

“Twilight of the Oil Age” special report by Paul Salopek, correspondent, Chicago Tribune, July 30, 2006, a 13 full-page news section about the present & future of oil. Also on the web <chicagotribune.com/oil>.

Summary of the report:

A strong message from the report is to get off of oil ASAP and onto options that secure the world's energy supply.

Chapter 1 The Pay Zone

How long will our oil last? Worldwide crude oil production will peak as soon as 2037.

Peak oil theory is based on the studies of M. King Hubbert*, a pioneering U.S. geologist who correctly predicted in the 1950s that America's huge crude output would peak in 1970.

Peak oil theory by Richard Rainwater persuaded President Bush to insert “addicted to oil” in his 2006 State of the Union speech.

U.S. oil refineries have dwindled 50 % to just 145 over 25 years. Public opposition to new oil infrastructure is called “BANANA”, Build Absolutely Nothing Anywhere Near Anybody.

* (Details may be found in “Beyond Oil—The View from Hubbert's Peak” a book by Kenneth S. Deffeyes, an associate of Hubbert at Colorado School of Mines, published 2005 by Hill & Wang, Library of Congress Control Number 2004116475, ISBN-13:978-0-8090-2957-0)

Chapter 2 The Frontier

Enormous energy inputs to industrial agriculture require 16 calories of fossil fuel to produce one calorie worth of grain.

The Hirsch Report (U.S. Department of Energy) warns that it could take decades and unprecedented economic, social, and political costs to transition from oil to fuel alternatives.

The U.S. Energy Information Administration said in 2005 that 58% of all petroleum burned in the U.S. now comes from abroad.

Americans have hitched their 210 million cars and trucks to the crude oil of Africa, the poorest continent on earth. By 2015, Africa will supply 25% of the U.S. imports—a 2/3 increase.

As elsewhere, the “oil curse”, unleashes reckless government spending, fighting over oil loot, and entrenched political thuggery. 80% of Nigeria’s \$340 billion oil revenue is pocketed by 1% of the population (thugs, politicians and generals). 25% of Nigeria’s 2.3 million barrel-a-day crude oil flow is stolen by lawless militias.

Chapter 3 The War

The giant Rumailah oil field in southern Iraq is a war cemetery. The few roads are empty and cratered. The field is guarded by Iraq’s new Oil Protection Force, the custodians of the world’s third-largest petroleum reserves. ‘We are living in the Chicago of gangster times—Mafia Chicago, without the nightclubs,’ says security consultant Mazin Yousif. A former colonel in Saddam’s army, Yousif now works for Olive Group, a British security firm specializing in oil field protection.

Of all the setbacks since the fall of Hussein, few match the ruinous decline of Iraq’s oil sector.

Recently, about 30,000 barrels of Rumailah’s high-quality crude dubbed Basrah Light were headed for Chicago—part of the Middle Eastern energy habit the U.S. vowed to kick after the Arab oil embargo of 1973. (The U.S. still buys 15 to 20 % of its imported crude from the unsettled region.)

What are the hidden costs of America’s imported oil? Milton Copulos, a National Defense Council Foundation economist, reviewing government documents for 18 months fixed a price tag on our addiction to global crude, factoring many of the war costs, reported to the Senate Foreign Relations Committee in the Spring of 2006. The cost reported was eight to eleven dollars a gallon—filling a Jeep gas tank costs \$230. Unaware of true costs of their oil habit, U.S. motorists see no obvious reason to curb their energy gluttony. Many experts think Capulos’ Olympian feat of accounting is still much too conservative.

Mazin Yousif says, 'The Americans will not allow anything too terrible to happen here. If you control Iraq, you control the economy of the world. I think, eventually, the coalition will help Iraq become stable and prosperous like Qatar or Kuwait.'

Is the Saudi bonanza peaking? Saudi Arabia's epic oil reserves are a global insurance policy: a supply of crude so plentiful it can always be counted on, in a pinch, to ease almost any conceivable energy crisis. Or so experts used to think.

Today, some energy analysts are warning that the oil kingdom's fabled bounty may no longer be reliable. Matthew Simmons, Chairman of Simmons and Company, specializes in the energy sector and once served as an unofficial advisor to Bush. Simmon's questioning of the Saudi myth appears in his book, "Twilight in the Desert." He concludes: "Saudi Arabia clearly seems to be nearing or at its peak output and cannot materially grow its oil production."

The U.S. DOE has scaled back its annual estimates of Saudi contribution to the world's long-term oil needs. If the Saudis are hitting a wall, the U.S. must reconsider the estimated \$137 billion annual investment protecting the Middle East's oil fields.

Chapter 4 Last Call

China's GDP is growing at 10%. Its cars will outnumber America's by 2030. Chinese companies use oil from African petro-states and pariah Iran. Now they are moving into traditional U.S. energy turf: Canada, the Middle East, and Latin America.

"People like to think technology will always rescue them," said Rep. Roscoe Bartlett (R-MD), a senior member of the U.S. House Science Committee. "But it still takes two barrels worth of oil energy to pump a barrel out of the ground, you're in a losing game."

Finding an alternative to crude

The price that crude oil would have to reach to make each alternative profitable:

Extra heavy oil	\$16
Natural gas-to-liquids	\$25 per barrel of crude oil
Oil sands	\$30
Ethanol	\$40-45 (for corn-based ethanol)
Coal-to liquids	\$40-45
Biodiesel	\$69
Biomass-to liquids	\$85-90
Hydrogen	Impossible to estimate

(What Victor Davis Hanson said applies to messages in the Salopek report. "The good life sometimes can be lost quite unexpectedly and abruptly when people live for present consumption rather than sacrifice for future investment, or demand rights more than they accept responsibilities, or feel their own culture is not particularly exceptional and therefore in no need of constant support and defense.)

We should tread carefully in these challenging days of our greatest wealth—and even greater vulnerability."

—Tread carefully: The fragility of the good life, by V. Hanson, Chicago Tribune, 7-28-2006

We must act now for energy security.

—Summary prepared by R. Beatty, CFRI