



## Moon Has Many Useful Materials; Helium-3 Could Power Earth With 10,000 Times More Energy Per Pound Than Ton Of Coal

President Bush, in his proposed Moon / Mars plan, says the lunar soil could be processed to make rocket fuel and create breathable air. But the list goes well beyond that, according to lunar experts. Alan Binder, Lunar Prospector Principal Investigator, tells AP Science writer Malcolm Ritter, "The bulk of the stuff we need to develop an industrial complex on the Moon is all over the place." Silicon can be used to make solar cells to harvest solar energy. Iron could be used to build structures. Aluminum, titanium and magnesium can be used in spacecraft and Earth-orbiting factories. Gerald Kulcinski, director of the Fusion Technology Institute, says carbon and nitrogen could be combined with other elements to grow food on the Moon. The abundance of **helium-3** (scientists estimate about 1 million tons) could be isolated and used in fusion reactors on Earth to generate electricity without producing nuclear waste. [Apollo 17 Moonwalker Harrison Schmitt](#) says importance of helium-3 argues for partnership between private investors and the government. China lunar scientist Yongliao Zhou of CAST is working on a paper called 'A primal calculation of the amount of He3 in the lunar regolith.' Also India, Japan and Russia recognize the great potential of helium-3.



Gerald Kulcinski, Associate Dean For Research, College Of Engineering, University Of Wisconsin-Madison, Says Helium-3 Could Be Cash Crop For Moon As Very Little Is Found On Earth