for solar, wind and other renewable technologies are being made everywhere. We need to remember, however, that all this action has one cause—high oil prices—and progress could grind to a halt if those prices fall again. It might seem ridiculous to worry about such a thing; don’t we all want to spend less on oil? And isn’t hoping for that just whistling in the dark? Not necessarily. At present, it is virtually axiomatic in the popular press that growth in demand from the U.S., China, India and elsewhere will keep oil prices high forevermore. But this common wisdom ignores the possibility of recession, or even [depression](http://www.scientificamerican.com/topic.cfm?id=depression), reducing demand growth to near zero, just as new drilling (mostly overseas) increases supply. Recession is already upon the U.S., and China’s economy is slowing rapidly. As Wall Street collapsed in October, oil prices dropped to around $70 a barrel. Saudi Arabia’s stated goal of maintaining a price floor of $80 a barrel or higher suddenly seemed optimistic. So what is the problem? In the short run, nothing. But sustained development of new energy sources always rests on the condition of the old ones. Coal did not arise as Europe’s main energy source until Europeans had cut down virtually all their forests for fuel, and the later switch to oil did not occur until the scarcity of coal drove its price high.

### OPEC is a cartel; controls the oil market

#### OPEC is an oil cartel- dominates and controls the oil market

**Woolsey, 12** (R. James, foreign policy specialist and former Director of Central Intelligence and head of the Central Intelligence Agency, “Destroying Oil’s Monopoly and OPEC’s Cartel,” March 2012, <http://www.usesc.org/JRWGeopoliticsofEnergy0312.pdf>, Accessed: 7/7/12, LPS)

As the distinguished free-market economist, Friedrich Hayek stressed (and in similar words Adam Smith and Milton Friedman did as well), monopolies and cartels are the major enemies of free markets. Destroying them should be the first priority of those in government who want their societies to have the advantages of a market economy. Yet **we have lived for decades with our entire transportation system dominated by a cartel nested inside a monopoly.** Together they undermine our ability to let the free market respond to increased demand for transportation fuel via market mechanisms. **The market is not permitted to work adequately to increase the supply of fuel and to limit the price we must pay for oil. Thus oil's monopoly over transportation and the cartel's control of a huge share of oil production together increasingly threaten our economic viability, our national security, and the stability of many other nations in the world as well.** We now have been given a key tool – affordable substitutes for oil, principally derived from hydrofractured ("fracked") natural gas – that can be utilized relatively promptly and without major infrastructure investment. By opening these fuel options to the public our cars can readily be enabled to give us the ability to destroy the monopoly and its nested cartel, and we should move promptly to let them do so. **Oil products dominate transportation, over 95 percent.** Sailboats, fox hunts, pedicabs and trolleys move without burning petroleum-based diesel, gasoline, or aviation fuel, but not much else does. How this came to be is an involved and interesting story, especially regarding gasoline's nearmonopoly over automobile fuel – Henry Ford fought hard for alcohol-based fuels (partly because of their inherently high octane) but was defeated by General Motors' commitment to gasoline and to the use of tetra-ethyl lead to increase the low gasoline octane, although it also spread cancer for half a century. We finally then "got the lead out” in the 1970s but the refineries replaced it with other carcinogens (benzene, toluene, xylene, the “aromatics”) since that was financially attractive. **Within the world of oil supply two factors permit a cartel, the Organization of Petroleum Exporting Countries (OPEC), to dominate – and in many ways control – the world oil market.** First of all the twelve **members hold some 80 percent of the world's proven reserves of conventional oil** (about 70 percent if Canadian tar sands are counted). About two-thirds of the OPEC reserves are held by OPEC's eight Middle-Eastern members (Saudi Arabia, Iran, Iraq, Kuwait, the UAE, Algeria, Qatar, and Libya). The two South American members are Venezuela and Ecuador and the two African members are Nigeria and Angola. The second factor is OPEC's very low production costs – under five dollars a barrel in the Persian Gulf OPEC states, under ten elsewhere. This compares with several tens of dollars a barrel in the US, Russia, and a number of other states.

#### OPEC is a selfish cartel that has the ability to manipulate the market

**Askari, 6/12 (**Hossein Askari, Iran Professor of International Business and professor of international affairs at the George Washington University, Asia Times, “The Gulf’s Black Treasure, OPEC in the Driving Seat,” <http://www.atimes.com/atimes/Middle_East/NF14Ak01.html>, Accessed: 7/6/12, LPS.)

Ironically, OPEC's early goal was to arrest declining revenues as opposed to increasing oil prices. For this reason, its formation did not cause major waves around the world. There was little fear of what OPEC might do and in fact, the organization, with the early addition of Indonesia and Qatar, could not even unite to support Iraq in its dealings with the oil majors in the early 1960s. All that changed in a little over a decade. A number of simultaneous developments brought OPEC to the fore. First, global oil consumption soared after World War II, from 370 million tonnes in 1946 to 1,079 tonnes in 1960 and 2,336 tonnes in 1970; in barrels per day, it rose from 11 million in 1950 to 53 million in 1970 - a 400% increase in oil consumption in a mere 20 years. Second, **OPEC's position in the market became increasingly significant, with the cartel's share of world oil production** increasing to 50% in 1970 from 24% in 1946 and 40% in 1960. Third, and even more important than production share, **OPEC's share** of world oil exports rose to 70% by 1970 from about 40% in 1946. The share **of oil exports is in a sense a key indicator, as by 1970 nearly every additional barrel of oil exports came from OPEC sources and the producer of the marginal barrel of exports, or OPEC, was gaining price-setting powers.** Fourth, and in our opinion as important as **these market developments combined, was the fact that the oil majors (**the Seven Sisters plus CFP**) were increasingly loosing their ability to act as an effective cartel themselves (as a unified group of buyers or monopsonists) in their dealings with the OPEC countries.** Libya and Colonel Muammar Gaddafi, by luck or by design, played a key role in breaking up the power of the major oil companies. When oil companies came into Libya (with oil starting to flow in 1961), they were given smaller blocks of land for exploration than they had received from the countries of the Persian Gulf. Moreover, the "independents" (such as Continental Oil, Occidental Petroleum, Amerada-Hess and Marathon Oil), as opposed to the majors, became very active in Libya along with the majors in the 1960s, with the smaller players lifting about 60% of all Libyan oil. The independents, besides being much smaller than the majors, did not have the diverse sources of crude oil that the majors enjoyed. For these two reasons, Libya could play the independents and the majors against each other and could exploit the independents' vulnerability in their heavy reliance on Libyan oil - the dependence of every major oil company on Libyan oil was less than 5%, while each of these independents relied on Libyan oil for over 40% of their worldwide sources of crude. Occidental depended on Libya for over 96% of its worldwide supply. **OPEC's founding was motivated by the desire to arrest declining revenues for their members in dealing with the major oil companies, which without a doubt had acted as a cartel for decades with the blessing of their home governments.** Yet OPEC has been portrayed in most quarters as the cartel that has propped up oil prices since its inception.

#### OPEC is the largest cartel- it illegally controls oil market prices

**Weil, 7** (Dan Weil, *Newsmax,* “If Opec is a Cartel, Why isn’t it illegal?,” <http://www.newsmax.com/Newsfront/opec-cartel-illegal/2009/12/12/id/341497>, Accessed: 7/5/12, LPS)  
**In America, cartels – formal agreements among companies to fix prices and dictate sales rules – are bluntly illegal. But the world’s largest cartel – OPEC,** the Organization of Petroleum Exporting Countries representing 13 major oil producing nations **— is not only recognized as a legal entity, it’s protected by U.S. foreign trade laws. With oil prices careening toward $100 a barrel, some policy makers are wondering why the world community, and the U.S. in particular, doesn’t simply declare OPEC illegal.** “We don’t have to stand by and watch OPEC dictate the price of gas,” says House Judiciary Chairman John Conyers, D-Mich. “We can do something about this anti-competitive, anti-consumer behavior.”The idea is not so far fetched. Earlier this year, **Congress moved to punish OPEC as an illegal cartel. But the Bush administration has blocked such efforts saying they’ll only incite retaliation and hurt American businesses.** In May, the House overwhelmingly passed a bill giving the Justice Department the ability to sue the Middle East-dominated OPEC for collusion and price fixing. A few weeks later the Senate overwhelmingly passed a comprehensive energy bill that included similar anti-OPEC provisions.Now, the House and Senate are trying to finalize that energy bill by year’s end. President Bush, however, has said in no uncertain terms that he’ll veto any energy bill that includes the anti-OPEC language.Such a law would “encourage retaliation against American businesses abroad, discourage job-creating investment in the U.S. economy and injure U.S. relations with other countries,” Allan Hubbard, director of President Bush’s National Economic Council, wrote in a letter to House Speaker Nancy Pelosi last month.

#### OPEC has a large affect on the oil market

**Jubak, 6/12** (Jim, *MSN Money,* “How will OPEC drama affect oil prices?” <http://money.msn.com/top-stocks/post.aspx?post=8a402fe2-f52d-40da-b786-f03d103718b4>, Accessed: 7/5/12, LS.)

**Saudi Arabia and Iran are headed for a high-speed collision at** Thursday's **OPEC (Organization of Petroleum Exporting Countries) meeting in Vienna**. That much is clear. **What's not at all certain is that what effect the collision will have on oil prices. (OPEC pumps about 40% of the world's oil.)** This OPEC meeting it more fraught than most because there are two big items on the agenda.First, OPEC is set to elect (or at least discuss electing) a new secretary-general, and both Saudi Arabia and Iran are pushing their own candidates. With the two countries locked in radically different positions on expanding/contractin​g OPEC production, I think the door is wide open to the selection of one of the compromise candidates backed by Ecuador or Iraq. (Of course, OPEC could deadlock. From 2004 to 2007, the organization was without a secretary-general because members could not agree on a candidate.)Second, **the Saudis have proposed that OPEC raise its official production quotas in order to keep global oil prices at $100 a barrel or less (for benchmark Brent crude.) The Iranians, who have seen their oil exports drop due to sanctions imposed by the United States and the European Union, want OPEC to lower production so that prices climb and oil importers have fewer alternatives to buying Iranian oil.**

#### OPEC is a cartel that has the power to manipulate and control the market

**Askari, 6/12(**Hossein Askari, Iran Professor of International Business and professor of international affairs at the George Washington University, Asia Times, “The Gulf’s Black Treasure, The OPEC Bogeyman,” <http://www.atimes.com/atimes/Middle_East/NF21Ak02.html>, Accessed: 7/6/12, LPS.)

**The Organization of the Petroleum Exporting Countries (OPEC) may be the most famous cartel of the present age,** but such bodies have a long history, making it possible to recognize the attributes of a strong cartel and OPEC's own performance in that regard**. The members of a cartel collude on the level of output (assigning output levels to each member) with the goal of manipulating price levels and volatility.** **In other words, in contrast to independent producers operating under perfect competition, cartel members collude on their output levels to earn monopoly profits over time at the expense of consumers.** Obviously a cartel needs at least two members.Unity is key to making a cartel strong. Unity is needed to demonstrate to members and perspective members that they can gain by joining and colluding. OPEC failed in this regard throughout the 1960s but managed to unite to extract the Tehran Agreement from the companies in 1971 and was united in 1973/74, achieving further gains. In contrast, the oil companies were united throughout the 1940s, '50s and '60s, and it was not until the early 1970s that Libya managed to drive a wedge between the independent oil companies and the majors. **The danger for OPEC, as for any cartel, has been that members will agree to production quotas but then cheat; or not agree to production quotas at all; or afford non-member oil producers the benefits of their collusion without the cost of having to restrict their output level** (getting a free ride on the back of OPEC, that is, benefit from higher prices with no obligation to limit output levels).

#### Higher OPEC market production lets OPEC manipulate the market and act as an effective cartel

**Askari, 6/12 (**Hossein Askari, Iran Professor of International Business and professor of international affairs at the George Washington University, Asia Times, “The Gulf’s Black Treasure, The OPEC Bogeyman,” <http://www.atimes.com/atimes/Middle_East/NF21Ak02.html>, Accessed: 7/6/12, LPS.)

**Market share (production and especially exports. The higher the market share of cartel members, the higher their market power to set prices.** OPEC market shares, while falling for a number of years beginning in the mid-1980s, have recovered and will continue to grow for the foreseeable future. **A cartel of sellers benefit from numerous buyers and their disunity.** Again, oil fits the bill and supports the OPEC position. **Today, OPEC and its members appear to have more power than ever - a growing market share, vast and growing financial surpluses,** declining oil production outside of OPEC and a world increasingly concerned with global warming (that is, opposition to coal) and nuclear power safety.

#### OPEC controls 40% of the worlds oil market- at the least has major force in market control

**Weil, 7** (Dan Weil, *Newsmax,* “If Opec is a Cartel, Why isn’t it illegal?,” <http://www.newsmax.com/Newsfront/opec-cartel-illegal/2009/12/12/id/341497>, Accessed: 7/5/12, LPS) **OPEC countries, which include the biggest producers in the Middle East and Africa as well as Venezuela and Ecuador, produce about 40 percent of the world’s oil will take in some $500 billion in oil revenues this year, according to U.S. government figures.** The organization was formed in 1960 to give the producers more control over petroleum prices and production. In the early 1970s, OPEC brought the West to its knees with oil embargoes. But the group lost clout in the late 1990s, when oil prices tumbled. **The recent run-up in oil prices has allowed OPEC to reassert itself as a major force in the oil market, experts note.** A 1979 U.S. District Court decision held that OPEC’s pricing decisions are essentially "governmental" acts of state, as opposed to "commercial" acts, and thus are beyond the legal reach of U.S. courts thanks to the Foreign Sovereign Immunity Act of 1976.The bills in Congress seek to overturn this decision. A similar effort in 2005 failed, however, and insiders say resistance from the Bush administration makes success for so-called NOPEC efforts unlikely this time around as well.

#### OPEC has 80% of the worlds oil reserves and can easily manipulate the market

**Woolsey, 12**

(R. James, foreign policy specialist and former Director of Central Intelligence and head of the Central Intelligence Agency, “Destroying Oil’s Monopoly and OPEC’s Cartel,” March 2012, <http://www.usesc.org/JRWGeopoliticsofEnergy0312.pdf>, Accessed: 7/7/12, LPS)

The other part of the more-or-less liberal agenda to deal with the oil problem is at least relevant to the problem: more stringent fuel mileage standards. The problem is that it is a one-time step for which **OPEC can adjust by lowering its production and thus driving prices back up. Essentially nothing that requires us to stay on oil products for transportation can defeat OPEC, even if we contrive to use less of them.** What about drill, baby, drill? Like more demanding fuel standards it's not a bad idea – it just won't get the job done. It will improve our balance of payments some, and will increase domestic employment a bit. Maybe we'll only need to borrow $800-$900 million a day instead of a billion. We'll add some jobs. **But we can't beat OPEC's 80 percent of the world's oil reserves, and oil lifting costs of a few dollars a barrel with our two percent or so of the world's reserves and lifting costs of tens of dollars a barrel while we leave in place oil's monopoly over transportation.** At least we can’t as long as there's a world oil market from which we don't completely secede. The argument that we need energy "independence", but defining it as "autarky" rather than its real meaning of "lack of control by others" is part of this dream world.

#### OPEC still pumps the same amount of oil it did in the 70’s despite the doubling of the global economy

**Woolsey, 12** (R. James, foreign policy specialist and former Director of Central Intelligence and head of the Central Intelligence Agency, “Destroying Oil’s Monopoly and OPEC’s Cartel,” March 2012, <http://www.usesc.org/JRWGeopoliticsofEnergy0312.pdf>, Accessed: 7/7/12, LPS)

So its **dominance of oil reserves and its low production costs put OPEC in a position to do what it does – limit supply in order to keep prices up and to milk consumers. Evidence? Start with the fact that OPEC pumped about 30 million barrels a day forty years ago into the world’s economy and oil use then was only about half of what it is today. So OPEC has essentially ignored a doubling of the world economy and oil demand and continues to pump what it did in the early ‘70s.** What else can you call a group of twelve countries that does this, that has 80 percent of the world's supply of a product and yet provides only about 36 percent of the world's consumption each year, other than a conspiracy in restraint of trade? So what's the problem? We have to pay for lots of things in this life and various companies and industries have some sort of intellectual property or other advantage that lets them charge more. Why should we pay special attention to oil? Let me count the ways.

#### OPEC effectiveness as a cartel is because the lack of alternative energy in transportation

**Askari, 6/12 (**Hossein Askari, Iran Professor of International Business and professor of international affairs at the George Washington University, Asia Times, “The Gulf’s Black Treasure, The OPEC Bogeyman,” <http://www.atimes.com/atimes/Middle_East/NF21Ak02.html>, Accessed: 7/6/12, LPS.)

**Product characteristics help to define a cartel's effectiveness. It helps if the product is essential - which oil is; and has no ready substitute, which again is the case with oil when it comes to its use in transportation. Along the same line, it helps if the product has a low price elasticity of demand** (that is as prices go up, demand does not go down to a lower rate); and if the product is hard to store and has a high storage cost (buyers cannot store for emergency and thus have more negotiating power).

### OPEC manipulation controls the market

#### OPEC’s market manipulation changes the oil market

**Fueleconomy, No Date** (the Official Government U.S. Source for Fuel Economy Information,Fueleconomy.gov, “Reduce Oil Dependence Costs,” <http://www.fueleconomy.gov/feg/oildep.shtml>, Accessed: 6/3/12, LPS.) **Today, about half of the oil we use is imported, and our dependence will increase as we use up domestic resources. Most of the world's oil reserves are concentrated in the Middle East, and about two-thirds are controlled by Organization of the Petroleum Exporting Countries (OPEC) members. Oil price shocks and price manipulation by OPEC have cost our economy dearly—about $1.9 trillion from 2004 to 2008—and each major shock was followed by a recession. We may never eliminate our need to import oil, but we can reduce cartel market control and the economic impact of price shocks by reducing our demand.** Congress recently passed legislation to decrease our dependence on oil by increasing corporate average fuel economy (CAFE) standards on new cars and trucks to 35 mpg by model year 2020. This could reduce our petroleum use by 25 billion gallons by 2030.

## **Impacts**

### Oil Shocks- Recession

#### Oil shocks have caused global recessions for past 30 years

Roubini and Setser Oxford 2004 (Nouriel & Brad, August 2004, Stern School of Business, NYU Research Associate, Global Economic Governance Programme, University College, Stern.NYU, The effects of the recent oil price shock on the U.S. and global economy ,http://pages.stern.nyu.edu/~nroubini/papers/OilShockRoubiniSetser.pdf)DD

These effects are not trivial: oil shocks have caused and/or contributed to each one of the US and global recessions of the last thirty years. Specifically: - The 1974-1975 US and global recession was triggered by the tripling of the price of oil following the Yom Kippur war and the following oil embargo. - The 1980-1981 US and global recession was triggered by a spike in the price of oil following the Iranian revolution in 1979. - The 1990-1991 US recession was partly caused by the spike in the price of oil following the Iraqi invasion of Kuwait in the summer of 1990. - The 2001 US and global recession was partly caused by the sharp increase in the price of oil in 2000 following the California energy crisis and the tensions in the Middle East (the beginning of the second intifada). But other factors were more important: the bust of the internet bubble, the collapse of real investment and, in smaller measure, the Fed tightening between 1999 and 2000. While all post-73 recessions have been associated with oil shocks, not all oil shocks lead to a recession. The most recent example is early 2003: the pre-Iraqi war spike in oil prices did not lead to a recession.

### Oil Shocks-Bank Collapse

#### Oil shocks can collapse international banking system

World-Crisis 8 (World-Crisis, World Oil Crisis: Driving forces, Impact and Effects, <http://www.world-crisis.net/oil-crisis.html>)DD

A peak in oil production could result in a worldwide oil shortage, or it could not even be noticed as oil demand decreases in conjunction with increased oil prices. While past shortages stemmed from a temporary insufficiency of oil supply, crossing Hubbert's Peak would mean that the production of oil would continue to decline, and that demand for oil-based products must be reduced to meet oil supply. The effects of such a shortage would depend on the rate of decline and the development and adoption of effective alternatives. If alternatives were not forthcoming, it has been speculated that the numerous products produced with oil would become scarcer, leading to at the very least lower living standards in developed and developing countries alike, and possibly in the worst case to the collapse of the entire international banking system, which could not likely sustain itself without the prospect of growth. The political situation may change dramatically, with potential wars between countries over access to dwindling oil supplies. Accordingly, inequalities between various countries and regions of the world may become exacerbated.

### Low Oil Prices-Bad for Econ

#### Low oil prices bad for global economy

Nelder 9 (Chris, Energy Futurist/Analyst/Writer, 3/4/09,Energy and Capital, The Sleeping Threat of Low Oil Prices, <http://www.energyandcapital.com/articles/oil-prices-opec/838>) DD

If you need any more proof that the markets are not an efficient discounting mechanism, look no further than the price of oil. Oil prices in the high $30s to low $40s are nothing short of a ticking time bomb under the world economy, but you wouldn't know it from watching the commodity markets. Once the global downturn slashed $100 off the price of a barrel, the issue of oil supply seemed to simply fall off the radar of market observers. Falling oil demand is all that anyone seems to care about, but we may pay dearly for taking our eye off the ball of supply.

#### Low prices mean low economy

Samuel 11(Stephanie, Christian Post Reporter,8/8/11,The Christian Post, Lower Gas Prices Come Amid Economic Woes,http://www.christianpost.com/news/lower-gas-prices-come-amid-economic-woes-53591/)DD It's an indicator that people are worried about the economy," said Kreutzer. He explains that oil traders are leaving the commodities market in anticipation of lessening demand. A drop in demand results when there is a drop in income. A similar situation occurred in 2008 when petroleum prices fell sharply. The drop was followed by a financial crisis and the $700 billion TARP bailout. Last week, despite congress breaking the debt ceiling stalemate, Standard and Poor's lowered the credit rating on the national debit from AAA+ to AA+ for the first time in history. News of a troubled U.S. economy led to a massive Wall Street sell-off that began late last week and continued into Monday. Some traders who are concerned about this dilemma are switching their investments to gold. Bloomberg reports that gold futures, seen by many as a safe bet in the midst of financial uncertainty, rose to just over $49, setting the record for biggest gains since March 2009

### Oil Key to Econ Growth

#### Oil and Natural Gas Industry Significant to U.S. Economy

Ryan, Energy Writer, 2010

(Jane, 11-4-10, “Energy Development: The Key to Economic Growth,” <http://energytomorrow.org/blog/energy-development-the-key-to-economic-growth/#/type/all>, GHK)

The oil and natural gas industry contributes significantly to the U.S. economy as one of the nation’s largest employers and purchasers of goods. Even in a struggling economy, America's oil and natural gas companies continue to provide well-paying jobs, revenue to governments and investment growth for millions of Americans—totaling an economic contribution that challenges Washington's idea of stimulus. Consider it the energy stimulus: $476 billion delivered to the U.S. economy in 2010— equal to roughly 60 percent of the 2009 federal stimulus. It's a stimulus that didn't need an act of Congress and which, with the right policies, can be repeated over and over—helping to drive broader economic recovery.

#### Oil is essential to the U.S. economy

Brooks, Managing Director – Energy Musings, 2011

(Allen, 11-7-11, “Musings From the Oil Patch,” <http://energy-musings.com/node/276>, GHK)

"First, the potential supply of North American natural gas is far bigger than previously thought," the report said. "It is now understood that the natural gas resources base is enormous and that its development, if carried out in acceptable ways, is potentially transformative for the American economy, energy security and the environment, including reduction of carbon and other emissions," the study said. "Second - and surprising to many - North America's oil resources also are much larger than previously thought," the council said. "These oil resources offer substantial supply for decades and could help the US reduce, though not eliminate, its reliance on imported oil." Third, the council said its analysis shows that natural gas and oil will be essential to the US economy "even as energy efficiency reduces demand and lower-carbon alternatives become more economically available on a large scale". "Moreover, the natural gas and oil industry is vital to the US economy, generating millions of jobs, widely stimulating economic activity, and providing significant revenues to government," the report added. In its final finding, the council advised: "The nation can realize the benefits of these larger resources by ensuring they are developed and delivered in a safe, responsible and environmentally acceptable manner."

#### America’s Oil and Natural Gas Industry Creates Jobs

Energy Tomorrow, 2012

(Energy Tomorrow, NoDate, “Job Creation,” <http://energytomorrow.org/job-creation/?gclid=CMifq_afjLECFQxshwodNEi_jg#/type/all>, GHK)

America's oil and natural gas industry supports 9.2 million men and women across the United States in a wide range of highly skilled, well-paying professions. In fact, oil and natural gas industry exploration and production wages are more than double the national average. An analysis of API's public data, independent research and corporate annual reports finds that the industry distributed $176 billion in wages paid to U.S. employees, plus benefits and payments to oil and natural gas leaseholders.

#### America’s Oil and Natural Gas Industry Helps U.S. Economy

Energy Tomorrow, 2012

(Energy Tomorrow, NoDate, “Job Creation,” <http://energytomorrow.org/job-creation/?gclid=CMifq_afjLECFQxshwodNEi_jg#/type/all>, GHK)

With the right government policies in place, the oil and natural gas industry can create more American jobs that can help grow the U.S. economy, generate substantial new revenues for government and provide greater energy security for our nation. In fact, with increased access to U.S. oil and gas resources we can create 1 million new jobs in the next ten years alone. To put that in perspective, that would provide enough jobs for nearly every citizen of Rhode Island. A recent study by Wood Mackenzie found that by 2030, nearly 1.4 million new jobs could be added through policies which encourage development of America's oil and natural resources, and facilitate Canadian oil sands production through the development of Keystone XL and other related piplines. A few examples are as follows: Development of the Marcellus Shale alone could create 160,000 jobs in Pennsylvania, 20,000 jobs in New York and 30,000 jobs in West Virginia by 2015. The opening of Florida to exploration and development could result in up to 100,000 new Florida jobs by 2016--just with increased access to federal areas within the Gulf of Mexico. U.S. State Department approval of the Keystone XL pipeline could generate nearly 85,000 jobs by 2020

#### Energy Industry Key to Economy

HoumaToday, Community Associated Press, 2012

(HoumaToday, 1-24-12, “Oil Industry is Key to Our Economy,” <http://www.houmatoday.com/article/20120124/LETTERS/120129857>, GHK)

We need to support our energy industry if we are going to pull our state’s economy out of the doldrums of the recession, the oil spill and the moratorium on drilling. Yet we still hear calls from the administration for increased taxes on this key industry. I know I will be listening closely to the state of the union address to see whether our president realizes that the energy industry can be a key element in job creation and economic stimulus. It would be a 180-degree turnaround for this administration, but it would sure help our economy here in Louisiana.

### A2: High Oil Prices 🡪 Inflation

#### High oil prices don’t cause inflation – alt causes

Harding, 12

(Jeff, principal of Montecito Realty Investors, 2/28, Minyanville, “Debunking the ‘High Oil Prices = Recession’ Fallacy,” <http://www.minyanville.com/trading-and-investing/commodities-and-options/articles/oil-gas-oil-price-gas-price/2/28/2012/id/39626>, Accessed: 7/9/12, GJV)

Take price increases of oil and gasoline. It doesn't cause price inflation (i.e., all prices rise). Instead it's a supply and demand thing. When OPEC jacks up oil prices, people spend more on gas and less on other things. The consumer goods they don't buy decline in price. Money is redirected by market forces to petroleum producers who are incentivized to discover and produce more oil. Ultimately, under normal circumstances, prices come down. This process is a bit distorted because we have a cartel-controlled market. But, if OPEC keeps prices too high, people reduce consumption, cartel revenues go down, and OPEC reduces prices to stimulate consumption. This is what happened in the current business cycle. It is the same with recessions and oil prices. Each of the recessions we've had in the last 40 years can be adequately explained by causes other than oil/gas prices. For example, while oil/gas prices shot up prior to the 2008 Crash, no one suggests that was a cause of it. Rather we know that oil prices went up as a result of a fiat money-fueled boom that drove up all commodity prices.

# \*\*\*Aff Answers\*\*\*

## A2: Renewables coming now

### Oil companies dislike Renewable Energy

#### Shell has filed lawsuits against many environmental organizations

Dlouhy 7-2 (Jennifer A., Energy writer for The Houston Chronicle, based in Washington D.C, "Shell moves to pre-empt Arctic drilling challenges," http://fuelfix.com/blog/2012/07/02/shell-moves-to-pre-empt-arctic-drilling-challenges/)

SEATTLE – During Shell’s seven-year, $4.5 billion quest to search for oil under Arctic waters, environmentalists have put the company on the defensive by challenging government-issued drilling approvals and permits in federal court. The strategy has been so successful that in 2011, Shell was forced to abandon its plans to launch exploratory drilling in the Chukchi and Beaufort seas after air pollution permits essential for the work were tossed out in one of those legal challenges. Now the tables may have turned. Instead of waiting for court fights that Shell Oil Co. views as inevitable, the company has filed its own lawsuits against more than a dozen environmental organizations and is asking a federal judge to declare some of its government approvals valid, even before any legal filings calling them into question. Last Tuesday, U.S. District Judge Ralph Beistline of Alaska handed Shell its first win in the litigation, ruling against the environmental groups’ initial request to dismiss the case. Early is key for Shell. Shell’s unorthodox legal maneuver feeds an image of a well-heeled Big Oil Goliath bullying environmentalists with far less cash in their pockets. But Shell executives say they aren’t trying to close the courtroom door to anyone – just ensure any legal challenges are filed early enough to be resolved before the brief Arctic drilling window opens this summer. Otherwise, challengers effectively could run out the clock on summer drilling by delaying the work until after a mid-September cutoff for exploration in the Chukchi Sea and an Oct. 31 deadline in the Beaufort Sea. “It’s not trying to circumvent any process,” said Pete Slaiby, vice president of Shell Oil’s Alaska venture. “It’s just trying to bracket the time so the challenge is used as a way to determine if there is indeed an issue that would be impacted by the permit, rather than as a way to delay the program.” Permits probable. A flotilla including two drilling rigs is sailing toward Alaska, and Interior Secretary Ken Salazar said last week that the government probably will grant the remaining permits required for Shell’s operations. Environmental activists suggest Shell’s legal gambit is an intimidation tactic designed to draw their money and attention away from fighting the company’s plans to drill 10 wells in the Chukchi and Beaufort seas over the next two summers. “Having spent billions and billions of dollars, they are absolutely determined to let nothing stand in their way and figured out how to use our legal system to actually aid and abet them in destroying the Arctic,” said Jackie Dragon, Greenpeace’s senior oceans campaigner.

#### Oil companies are lobbying against renewable energy policies

Doering 7-2 (Christopher, Writer at the Gannett Washington Bureau, "Renewable advocates battle oil industry over energy policy," http://www.usatoday.com/money/industries/energy/story/2012-07-02/renewable-fuels-oil-congress/55987052/1)

Big oil and natural gas companies may vastly outspend and outman the renewable fuels industry on Capitol Hill but the general gridlock in Washington gives advocates of wind, ethanol and other new-age sources the upper hand in the growing battle to overhaul the country's energy policy. "This Congress…seems unable to make a national energy policy," said Bruce Babcock, an Iowa State University economist. "The renewable fuels have an advantage in that they are part of current law, and it's always easier to maintain current law than it is to change it." Among the factors making a major shift of U.S. energy policy difficult are the upcoming elections, the inability of lawmakers to reach a consensus on how to change it, and the high costs necessary to expand access to fuels such as natural gas for consumers at U.S. filling stations. That hasn't stopped the oil industry from aggressively wooing Congressional lawmakers on hot-button issues, including lobbying against renewable fuels. Last year alone ConocoPhillips, Royal Dutch Shell, Exxon Mobil, Chevron and the American Petroleum Institute, the trade group that represents these energy giants, used $66.2 million for lobbying efforts, nearly 44% of the $150 million total spent by the oil and gas industry, according to data compiled by the Center for Responsive Politics. Collectively, nearly 800 lobbyists worked on behalf of oil and gas interests in 2011. The total towers over the $53 million spent by what the center classifies as the "miscellaneous energy" industry — which counts the Renewable Fuels Association, Growth Energy and the American Wind Energy Association as its members. The grouping includes 751 lobbyists. Despite the huge financial disadvantage, renewable fuels groups remain unconvinced that the public relations push by the deep pockets of the fossil fuel industry will be enough to get lawmakers in Washington to act. "I think what you're seeing out here over the past couple of years is the oil industry has tried to run-up the negatives on any type of renewable energy," said Tom Buis, head of Growth Energy, which represents ethanol producers. "They've pushed real hard on the political front and certainly on the advocacy front."

### No Shift to Renewables

#### Oil companies say they’re moving towards renewables, but most money is still in oil

Willis 6-21 (Paul, Writer at CNN.com and EarthTechling, "Is Big Oil really serious about renewables?," http://www.tgdaily.com/sustainability-features/64198-is-big-oil-really-serious-about-renewables)

On Chevron's website there is a green mission statement. Alongside a video featuring some earnest-looking members of the public and Chevron employees talking about the importance of renewables, the statement says this: "It's time oil companies get behind the development of renewable energies." Elsewhere on the same page the company boasts that its own investment in geothermal, biofuels and solar is to the tune of millions of dollars. Chevron is not the only oil company making a big deal about its green portfolio. BP has been using the tagline "Beyond Petroleum" for years now. Nor does a quick review of the numbers quite undermine both companies claims. According to figures released recently by the American Petroleum Institute (API), a trade group, Big Oil is the biggest investor in the race to create green fuels. The API says that in the last decade the industry has put $71 billion into zero- and low-emission and renewable energy technologies. In contrast, the U.S. government has spent about $43 billion on similar efforts over the same period. BP, for example, spent $1.6 billion last year to construct wind farms in Pennsylvania and Kansas, joining the 11 wind power plants it has already constructed. Chevron, meanwhile, recently opened a 29-megawatt thermal solar-to-steam facility at one of its oldest oil fields in California's San Joaquin Valley, which will increase crude oil production at the site. However, everything is relative, and delve beneath the surface and it becomes clear that Big Oil's relationship to renewables is far more complex than the bold taglines and mission statements might imply. For a start, most of the $71 billion figure touted by the API went toward making oil companies' existing fossil-fuel business more environmentally friendly. Only $9 billion went toward renewable energy investment. And even if all that money had been sunk into renewable technology it would still only be a drop in the ocean compared to what Big Oil spends on its core business. To take the example of BP again: the $1.6 billion it spent on wind projects needs to be balanced against the $14 billion the company intends to spend on oil and gas exploration in the North Sea — only one of its many projects around the globe. Between 2004 and 2009 Shell spent $1.7 billion on alternative projects. That amount is dwarfed by the $87 billion it spent over the same period on its oil and gas projects around the world. When you consider that the top 15 oil and gas companies have a market capitalization of $1.9 trillion it's clear that the $71 billion over 10 years which we started with begins to look less and less impressive. Of course, Big Oil would argue with some justification that this also is a reflection of market realities. The vast majority of the world's energy needs are still supplied by fossil fuels and in spite of the incredible leaps and bounds made by cleantech in the last two decades renewables remain a niche industry and, some would argue, unproven as a major power source for the future. This view was best summed up by Rex W. Tillerson, the CEO of Exxon Mobil, who noted following the election of Barack Obama in 2008 that nothing had really changed. "We don't oppose alternative energy sources and the development of those," Tillerson said at the time. "But to hang the future of the country's energy on those alternatives alone belies reality of their size and scale." In truth, most of the impetus for clean energy development has come from other sources than Big Oil, which has rarely strayed much from the concerns of the balance sheet. For example, the large-scale push into biofuels by most of the major oil companies in recent years must be seen in the light of the Energy Independence and Security Act, which President Bush signed into law in 2007 and which requires the country to work toward the production of 36 billion gallons of renewable fuels by 2022. As well in the context of Obama's green energy push and commitments made by the U.S. military to get half of its power from clean energy sources by 2020. "All of our alternative energy businesses are businesses," Katrina Landis, the CEO of BP's alternative energy division, told Forbes recently. "We have to compete for investment dollars with all the hydrocarbon resources within BP." In fact, oil companies have not just remained passive observers to the renewables revolution, waiting to jump on the bandwagon when there's money to be made. At times they have actively tried to undermine efforts to deploy more cleantech. For example, Chevron's claims to be behind renewables are rather undermined by the fact that the company and its subsidiaries spent $2.1 million in lobbying the California state legislature last year over new laws requiring utilities to get a third of their power from alternative energy sources by the end of the decade.

### No public support for renewable energy

#### There is not enough public support for renewable energy

Shahan 7-2 (Zachary, Writer at Clean Technica, "80% Clean, Renewable Energy by 2050: More Than Possible, But Need More Political Will (& Public Demand)," http://cleantechnica.com/2012/07/02/80-clean-renewable-energy-potential-2050-us/)

Now, as anyone in this industry should know, technology isn’t the main challenge these days. Having adequate support for a clean energy transition in top levels of political leadership is. This report may help to open the eyes of some. The increasing costs of climate-related disasters might do the same. But more than anything, I think we simply need the public to put pressure on politicians to make this possibility a reality. The NREL study above focused on an 80% by 2050 scenario, but it looked at scenarios up to 90% penetration and down to 30% penetration. Unfortunately, without strong action, we could hit the very sad and societally disastrous 30% scenario. Again, it’s not about the technology. It’s about the political will and the public demand. The public has shown time and time again that it supports clean energy, but it hasn’t *demanded* it very much yet. Until we do, we can be sure dirty energy companies will keep pumping everything they can into a political system that listens far too much to Big Money (when not forced to do otherwise).

### No Technology

#### Current renewable energy technologies are not sufficient

IEA ‘12 (International Energy Agency, "Energy Technology Perspectives 2012 Pathways to a Clean Energy System," http://www.iea.org/Textbase/npsum/ETP2012SUM.pdf)

Despite technology’s potential, progress in clean energy is too slow. Nine out of ten technologies that hold potential for energy and CO2 emissions savings are failing to meet the deployment objectives needed to achieve the necessary transition to a low-carbon future. Some of the technologies with the largest potential are showing the least progress. The ETP analysis of current progress in clean energy (Chapter 2) produces a bleak picture. Only a portfolio of more mature renewable energy technologies – including hydro, biomass, onshore wind and solar photovoltaic (PV) – are making suﬃcient progress. Other key technologies for energy and CO2 emission savings are lagging behind. Particularly worrisome is the slow uptake of energy eﬃciency technologies, the lack of progress in carbon capture and storage (CCS) and, to a lesser extent, of oﬀ shore wind and concentrated solar power (CSP). The scale-up of projects using these technologies over the next decade is critical. CCS could account for up to 20% of cumulative CO2 reductions in the 2DS by 2050. This requires rapid deployment of CCS and is a signiﬁcant challenge since there are no large-scale CCS demonstrations in electricity generation and few in industry. Committed government funds are inadequate and are not being allocated to projects at the rates required. In transport, government targets for electric vehicles are set at 20 million vehicles on the roads in 2020. These targets are encouraging, but are more than twice the current industry planned capacity so may be challenging to achieve, in particular given the relative short-term nature of current government support schemes.

#### Technology Is Too Slow – Solution Must Be Quickly Implemented Immediately

Kessler and Begtrup 2008

(Brian and Gavi, 8-8-08, University of California Berkeley, “Mitigating the Oil Crisis: Coal-to-Liquid Technology for American Energy Independence,” <http://step.berkeley.edu/White_Paper/kessler_and_begtrup.pdf>, 7-10-12, GHK)

A significant drawback to any non-liquid fuels based technology is the inability to implement the technology rapidly enough to mitigate liquid fuel shortages. Currently, there are 210 million automobiles on the road with an average life span of nine years. To replace half the fleet with new technology would require 10-15 years and considerable capital investment beyond the production of the alternate power source. Research into the development and implementation of these alternative fuels should continue and will hopefully bear fruit in the future, contributing to the long term solution. However, a solution to the liquid fuel crisis that can be quickly implemented in the current infrastructure is needed immediately. (pg3)

### No Market

#### Renewable energy has a market disadvantage

Lane 7-9 (Charles, writer for The Washington Post, "Obama’s bad gamble on renewable energy," http://www.charlotteobserver.com/2012/06/20/3328800/obamas-bad-gamble-on-renewable.html)

Blackjack pros like doubling down; it’s a chance to profit from newly acquired relevant information. Whether that logic applies to the U.S. government’s energy bets, however, is a different story. What we’ve learned so far suggests the president should fold his cards. U.S. energy subsidies – spending, tax breaks, loan guarantees – increased from $17.9 billion in fiscal 2007 to $37.2 billion in fiscal 2010, according to the Energy Department. Yet fossil fuels’ overwhelming market advantages have produced a litany of clean-energy failures, from electric cars to Solyndra. The subsidies ostensibly address several issues – dependence on foreign oil, job creation, international economic competitiveness and environmental degradation – but without clear priorities, much less rigorous cost-benefit analysis. Unintended consequences and political influence abound. To the extent that it’s coherent at all, the federal energy “portfolio” represents a return to industrial policy – governmental selection of economic winners – which was fashionable in the 1970s and 1980s, before it collapsed under the weight of its intellectual and practical contradictions. As such, current clean-energy programs are no likelier to pay off than President Jimmy Carter’s Synthetic Fuels Corp., which blew $9 billion, or President George W. Bush’s $1.2 billion program for hydrogen vehicles. This isn’t just my opinion or the finding of some right-wing think tank. Rather, all of the above comes from a new paper by three certifiably centrist Brookings Institution scholars, Adele Morris, Pietro S. Nivola and Charles L. Schultze; Schultze was a senior economic adviser to Presidents Kennedy, Johnson and Carter.

### Random cards

#### Near-Term Replacements Have Several Requirements

Kessler and Begtrup 2008

(Brian and Gavi, 8-8-08, University of California Berkeley, “Mitigating the Oil Crisis: Coal-to-Liquid Technology for American Energy Independence,” <http://step.berkeley.edu/White_Paper/kessler_and_begtrup.pdf>, 7-10-12, GHK)

Any possible near-term replacement for petroleum-based liquid fuels must meet several requirements: 1. Rapid implementation 2. Minimal collateral resource effects 3. Minimal environmental impact 4. Security of Supply 5. Economic Feasibility The first criterion requires that the solution rely on proven technology. Although experimental solutions may become applicable in the long term, they cannot mitigate the current American dependence on foreign oil. Ideally, the technology should rely on existing infrastructure to promote prompt integration. The second criterion prevents a “shell game” scenario where one energy resource is swapped for liquid fuels thereby creating a shortfall and resulting crisis in another energy sector. (pg. 2)

#### **Solution to Transportation Needs Is Shifting Away From Liquid Fuels Altogether**

Kessler and Begtrup 2008

(Brian and Gavi, 8-8-08, University of California Berkeley, “Mitigating the Oil Crisis: Coal-to-Liquid Technology for American Energy Independence,” <http://step.berkeley.edu/White_Paper/kessler_and_begtrup.pdf>, 7-10-12, GHK)

A popular alternative to oil is biofuels, currently consisting almost entirely of corn-based ethanol. This has had unintended consequences on the price of food and leads to land use concerns. Furthermore, ethanol is only cost competitive with oil when highly subsidized. The next generation of cellulosic ethanol promises to rectify these problems by using waste and non-food crops that can be grown on land not suitable for other uses. However, this technology is not proven and appears to be at least ten years away from demonstration. Also, ethanol is not a direct replacement for current liquid fuels in that it has a 31% lower energy density than gasoline and cannot be directly implemented into vehicles without alteration. Alternatively, the solution to transportation needs could be a transition away from liquid fuels altogether. Currently two technologies seem applicable in this regard, electric cars and hydrogen based power. Electric cars are currently limited by battery technology and current models are only applicable in the commuter sector with no foreseeable solution for long range shipping and air travel. At the end point of use, electric power is very environmentally friendly, but from a systems point of view it is only as clean as the electrical power plant and distribution system. A well-to-wheel efficiency calculation of an electric vehicle charged by standard coal burning power plants finds that electric vehicles may be more inefficient than current high efficiency liquid fuel vehicles. Additionally, large scale use of electrical vehicles would put a significant load on the existing electricity infrastructure. This and the limitation of current battery technology will postpone the wide-spread use of electric vehicles. Despite tremendous attention, hydrogen technology is further behind than electric technology and suffers from the additional drawback of implementing a new filling infrastructure completely different from the current liquid fuel based model. (pg3)

#### To Kick Oil Addiction, U.S. Needs to Shift Toward Radically Efficient Vehicles

Cohen and Lowe 2010 (Bennett and Cory, 8-2010, Rocky Mountain Institute, “Feebates: A Key to Breaking U.S. Oil Addiction,” <http://www.rmi.org/FeebatesKeyBreakingOilAddiction>, 7-10-12, GHK)

Oil addiction, in particular, is a habit RMI would like to help the U.S. kick. The scale of U.S. oil consumption (nearly 19 million barrels per day) combined with its virtual monopoly of transportation energy (97 percent oil-based), creates strategic weakness, economic insecurity, widespread health hazards, and environmental degradation. To kick the oil habit, the U.S. needs to shift toward radically efficient vehicles, which enable alternative fuels—electricity, advanced biofuels, or hydrogen—to compete robustly with oil.

## A2: OPEC floods the market

### No incentive to flood

#### OPEC can’t afford to give cheap oil-they have little financial incentive to ration their use

**Swann 6/12**

(Christopher, a Reuters Breakingviews columnist, Reuters, “OPEC Can’t Afford to Give Residents Cheap Oil,” <http://blogs.reuters.com/breakingviews/2012/06/14/opec-cant-afford-to-give-residents-cheap-oil/>, Accessed:7/7/12, LPS)

**Bargain price oil is a standard perk for residents of crude-exporting nations. To the governments which set the low domestic price, such subsidies look like a way to buy popularity without any cash outflow. But the practice is expensive for** members of the **O**rganization of the **P**etroleum **E**xporting **C**ountries, which meets in Vienna this week. It’s well past time for a change. Overall the 12 countries guzzle 57 percent more oil than a decade ago, according to figures from Deutsche Bank, with Saudi Arabia using nearly twice as much. Smaller members have been on the same course. Consumption has trebled in Angola, doubled in Ecuador and climbed 55 percent in Venezuela. OPEC members also seem to be becoming less efficient. Oil usage per head is up 24 percent since 2000, Deutsche says, while it is flat for the globe as a whole. **The habit of doling out cut-price crude to citizens is largely to blame.** Thanks to excise taxes, drivers in developed economies generally pay much more than the market price per gallon of petrol. **Thanks to sub-market prices, OPEC motorists pay much less, and have little financial incentive to ration their use.**

#### OPEC has no motivation or reason to flood the market-its wasteful consumption and reduces the oil supply on the market and makes prices more volatile

**Swann 6/12**(Christopher, a Reuters Breakingviews columnist, Reuters, “OPEC Can’t Afford to Give Residents Cheap Oil,” <http://blogs.reuters.com/breakingviews/2012/06/14/opec-cant-afford-to-give-residents-cheap-oil/>, Accessed:7/7/12, LPS)

**For importers, the uneven treatment is costly. The wasteful consumption in exporting countries reduces the supply available for the global market, presumably pushing up the price. It also cuts into the potential reserve capacity, making the price more volatile.But OPEC members don’t really gain, either. Governments lose potential export revenue and state-owned oil producers lose potential income. I**n 2010, the opportunity cost of discount domestic pricing was roughly 15 percent of OPEC’s total oil export revenue of $770 billion, according to International Energy Agency calculations. Such largesse adds to the fiscal strain on many of these nations – contributing to the exporters’ hunger for ever higher global oil prices.Of course, weaning the public off cheap oil is no mean feat. Nigeria’s government recently backed down after trade unions protested against proposals to end subsidies on imported petrol. But as domestic oil consumption rises, OPEC nations have more to lose from refusing to bite the political bullet.

### OPEC can’t control prices

#### This is not the 80’s-OPEC can’t control oil market prices

**Macdonald, 12** (Gregor, a researcher and investor in the energy sector, Gregor.us, “the Cruel Math of the Marginal Barrel, <http://gregor.us/opec/the-cruel-math-of-the-marginal-barrel/>, Accessed: 7/7/12, LPS.)  
**For over 30 years, OPEC has produced less than half of the world’s oil. Indeed, as of today, OPEC produces only a little more than 40% of the world’s oil.** But most of the world’s spare capacity has been held by Gulf State producers. Thus OPEC, primarily Saudi Arabia, has long been able to control the price of oil in not one, but two, directions. Historically this has meant that the concentration of oil pricing power resided with OPEC and its largest producer, Saudi Arabia. **But starting in 2005, global oil markets sensed that OPEC was only able to influence the price of oil in one direction: higher, by lowering output. OPEC’s ability to lower prices started to crack, break up, and generally fail as the first phase of oil’s repricing headed into 2008.** Indeed, OPEC raised production several times in the 2004-2008 period, attempting to restrain oil prices as it moved to protect the global economy from an oil shock. **However, the oil market, which was going through a fundamental transition at the time, as it reoriented itself towards insatiable, price-insensitive demand from Asia** — paid little attention.

#### OPEC is not a cartel-there is no evidence that they have the capacity

**Colgan, 11** (Jeff, Assistant Professor at the School of International Service at American University in Washington DC. He completed his PhD at Princeton University, “The Emperor Has No Clothes: The Limits of OPEC in the Global Oil Market,” http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEaD5kDZbQKdg, Accessed: 7/8/12, P.5, LPS) **The extent of OPEC’s impact is hidden by the complexity of the world oil market and the lack of transparency about underlying causes of market prices. Some people observe that the production cost of oil in OPEC countries is considerably lower than the market price, and conclude that since OPEC does not increase its oil production until marginal cost equals marginal revenue, it must be a cartel. Yet this is not necessarily the case: low production rates in some countries could be better explained by other factors, such as the individual preferences of certain oil-rich countries, or production constraints due to the poor business climate common among many oil-producing states. Indeed unequal marginal production costs around the world are a characteristic of many industries, not just the oil industry. Moreover, even if it is the case that individual members of OPEC, such as Saudi Arabia, face economic incentives to restrict production in order to increase the average cost of oil, that does not make OPEC. A cartel is defined as a group of firms (or states, in this case) that creates agreements about quantities to produce or prices to charge. “A cartel must not only agree on the total level of production but also on the amount produced by each member.” To be properly considered a cartel, it must be the case that OPEC membership causes states to adopt different market behavior than they otherwise would. Perhaps surprisingly, those who have investigated the effectiveness of OPEC as a cartel have had difficulty finding conclusive evidence. Alhajji and Huettner find that neither OPEC nor the OPEC core can be characterized as a dominant producer in the world crude oil market, 1973-1994. Kohl argues that OPEC’s efforts to manipulate prices have been undermined by political events.10 Smith finds that “OPEC is much more than a non-cooperative oligopoly, but less than a frictionless cartel (i.e., multi-plant monopoly).”11 Furthermore, Smith’s analysis relies on rather indirect evidence of cooperative behavior. Gulen finds that OPEC was effective only in the period from 1982 to 1993.12 Even if OPEC has little impact on the fundamentals of the oil market, it can still have a short-term impact on oil prices based purely on perceptions. Thus it is perhaps not surprising that the best evidence that OPEC can effectively move the price of oil comes from investigations of OPEC announcements and public statements, rather than the actual production behavior of its members. For instance, Hyndman finds that OPEC announcements have an (asymmetric) ability to move spot prices for 15 to 20 days, but he offers no evidence that OPEC is actually restricting output. (This finding is surprising because the price of oil sharply fell from 1982 to 1986, which hardly indicates the strength of the cartel.) Overall, there is little direct evidence that OPEC actually influences world oil prices or operates as an effective cartel.**

#### OPEC is ineffective as a cartel- can’t influence production rates and has almost zero lasting impact on world oil prices

**Colgan, 11** (Jeff, Assistant Professor at the School of International Service at American University in Washington DC. He completed his PhD at Princeton University, “The Emperor Has No Clothes: The Limits of OPEC in the Global Oil Market,” [http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEaD5kDZbQKdg](http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEa), Accessed: 7/8/12, P.1, LPS)  
Most scholars and policymakers believe OPEC can and does influence the price of oil by acting as a cartel. This paper argues **that most of the conventional wisdom about OPEC is wrong. OPEC rarely if ever influences the oil production rate in its member states. Further, OPEC has almost no lasting impact on world prices, except under rare conditions.** There was one occasion on which OPEC did have a significant impact on world oil prices, namely the 1973 oil crisis, but OPEC’s role in the event has been greatly misunderstood. The circumstances of the crisis were highly exceptional, making it unlikely that the organization could ever have a similar impact on world oil prices again. This paper seeks to correct the misunderstanding about OPEC’s role, and replace it with a better understanding of the organization. I argue **that OPEC is dysfunctional as a cartel, as it has little or no causal impact on its members’ choices about production levels or investment in production capacity. OPEC’s role is obscured in part by the complexity of the world oil market, and in part by misdirection by policymakers, especially within OPEC.** Many scholars, especially economists, have argued that OPEC should be understood as a cartel designed to solve a Prisoner’s Dilemma (PD) coordination game. Yet **OPEC’s persistence is better understood as a widespread failure to update beliefs about the organization, a failure that is driven by information asymmetry and politics. The fact that such a widespread belief about the world’s most important commodity market could be wrong can help us better understand international regimes.**

#### OPEC doesn’t have the same control of the markets that it did in the 70’s and 80’s

**Colgan, 11** (Jeff, Assistant Professor at the School of International Service at American University in Washington DC. He completed his PhD at Princeton University, “The Emperor Has No Clothes: The Limits of OPEC in the Global Oil Market,” [http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEaD5kDZbQKdg](http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEa), Accessed: 7/8/12, P.2, LPS)  
**There was one occasion on which OPEC did have a significant impact on world oil prices, namely the 1973 oil crisis. Yet OPEC’s role in the crisis has been greatly misunderstood. The circumstances of the crisis were highly exceptional, making it unlikely that the organization could ever have a similar impact on world oil prices again.** While OPEC did take actions that contributed to the dramatic increase in world oil prices in 1973, those actions had little to do with restricting oil supply. In fact, OPEC production hardly declined at all. The 1973 oil crisis had multiple causes, but probably the most important was the decision by OPEC to dramatically increase the “posted price” of its oil, thereby raising the tax and royalty payments that the major international oil companies had to pay OPEC governments. As I explain below, **such posted prices no longer exist (taxes are now typically indexed to market prices), meaning that OPEC could not raise prices in this way again. The popular and scholarly misunderstanding of the events of 1973 is consequential, as it has endowed OPEC with an almost mythical status as a manipulator of world oil markets.**

#### OPEC isn’t a cartel- they can’t cheat the world market-there’s no evidence-don’t let them claim empirics

**Colgan, 11** (Jeff, Assistant Professor at the School of International Service at American University in Washington DC. He completed his PhD at Princeton University, “The Emperor Has No Clothes: The Limits of OPEC in the Global Oil Market,” [http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEaD5kDZbQKdg](http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEa), Accessed: 7/8/12, P.6, LPS)  
**Despite this lack of evidence, many scholars continue to assume that OPEC cartel profits exist. For instance, Blaydes argues that there is an intra-OPEC bargaining game to divide the cartel’s profits. What is striking about these findings is that it is plausible that OPEC announcements have an impact on oil prices entirely because of perceptions: the markets believe OPEC matters, and thus it does, at least in the short-term. Perceptions matter. Yet announcements can have at most a short-term impact if they do not represent genuine facts about the underlying supply and demand. Evidence of a more fundamental link between prices and OPEC behavior, i.e., its oil production, is remarkably elusive. Consequently, there is a need to have a fresh look at the evidence. As Downs, Rocke and Barsoom have argued, states are reluctant to make international agreements that require costly adjustments to their behavior. In brief, she argues that oil-rich states “subsidize” oil-poor states by allowing oil-poor states to cheat on their OPEC quotas to a greater extent than the oil-rich ones do. Yet Blaydes provides no evidence of cartel profits. Empirically, she studies only the behavior of the OPEC members, and does not compare them to non-OPEC members, so it is not possible to assess how either the oil-rich or oil-poor OPEC states’ production behavior differs from other states. 16 This suggests that OPEC quotas might not actually require states to deviate significantly from their counterfactual behavior in which no quotas existed. And to the extent that they do, OPEC members have strong incentives to cheat on their quotas by over-producing (since producing more oil brings in more revenues).17 14 Demirer and Kutan, 2006 OPEC has no direct way of enforcing its agreements, other than by persuasion or rather blunt, indirect methods (such as when Saudi Arabia abandoned its role as swing producer for OPEC in 1985-86, thereby decreasing the price of oil and hurting its fellow OPEC members). The effect of all of this cheating has never been fully quantified and analyzed in a rigorous way. Thus a new examination of OPEC’s role in the world market for oil is needed.**

#### OPEC has no control of oil prices or cartel power- they are used as a political scapegoat

**Colgan, 11** (Jeff, Assistant Professor at the School of International Service at American University in Washington DC. He completed his PhD at Princeton University, “The Emperor Has No Clothes: The Limits of OPEC in the Global Oil Market,” [http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEaD5kDZbQKdg](http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEa), Accessed: 7/8/12, P.2, LPS)  
This paper seeks to correct that misunderstanding, and replace it with a better appreciation of why OPEC exists. I argue that OPEC is dysfunctional as a cartel, as it has little or no causal impact on its members’ choices about production levels or investment in production capacity. I make no claim about whether OPEC could affect its members’ oil production; I simply argue that it does not do so in practice. I show that cheating in OPEC – *i.e.,* oil production by member states in excess of their stipulated market allocations – is endemic: its nine core members cheat on their aggregate quota 96 percent of the time. Perhaps even more significantly, the quotas themselves often appear to be post-hoc justifications of production decisions made by individual states. This paper is not the first to highlight the problem of cheating or to question OPEC’s effectiveness.1 Still, no other analysis demonstrates the emperor truly has no clothes. Using a variety of quantitative analyses of OPEC quotas and production, including a cross-national time-series regression of oil depletion rates, I show that **OPEC membership is not correlated with lower oil production once other relevant factors are controlled for. As a whole, there is no evidence to suggest that OPEC exerts a significant influence on its members’ oil production policies. If OPEC does not operate as a cartel, why do so many people believe that it does? OPEC’s role is obscured in part by the complexity of the world oil market, and in part by misdirection by knowledgeable actors, especially within OPEC. For OPEC leaders, the perceived market power of the organization is a useful fiction that generates political benefits with domestic and international audiences. Consequently, policymakers within OPEC have no incentive to undermine the idea that OPEC controls world oil prices.** This does not necessarily mean that they are actively lying, but rather that they have an incentive to behave in ways that are consistent with the belief that OPEC is effective as a cartel, so long as that behavior is not too costly. **Furthermore, business executives and politicians in non-OPEC members sometimes find OPEC a useful scapegoat to blame for high oil prices.** This creates a situation characterized by the old phrase, ‘those that know don’t tell, and those who tell don’t know.’

#### OPEC is a political scape-goat-politicians use perception to blame the OPEC

**Colgan, 11** (Jeff, Assistant Professor at the School of International Service at American University in Washington DC. He completed his PhD at Princeton University, “The Emperor Has No Clothes: The Limits of OPEC in the Global Oil Market,” [http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEaD5kDZbQKdg](http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEa), Accessed: 7/8/12, P.26, LPS)  
**Similarly, other actors find “OPEC-as-cartel” a politically useful narrative. Multinational oil company executives find OPEC a useful scapegoat in oil-importing countries: politicians and journalists blame OPEC for high prices whenever they occur. Oil executives presumably are satisfied that the body politic has someone else to blame for oil prices, and thus are content to leave the OPEC-as-cartel narrative in place.** **Financial experts and commodity traders in the oil market may also be aware that OPEC has little impact on the long-term fundamentals of oil production and inventories, but that is not their only concern. They must be concerned about perceptions in the oil market, and OPEC announcements do matter in the short-term as price-signals that affect perceptions. As for the long-term fundamentals, market traders have their own data on oil inventories and production.**

### Price drops unsustainable

#### No oil company has the ability to single-handedly lower the price of oil in the status quo-non sustainable

**Macdonald, 12** (Gregor, a researcher and investor in the energy sector, Gregor.us, “the Cruel Math of the Marginal Barrel, <http://gregor.us/opec/the-cruel-math-of-the-marginal-barrel/>, Accessed: 7/7/12, LPS.)  
But there’s **another component to this new belief in the changing global landscape for oil: the dawning awareness that OPEC’s power has finally gone into decline**. You can read the celebration of OPEC’s waning in power in practically every publication from Foreign Policy to various political blogs and op-eds. David Ignatius of the Washington Post wrapped up nearly all of the recent claims in a nice bundle in his May 4, 2012 piece, An Economic Boom Ahead?, when he quoted PFC Energy’s Robin West: While it’s true that the Americas hold great promise to convert natural gas resources to higher production levels, that is not the case with oil. **The celebration of a geo-political swing in energy power therefore misses a crucial point: No region — from OPEC to Non-OPEC, from Africa to Russia — has the single-handed ability to lower the price of oil now, because none can bring on new supply quickly enough for a long-enough sustained period of time.** And there is more to this story than meets the eye.

#### OPEC can’t sustainably “lower” the price of oil-even if it had the capacity to, the prices wouldn’t stay long-term

**Macdonald, 12** (Gregor, a researcher and investor in the energy sector, Gregor.us, “the Cruel Math of the Marginal Barrel, <http://gregor.us/opec/the-cruel-math-of-the-marginal-barrel/>, Accessed: 7/7/12, LPS.)  
Instead, supply disruptions at small producers and in small regions had a greater influence on oil price (pushing it higher) than OPEC’s influence on attempting to push the price lower.**It’s actually not clear that OPEC has had any measurable influence on restraining oil prices for years.** Summer hurricanes in the Gulf of Mexico, unrest and outages in the Niger Delta, and various strikes presented greater upward pressure on oil prices than upward OPEC supply changes. **Let’s imagine for a moment that OPEC could, if it chose to, pour an extra 3 mbpd of oil on the world market. And that by doing so, it could lower the price of WTIC oil to $90 or less.** What would that accomplish? And for how long would such “lower” prices last? In [Part II: The Cruel Math of the Marginal Barrel](http://www.chrismartenson.com/martensonreport/cruel-math-marginal-barrel), we explain that **while fluctuations in economic activity can certainly raise and lower the price of oil, there are deeper structural reasons why OPEC — even with its spare capacity — can no longer sustainably “lower” the price of oil.** Moreover, we will discuss how, paradoxically, any surge of supply from OPEC which did persuasively lower the price of oil could wind up having the opposite effect on price eventually thereafter. Surprising? Yes, but not strange or unlikely, for reasons we will explain. Finally, we conclude that oil’s *floor price –*outside of volatile 30-90 day periods — is higher than ever before. This will make for a large surprise, should another acute phase of the financial crisis rock oil prices lower over a 2-3 month period.

### OPEC isn’t unified

#### OPEC is lacking in unity

**Swartz, 9** (Spencer, Vice President and Associate Director, Energy and Sustainability Practice at Fleishman Hillard Past: Regulatory affairs adviser at Neste Oil Corp, Senior OPEC Correspondent at The Wall Street Journal, Correspondent, The Wall Street Journal, “Oil Prices: If OPEC Unity Frays, Crude Prices Could Fall,” May 13, 2009, <http://blogs.wsj.com/environmentalcapital/2009/05/13/oil-prices-if-opec-unity-frays-crude-prices-could-fall/>, Accessed: 7/9/12, LPS)

**That’s why this latest data point is so critical. It’s the first time since last July that OPEC members have increased output and the first sign that unity is breaking down. If it seems like just yesterday that prices were heading up and things were looking bullish, that’s because it was just yesterday that crude prices topped $60 a barrel for the first time since November. At those prices, crude producers could breathe a sigh of relief and maybe not have to cut capital budgets further and conserve cash. Renewable energy folks, sweating over low crude prices they couldn’t possible compete with, were starting to get hopeful again. The production increase – as if the global recession and rising oil prices weren’t already a good enough deterrent – further diminishes the prospect of OPEC announcing any production cut when it meets in Vienna May 28. After months of reducing its output by around 150,000 barrels a day more than its OPEC quota obliges it to, Saudi Arabia, OPEC’s top dog, will be in no mood to hear Iran talk about more cuts when the Persian state is pumping some 400,000 barrels over its quota, according to OPEC’s latest data.**

#### OPEC unity low in the status quo-even if quotas and reductions are agreed upon, its doubtful that oil will rebound soon-that only further decreases unity

**Mouawad, 8**(Jad is the airline correspondent for The New York Times who covered the global energy industry, reporting on oil and gas developments around the world, OPEC politics, and renewable energy, he graduated from Brown University and later earned a master's degree in political science from the Institut d’Études Politiques de Paris, The New York Times, “Falling Oil Prices Test OPEC’s Unity,” October 27, 2008, <http://www.nytimes.com/2008/11/27/business/worldbusiness/27iht-opec.1.18196708.html?pagewanted=all>, Accessed: 7/9/12, LPS)

**The meeting this weekend may include proposals to open consultations with producers outside the cartel, the Iranian envoy has indicated, and could set the contours for a coordinated response by OPEC and non-OPEC producers, including Mexico and Russia. In the late 1990s, Norway and Mexico trimmed their production to bolster oil prices after the Asian economic crisis. The Russian energy minister, Sergei Shmatko, suggested Tuesday that his country might reduce its output in tandem with OPEC. He said that Russia required $95 a barrel next year; otherwise its budget would be strained and its currency would suffer, he said. But with its production already declining this year because of a lack of investments, it is unlikely that Russia will follow through, analysts said. Over the past decade, OPEC has stepped in three times with large production cuts to stop prices from falling - in 2001, 2003 and 2006. Only once, however, did producers fully comply with their pledges to trim their output, according to analysts at Barclays Capital. When prices last fell toward $50 a barrel, at the end of 2006, members of the cartel agreed to cuts totaling 1.7 million barrels a day but they cut only 900,000 barrels a day, according to Barclays. Yet prices rebounded because oil production from non-OPEC producers, like Mexico and Norway, was disappointing and consumption kept rising. Even if OPEC agrees to reduce its output further, it is doubtful that oil will rebound soon. In the past, it has typically taken three to six months for oil prices to rise after OPEC trims supplies, according to Deutsche Bank. "In terms of crude oil, we believe downward pressure on prices is likely to persist throughout next year," according to a report by Deutsche Bank. "OPEC will struggle to cut production as fast as world growth is slowing over the next 12 months."**

### Oil price drops hurt OPEC’s unity

#### Drop in oil prices lowers OPEC’s unity

**Mouawad, 8** (Jad is the airline correspondent for The New York Times who covered the global energy industry, reporting on oil and gas developments around the world, OPEC politics, and renewable energy, he graduated from Brown University and later earned a master's degree in political science from the Institut d’Études Politiques de Paris, The New York Times, “Falling Oil Prices Test OPEC’s Unity,” October 27, 2008, <http://www.nytimes.com/2008/11/27/business/worldbusiness/27iht-opec.1.18196708.html?pagewanted=all>, Accessed: 7/9/12, LPS)

**NEW YORK — For the first time in a decade, oil producers are facing a real test of their unity. As the Organization of Petroleum Exporting Countries prepares to meet in Cairo on Saturday, exporters are being pummeled by a triple whammy of lower prices, falling demand and declining revenue. The group, whose members account for more than 40 percent of global oil exports, is desperately seeking ways to stop the drop in prices, which have fallen from their summer peaks at a record pace. But OPEC is increasingly torn between its moderate members, led by Saudi Arabia, which can afford a period of lower oil prices, and countries with high government spending, like Iran and Venezuela, which have become much more dependent on high prices.These two groups have often clashed in the past, and as prices plummet the tensions are once again bubbling to the surface. When oil prices collapsed to $10 a barrel in 1998, OPEC producers managed to set aside their squabbles to push prices back up. Thanks mostly to a growing global economy and tightening supplies, producers saw a sharp rally in oil prices over the past 10 years. But as the global economy has sputtered, the recent decline in oil prices has been staggering, and producers have been incapable of slowing the slide.**

#### Drop in oil prices make unity hard-quota disagreements hurt political and economic foundations

**Mouawad, 8** (Jad is the airline correspondent for The New York Times who covered the global energy industry, reporting on oil and gas developments around the world, OPEC politics, and renewable energy, he graduated from Brown University and later earned a master's degree in political science from the Institut d’Études Politiques de Paris, The New York Times, “Falling Oil Prices Test OPEC’s Unity,” October 27, 2008, <http://www.nytimes.com/2008/11/27/business/worldbusiness/27iht-opec.1.18196708.html?pagewanted=all>, Accessed: 7/9/12, LPS)

**But a decision is far from certain and some producers are dragging their feet. The president of OPEC, Chakib Khelil, said the group needed to see how well producers were complying with their prior commitments to pare supplies before agreeing to a new cut. The group is scheduled to meet again in Algeria next month**. "There are disagreements between producers," said Greg Priddy, an oil analyst at Eurasia, a political consulting group in Washington. "**Some members are below their pain threshold, especially Iran. But the Saudis will not allow themselves to be strong-armed. They want to see how everyone is complying before agreeing to another round of cuts." Guy Caruso, the former administrator of the U.S. Energy Information Administration, said the Saudis had been cautious so far, trying to balance their budget requirements with concerns about the global economy. Even if OPEC agreed to a new cut in production, analysts doubt that all the countries would abide by their quotas, and it would fall to Saudi Arabia to shoulder the brunt of the cutbacks. "The Saudis have the longer-term view," Caruso said. "They don't want to be in the situation they were in the 1980s when almost all the burden fell on them to defend the price." The drop in prices is threatening the economic and political foundations of many oil producers. The populist Iranian president, Mahmoud Ahmadinejad, is expected to run for re-election next year while President Hugo Chávez of Venezuela is facing opposition at home. Both countries need oil to cost more than $90 a barrel to balance their budgets, according to various estimates. "The Iranians, the Russians and the Venezuelans, who had benefited the most from the rise in price, are the ones paying dearly now with the collapse," said Lawrence Goldstein, a veteran energy analyst. But while different producers have competing agendas, the drop in prices has been so rapid that even moderates are feeling the sting. "Prices have gotten to a point that they are hurting everybody now," Goldstein said. "A world of $50 oil or less is in no one's interest within the organization."**

### Market is controlled by real events

#### Oil prices fluctuation is not OPEC-Chinese energy consumption affects the market-OPEC can’t control the market

**Colgan, 11** (Jeff, Assistant Professor at the School of International Service at American University in Washington DC. He completed his PhD at Princeton University, “The Emperor Has No Clothes: The Limits of OPEC in the Global Oil Market,” [http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEaD5kDZbQKdg](http://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=0CFAQFjAA&url=http%3A%2F%2Fwww.princeton.edu%2F~pcglobal%2Fconferences%2Fenvironment%2Fpapers%2Fcolgan.pdf&ei=WfT5T5vwCsi4rQHOmv2KCQ&usg=AFQjCNFhMkygdzVzIvzBWYzIWn5LEOwtjA&sig2=Ith3LmU9DrEa), Accessed: 7/8/12, P.29, LPS)  
It also appears to fall within a larger class of international regimes that have outlived their original mandates, which have been the object of recent research.65 Further, the findings imply that scholars of international trade and power politics should be wary of the assumption that OPEC has significant market power; rather, it may be more appropriate to model the market decisions of individual OPEC members, such as Saudi Arabia. Finally, this paper contributes to recent arguments that suggest that the extent of the international security threat posed by OPEC to oil-importing countries is often exaggerated.66**In the realm of practical politics, journalists and pundits should stop using the blind assumption that OPEC’s actions are one of the fundamental drivers of world energy markets. They are not. Most of the credit or blame for rising oil prices in recent years rests with the energy demands of millions of Chinese customers, not diabolic moves by OPEC leaders.** Moreover, policymakers in oil-importing countries, especially the United States, should stop being so fearful and resentful of OPEC. Legislation such as the various “NOPEC” bills in the US Congress may be useful for scoring political points, but they have little bearing on the reality of the global oil markets. **With the world price of oil set by market forces almost entirely outside of its control, OPEC is along for the ride like everyone else.**

## Impact Turns

### High Oil Prices Hurt Econ

#### High Prices drops Econ, not dips in prices

Plumer 12 (Brad, Reporter at the Washington Post , 4/13/12,Washington Post, If Oil Prices Drop Will That boost the Economy, http://www.washingtonpost.com/blogs/ezra-klein/post/if-oil-prices-drop-will-that-boost-the-economy/2012/04/13/gIQACcF4ET\_blog.html)DD

Instead, the real impact of oil prices stabilizing would likely be that they can’t wreak further havoc on the economy. This was a real worry. Many car industry analysts, for example, have been encouraged by the strong auto sales figures in the past few months. But, they warn, if gasoline prices keep bouncing around, consumers might put off buying a car yet again. A March survey by research firm TechnoMetrica found that the number of Americans hoping to buy or lease a car in the next six months had halved of late, thanks to higher fuel prices. Of course, even if the oil prices stabilize or dip slightly, they’re still high by historical levels. As Stuart Saniford demonstrates with charts, current oil prices are well above the levels during the 1970s oil shocks, even after adjusting for inflation.

#### High Oil prices leads to a recession

Tverberg 12 (Gail, writer and speaker about energy issues, Why Low Oil Prices Indicate the World is Heading for a Recession,07/5/12, Oil Prices, http://www.theburningplatform.com/?tag=gail-tveberg) DD

Are lower oil prices good news? Not really, if it means the world is sinking into recession. We know from recent past experience and from common sense that higher oil prices are a drag on oil importing economies, since if more money are spent on the same amount of oil, there is less to spend on discretionary goods and services. In addition, oil money sent to oil exporting countries is likely to be spent within those economies, rather than being reinvested in the oil importing company that the funds came from. Below the fold, we will discuss what is really happening with oil prices, and consider reasons why lower oil prices may be a signal that the world is again headed for deep recession.

#### High oil prices lead to a worse economy

Katusa 11 (Marin, writer for the Kasey Report,What Low Oil Prices Really Mean,9/23/11, Money Show,http://www.minyanville.com/businessmarkets/articles/oil-prices-oil-stocks-energy-prices/9/23/2011/id/37034?page=full) DD

Oil prices in large part reflect global sentiment toward our economic future -- prosperous, growing economies need more oil while slumping, shrinking economies need less, and so the price of crude indicates whether the majority believes we are headed for good times or bad. That explains the worry -- worried investors and economists are using oil prices as an indicator, and falling prices indicate bad times ahead. But oil prices have to correct when economies slow down, or else high energy costs drag things down even further. And the current relationship between oil prices and global economic output is not pretty. In fact, every time the cost of oil relative to global production has hit current levels -- and that’s after the sharp corrections earlier this month -- an economic slump, if not a recession, has followed, according to a Reuters article. The “warning signal” that is currently flashing red is the Oil Expense Indicator, which is the share of oil expenses as a proportion of worldwide gross domestic product (specifically, it is oil price times oil consumption divided by world GDP).

### Aff Turn- Coal/ Oil Shocks

#### Less dependence on oil saves global econ from oil shocks

Rasmussen and Roitman 2011 (Tobias N & Agustin, August 2011, Senior economist in the IMF’s Middle East and Central Asia Department, and Economist at the International Monetary Fund IMF Working Paper, Oil Shocks in a Global Perspective:

Are they Really that Bad? , <http://www.imf.org/external/pubs/ft/wp/2011/wp11194.pdf>, p.16)DD

Controlling for global economic conditions, and thus abstracting from our finding that oil price increases generally appear to be demand-driven, makes the impact of higher oil prices stand out more clearly. For a given level of world GDP, we do find that oil prices have a negative effect on oil-importing countries and also that cross-country differences in the magnitude of the impact depend to a large extent on the relative magnitude of oil imports. The effect is still not particularly large, however, with our estimates suggesting that a 25 percent increase in oil prices will cause a loss of real GDP in oil-importing countries of less than half of one percent, spread over 2–3 years. One likely explanation for this relatively modest impact is that part of the greater revenue accruing to oil exporters will be recycled in the form of imports or other international flows, thus contributing to keep up demand in oil-importing economies. We provide a model illustrating this effect and find supporting empirical evidence. The finding that the negative impact of higher oil prices has generally been quite small does not mean that the effect can be ignored. Some countries have clearly been negatively affected by high oil prices. Moreover, our results do not rule out more adverse effects from a future shock that is driven largely by lower oil supply than the more demand-driven increases in oil prices that have been the norm in the last two decades. In terms of policy lessons, our findings suggest that efforts 16 to reduce dependence on oil could help reduce the exposure to oil price shocks and hence costs associated with macroeconomic volatility. At the same time, given a certain level of oil imports, developing economic linkages to oil exporters could also work as a natural shock absorber.