



Thorium & Nuclear Power Policy: A 2010 Update

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Based in Boulder, Colorado, **Richard Martin** has been covering and analyzing the energy industry for more than 20 years. A contributing editor for *Wired*, he is an expert on the conjunctions of technology, the fossil-fuel and renewable

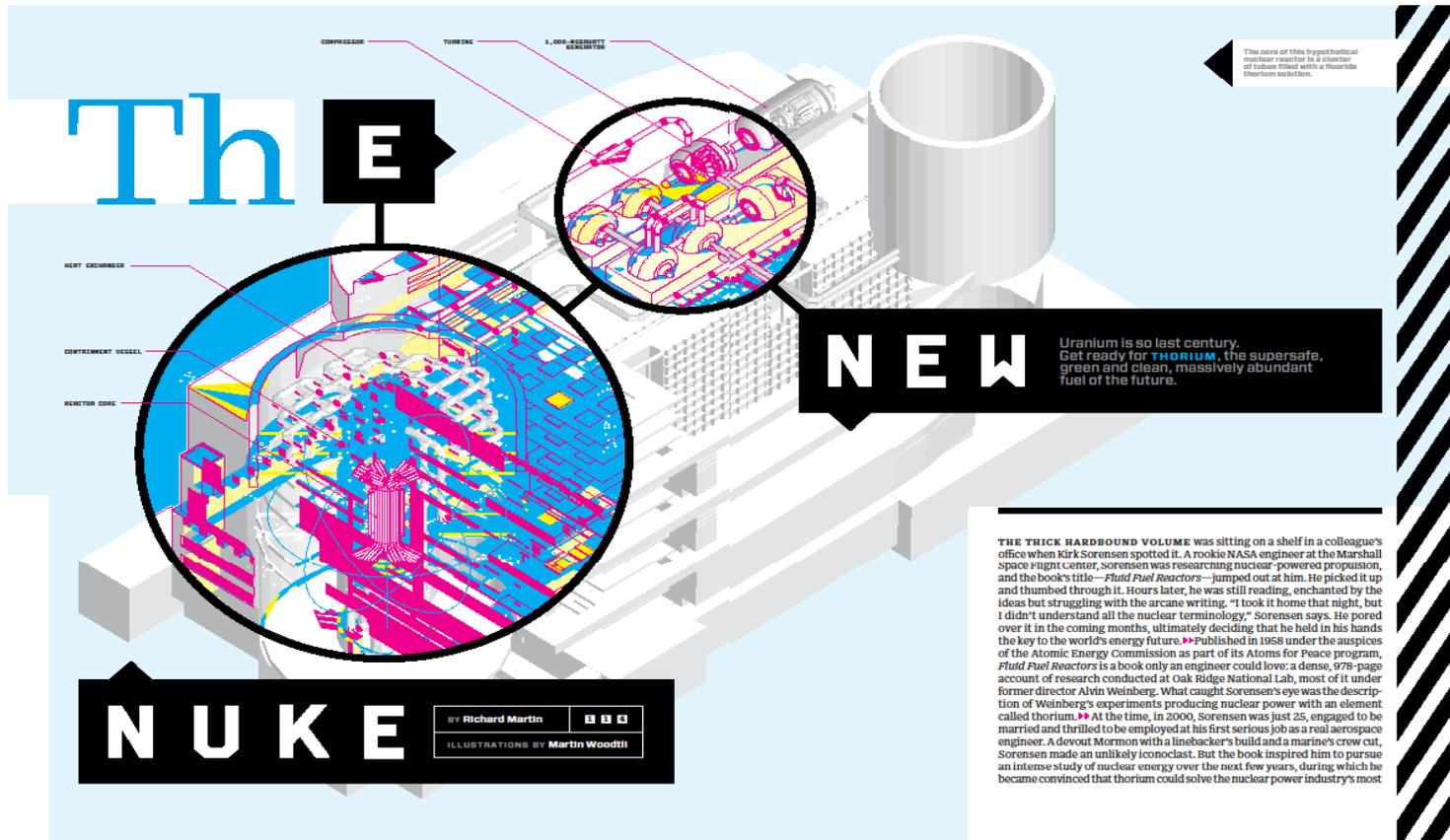
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energy industries, and business strategy. He is also a senior research analyst for Pike Research (www.pikeresearch.com), a boutique clean-tech research



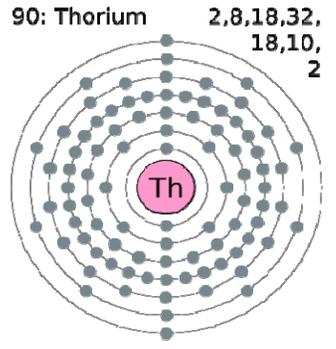
firm based in Boulder. His work has appeared in *Time*, *The Atlantic*, *The Asian Wall Street Journal* and the

Far Eastern Economic Review, and his article "The God Particle and the Grid" (*Wired*, April 2004) was selected for Best Science Writing of 2004.



Wired, Jan. 2010: "The New Nuke"

http://www.wired.com/magazine/2009/12/ff_new_nukes/



Hatch, Reid Introduce Thorium Energy Independence Act of 2010



Office for thorium fuel-cycle research in the DOE



Regulatory framework for thorium-based power generation



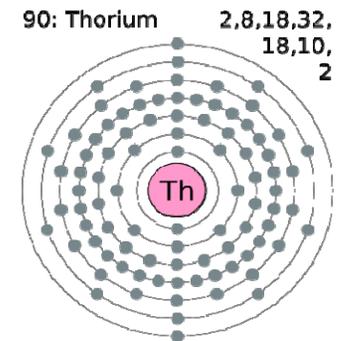
Demonstration projects for thorium-based reactors



International partnerships for nonproliferation through deployment of thorium-based generation



\$250 million in funding, 2011-16



Obama Administration Supports Nuclear Energy



\$8 billion in loan guarantees for new nuclear plants



2011 budget request: DOE support for 6-9 new reactors



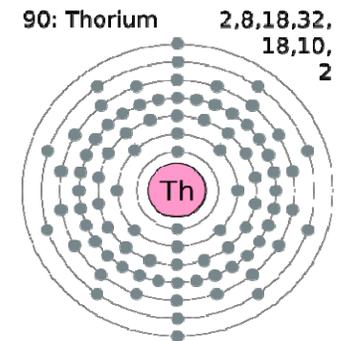
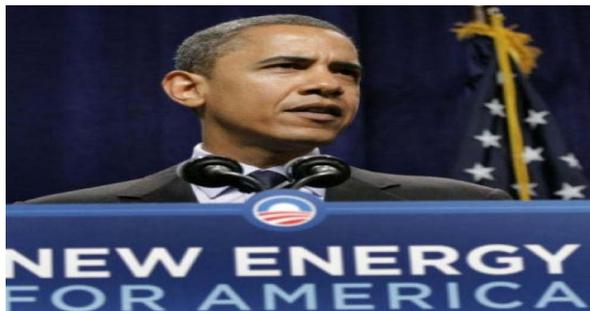
\$39 million for small, modular reactors



New DOE research center: Nuclear Energy Modeling & Simulation Hub



“Blue Ribbon Commission on America’s Nuclear Future”



Sec. Chu's Editorial in The WSJ



“Clean energy to power more than six million American homes ... creating tens of thousands of jobs in the years ahead”



“If we are serious about cutting carbon pollution then nuclear power must be part of the solution”



China, South Korea, India -- “Develop these technologies today or import them tomorrow”



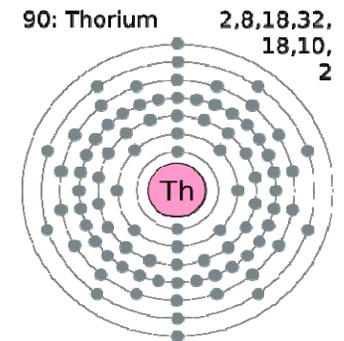
Support for “plug-&-play” SMRs



“Advanced concepts” that “could potentially burn used fuel or nuclear waste:



No mention of thorium

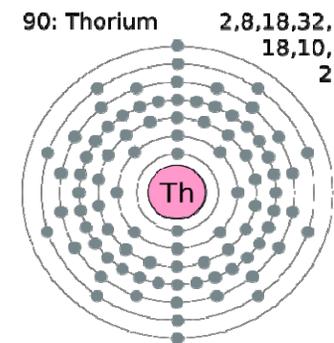


USGS: U.S. Now No. 1 in Thorium Reserves

United States	440,000
Australia	300,000
India	290,000
Canada	100,000
South Africa	35,000
Brazil	16,000
Malaysia	4500
Other	90,000
<u>World</u>	<u>1,300,000</u>



Source: USGS Mineral Commodities Summaries, Jan. 2010



Canada, China Sign Thorium Accord



Atomic Energy of Canada Limited (AECL), Third Qinshan Nuclear Power Company (TQNPC), and Nuclear Power Institute of China (NPIC) to assess use of thorium fuel in CANDU power reactors



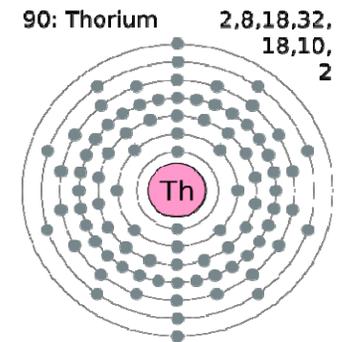
Demonstrate commercial use in CANDU 6 units at Qinshan III, SW of Shanghai



AECL exec: “An important step to demonstrate the use of thorium fuel in commercial CANDU reactors”



Original agreement, for recovered uranium, in Nov. 2008



India, Russia Sign Nuclear Accord



Putin, PM M. Singh meet in New Delhi on energy, defense



Russia to build 12-16 nuclear plants, six by 2017 – “tens of billions”



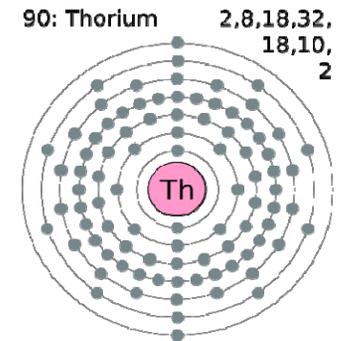
Russia is already constructing two units in the southern state of Tamil Nadu

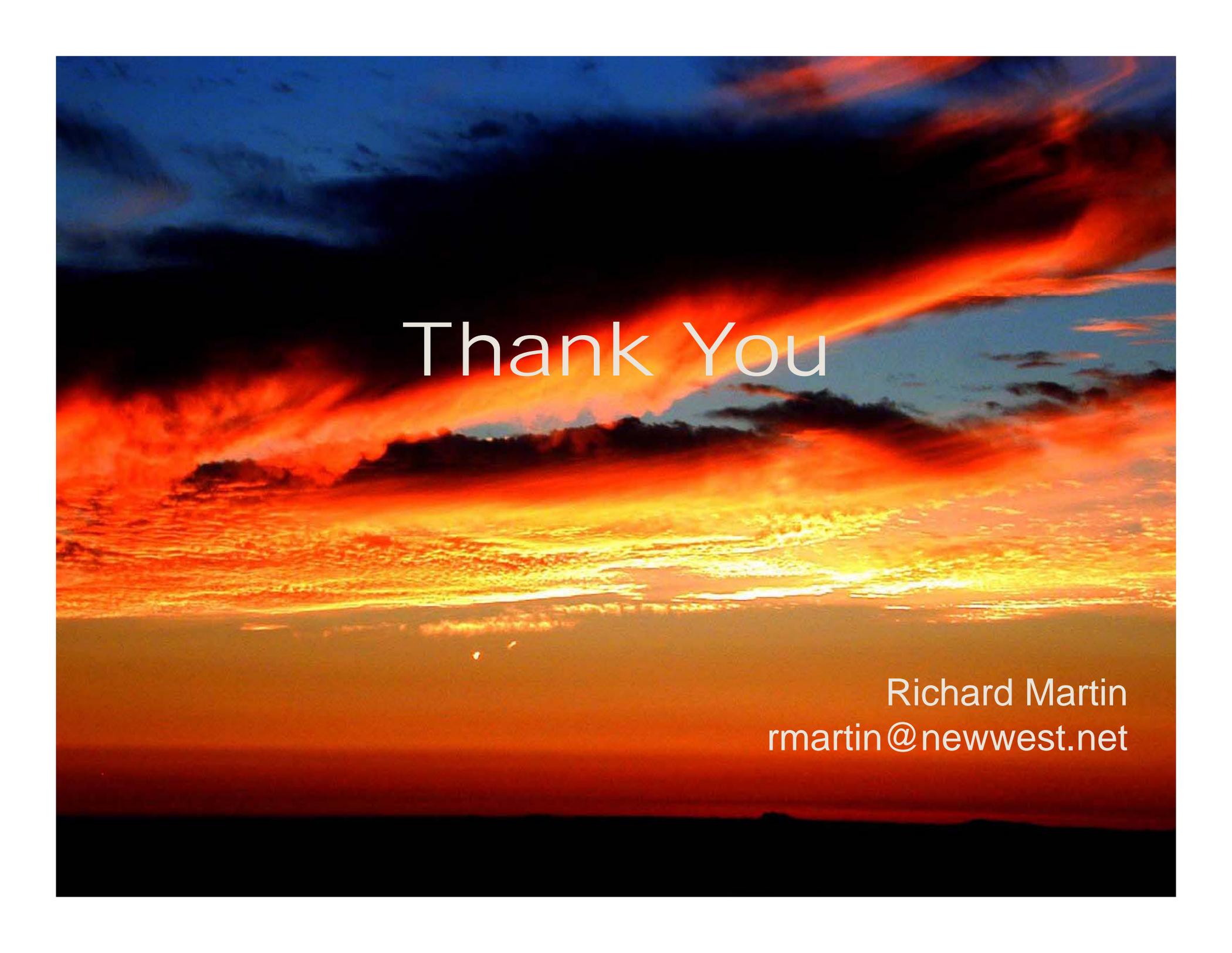


Russia will also supply India with reactor fuel and help with waste disposal



No mention of specific technology





Thank You

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