Testimony of William P. O'Hearn Public Hearing on New Jersey Draft Energy Master Plan NJ Institute of Technology Newark, NJ -- July 26, 2011

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Good afternoon. My name is Bill O'Hearn, and I am a private citizen and "Climate Hawk" who has been following the renewable energy industry in Germany, China, California, and New Jersey for the last three years. I appreciate the chance to comment on the master plan today.

From a green business perspective, the 2011 NJ EMP is an opportunity to drive an industry that is ready to take off and generate thousands of good green jobs for our state. A recent Brookings study reported that 26,000 green jobs were created from 2003-2010 in New Jersey, and we see solar firms that have doubled their staffs in just the last three years.

The prices of solar panels continue to drop and offshore wind projects are moving rapidly to being "first in the water" off our coast. In a down economy, the NJ Solar industry just had its best month ever in June, with 42 megawatts installed in 520 new projects as we moved past 10,000 installed projects, second only to California in the U.S. With the state at a 9.5 percent unemployment rate, we need green jobs; and as a state energy official recently observed, "NJ is the Saudi Arabia of rooftops" (and I would add, parking lots).

I urge the BPU to heavily revise the plan to reflect the huge potential for growth and jobs for New Jersey that is found only in the clean energy industry. Let's not leave these opportunities to other states and other countries by failing to act now.

Some Concerns with Plan Statements and Tone

 Clean energy can now be defined as nuclear, natural gas, and hydroelectric. (page 3)
Renewable energy, especially solar energy, is too expensive and intermittent to meet demand, and solar incentives need to be 'means-tested' to limit costs to ratepayers. (pages 4, 5, 6, 7)

3. Solar is growing quickly on its own, so it doesn't need these expensive incentives. (pages 83-95)

4. Energy conservation programs are expensive and not effective, and should be trimmed. (page 54-55)

5. We need to fall back and invest in natural gas and nuclear, and aggressively expand natural gas pipelines. (page 6)

Responses

- 1. This statement is simply not true. Natural gas, while cleaner than coal, is still a fossil fuel that must be extracted from the earth, transported, and burned to generate electricity. Nuclear energy (uranium) also is mined and involves the use of one of the most toxic substances on the planet.
- 2. The claim that solar energy is "too expensive" and its subsidies should be meanstested also reflects outdated thinking. Fossil fuels are mature technologies that have been heavily subsidized for a hundred years while they have been polluting the atmosphere. What will it cost to clean up the Delaware River Basin as a water supply if it is polluted by fracking fluids used in natural gas extraction? How do we calculate the value of asthma patients whose conditions are affected by air pollution from coal, oil, and natural gas power plants? What will it cost Long Beach Island if the sea rises six or twelve inches in the next fifty years because of climate change? These external costs of conventional power generation are never counted in the economic analysis of electric power, but they must be included to understand the real price of solar and offshore wind vs. fossil fuels.
- 3. Similarly, the rapid growth of solar PV in New Jersey is a result of our high energy prices, federal incentives, and state programs and the green energy industry is not yet ready to run on its own. This expansion is also caused by the understanding that decentralized solar power generation is better for the grid, cuts air pollution, gives users a locked-in energy price for at least the next twenty years, and provides peak power on summer afternoons when electricity demand is highest, not to mention that solar uses much less water than conventional power plants (especially nuclear) and it cannot be targeted by terrorists the way a nuclear power plant can. For these reasons, any economic analysis of solar subsidies must include a much wider examination of these benefits and acknowledge the jobs growth that comes along with solar, offshore wind, and energy conservation.
- 4. While it may be true that demand response and energy conservation programs have not yet achieved their full potential for cutting energy use, that in itself is not a reason to cut these programs. It is widely acknowledged that energy conservation is the cheapest and quickest way to shrink our carbon footprint and lower electricity demand. These programs have underachieved because the state has failed to properly market them to the public, not because of the programs themselves. The state should reinvest in and reinvent the EE programs as a central part of their strategy to achieve lowered energy demand and energy savings.
- 5. Natural gas should be seen as a short-term stopgap to replace coal-generated power, not a long-term solution. Energy conservation and demand response, biofuels, CHP, expanded use of solar carports and electric cars, solar, and wind will be enough to handle our long-term needs if we invest in them and promote them aggressively.

Finally, but perhaps most importantly, the hostile tone towards renewable energy sources (see the use of the word "albatross" on page 7) is inappropriate, inaccurate, and confusing

to the average reader. It must be changed for this plan to meet the state's energy needs for the next ten, twenty, and fifty years.

Steps to Add to the Plan

CONSERVATION.

- Goal should be Energy Audits for all corporate/industrial, schools, and other large buildings
- Aggressive incentives for retrofits of existing buildings
- Increase outreach and marketing efforts

TRANSPORTATION.

- Add land use planning policies and practices that strive to minimize auto miles traveled
- Support the introduction of electric cars and solar carports/recharging stations; encourage fleets (postal service, delivery companies, rental cars, taxis, etc.) to go electric
- Develop renewable natural gas/biomass fuels
- Compressed Natural Gas (CNG) for trucks and buses

RENEWABLES

- Establish one common set of standards and permits to cut the time wasted on conflicting and confusing local rules for installing solar and other renewable energy.
- Call for the re-establishment of the PACE homeowner solar financing program in New Jersey.
- Phase out of coal-generated power in New Jersey by 2025.
- Add solar panels and small wind if appropriate to the governor's mansion and state capitol, as seven other states have already done.
- Note that coal, nuclear and natural gas plants use almost half (more than agriculture) of all the freshwater in the U.S. for cooling, another powerful reason for pursuing clean energy

In short, the Energy Master Plan should call for investing heavily in renewables and generating green jobs, or we risk losing our leadership position in the country and missing a huge economic opportunity. Vision, consistency, and certainty are essential for Wall Street and global companies to invest in clean energy in New Jersey, and it has to start with the NJ Energy Master Plan. Thank you.