House
Legislative
Analysis
Section

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CREATE NEXT ENERGY AUTHORITY

Senate Bill 1316 (Substitute H-2)
First Analysis (6-18-02)

Sponsor: Sen. Bev Hammerstrom
House Committee: Energy and Technology
Senate Committee: Finance

THE APPARENT PROBLEM:

Demand for energy is high, proven fossil fuel resources are finite and dwindling, and unless other sources of energy and technologies compatible with those sources are researched, developed, tested, manufactured, and made widely available, people—especially those who inhabit the more highly industrialized nations of the world—are in for a change of lifestyle. Since September 11, Americans have developed a richer understanding of what some environmentalists have perhaps too luridly diagnosed as the United States' gasoline addiction and some economists have perhaps too stoically described as the U.S.'s high level of energy consumption. Once exotic places and obscure acronyms such as Kyoto, ANWR, and CAFE have entered the vernacular, and the debate between environmentalists and economists is beginning to look quaint to some people. Consumers want inexpensive solutions, but they are increasingly asking for dependable, secure, efficient, clean solutions, and although it may be premature to declare an emerging consensus, many people are convinced that so-called "alternative energies" should and will play a major role in meeting the world's energy needs in the 21st century.

There is no standard definition of "alternative energy", but at its most general level, the term refers to sources of energy that are not petroleum based, including photovoltaics (solar electricity), wind and water energy, methanol and ethanol, and others. Making use of alternative energies often requires the modification of existing technologies or development of new technologies that are compatible with the alternative energy source. At the same time that people are looking to new sources of energy, experts are revisiting the question of where energy should be generated. For the last hundred years or so, most electricity has been produced at large, centrally located plants that transmit and distribute the electricity to their customers over power lines. Many experts believe that the future of energy technology lies in distributed generation (DG)—i.e., the relatively small-scale production of energy on the site where it is consumed. Some DG technologies—such as standby generators—have existed for years, while others such as internal combustion engines fueled by natural gas or renewable fuels and incorporating systems that capture and use waste heat have only recently begun to emerge. The "NextEnergy" legislation uses the term "alternative energy system" to refer to alternative energy systems that generate or release up to ten megawatts; although the legislation does not specifically refer to "distributed generation", the definition of "alternative energy system" more or less refers to alternative energies as they would be used in distributed generation technologies.

These days the alternative energy system creating the loudest buzz among experts on energy, technology, and the environment is the fuel cell. As described by the United States Department of Energy's (DOE) report *Green Power: Fuel Cells*, a fuel cell is an energy conversion device that uses fuel and oxygen to produce electricity, water, and heat. When pure hydrogen is used as the fuel, water and heat are the only "byproducts", making fuel cells a very "clean" and thus an extremely attractive option for meeting future energy needs. The basic cell consists of an anode, cathode, and electrolyte. Like batteries, fuel cells produce direct current (DC) electricity, use chemical reactions instead of burning fuel, and have no moving parts. Unlike batteries, however, fuel cells do not run down or require recharging, and they do require fuel. Fuel cells operate by converting chemical energy directly into electrical energy. While an individual fuel cell generates a relatively small amount of electricity, the cells may be "stacked" to create a higher electrical output. Fuel cells have been around in one form or other since the mid-19th century, when Sir William Grove, a British physicist and lawyer, understanding that electricity could split water into hydrogen and oxygen, reversed the

reaction by combining hydrogen and oxygen to produce electricity and water. In the late 1950s NASA began using fuel cells in its space exploration program, and their success encouraged industry to look into possible commercial applications. Currently, industry is researching, developing, manufacturing, and testing different technologies in the hopes that they can eventually make mass production and commercialization of fuel cells viable and affordable.

Experts believe that fuel cells have strong potential for stationary applications, such as powering and heating individual homes, businesses, or even business parks and industrial facilities, portable applications, such as powering a laptop computer or a cell phone, and vehicular applications. It is far less clear whether fuel cells will ever pose a real threat to the central power plant and electric grid. Within the next few years fuel cells may prove an attractive solution for short-term power outages, for residents as well as businesses, and a business that uses a lot of high-tech equipment might prefer fuel cells and other DG technologies because of the relatively high quality of the electricity that they generate. Some businesses and other customers might even "play the electricity market" by using fuel cells and other DG technologies to generate power when electricity prices are high and then plugging in to the grid when prices are low. Still, the United States enjoys a remarkably reliable and inexpensive supply of electricity, and no one is sounding the death knell of the centralized electric system just yet. While many experts believe that fuel cells and other DG technologies will contribute to the diversification of the energy industry in the foreseeable future, they also suggest that there will still be plenty of room for fossil fuels while they last, nuclear power for those who support it, and renewable "green" energies.

In Michigan, the future of energy sources and technologies takes on added significance given the pivotal role that the automobile industry has played in the state's economy throughout the 20th century and into the 21st. The DOE's Office of Transportation Technologies has supported research and development of fuel cell technology since 1984, and many experts predict that fuel cells will surpass, if not wholly replace, the internal combustion engine in cars, trucks, and other vehicles. In vehicles the internal combustion engine converts chemical energy to thermal energy and then to the mechanical energy which spins the wheels. Fuel cells are more efficient because they convert chemical energy directly into electrical energy. The promise of increased efficiency may help consumers, businesses, and governments in the United States and elsewhere wean themselves from their dependence on foreign energy sources. Since the only "byproducts" of the process are heat and water (when pure hydrogen is used as the fuel), fuel cells are far more environmentally friendly than the traditional internal combustion engine. Further, because fuel cells themselves have no moving parts and do not even vibrate, they require little maintenance and operate very quietly. While reduced noise levels may not be a major selling point for people who drive themselves to work everyday, a representative of a company that developed fuel cell systems for three buses used on Chicago's public bus routes testified that some passengers let the regular buses pass by while they waited for a fuel cell bus. Fuel cell buses, it turns out, are more conducive to sleeping and reading than the regular Chicago Transit Authority buses.

Despite their clear benefits and enthusiastic reception by many people, fuel cells have yet to overcome several important technological and economic barriers to mass production and mass marketability. Many of these barriers stem from difficulties involved in switching from a carbon-based energy system to the "hydrogen economy". It may seem quite logical to move towards a pure hydrogen-based energy system insofar as hydrogen is the most abundant element in the universe. Also, as the DOE's fuel cell report explains, the historical trends in energy sources from wood to coal to oil to natural gas indicate a shift from dependence on energy sources with high amounts of carbon and low amounts of hydrogen to sources with lower amounts of carbon and higher amounts of hydrogen. To many, logic and history seem to be converging on technologies fueled by pure hydrogen, a (seemingly) unlimited resource. Nevertheless, hydrogen does present some problems. To begin with, it rarely appears apart from other elements, and thus must be manufactured. While hydrogen can be derived from gasoline, methanol, and natural gas, doing so involves emitting some carbon dioxide and potentially nitrogen oxides and sulfur dioxide. The need to manufacture hydrogen also raises questions of whether improved internal combustion engines or hybrid vehicles that combine the internal combustion engine with an electric motor might prove more efficient than fuel cells. For automotive applications, it remains unclear whether such fuels should be reformulated on board or whether the hydrogen should be manufactured in central facilities. If the latter, space and safety considerations make unclear the best way to store hydrogen in the vehicle. Further, creating a hydrogen infrastructure across the

country allowing fuel cell vehicles to refuel would be extremely expensive.

Researchers and developers are also still exploring different options for the composition of fuel cells and exploring how to make fuel cells compatible with other elements of the automotive power system. Although fuel cell vehicles exist, fuel cells remain expensive, largely due to the dearth of compatible applications and thus lack of demand, but also due to difficulties with mass production and other technical issues. Even fuel cells' staunchest supporters acknowledge that hybrid vehicles and vehicles powered by improved internal combustion engines will play a crucial role until developers and manufacturers work out all of the problems involved with fuel cell vehicles. As they iron out these kinks, competing technologies will gain crucial time and market penetration.

Finally, while fuel cells clearly have the potential to solve some energy needs, the relative merits of other energy sources and technologies for specific applications, including stationary and portable non-vehicular applications, remains a very open question. Clearly many people are excited about fuel cells, and amidst all the hoopla, it is easy to forget that fuel cells are ultimately just one of several alternative energy systems that offer strong promise to help governments, businesses, and individuals meet their energy needs. Photovoltaics, solar-thermal energy, wind, combined heat and power systems, micro- and miniturbines, Stirling cycle engines, battery cells, methanol and ethanol systems, electricity storage devices, such as supercapacitors, and other energy systems all have their virtues, and many people see a future in which these systems complement one another.

In short, the jury is still out on what role fuel cells and other alternative energy systems will play in meeting future energy needs. Many people agree, however, that these systems and technologies compatable with them need to be further researched, developed, manufactured, and commercialized. At the North American International Auto Show in early January, Secretary of Energy Spencer Abraham and executives of the "Big Three" automakers announced the new "FreedomCAR" program, which Secretary Abraham described as a public-private initiative "to promote the development of hydrogen as a primary fuel for cars and trucks". Under the program, "the government and the private sector will fund research into advanced, efficient fuel cell technology which uses hydrogen to power automobiles without creating any pollution". In his 2002 State of the State Address, Governor Engler argued that the state must become a leader in promoting alternative energy systems and technologies and fuel cells in particular. Although other states have already undertaken initiatives to promote alternative energy technologies—most notably California and New York—many people believe that Michigan can greatly benefit by being a "fast follower". According to committee testimony from the Michigan Economic Development Corporation, with careful planning, the state may avoiding some of the mistakes that other states have made, and companies working on alternative energy systems and technologies might thrive on a good dose of "Midwestern sanity". While promoting the broadband legislation enacted earlier this year, the governor cited its potential to create up to 500,000 jobs here in the state. In his *NextEnergy* report, the governor suggested that Michigan's historic prominence as the hub of automobile manufacturing in the United States will be at risk—in concrete terms, up to 200,000 jobs—unless the state becomes a locus of work on alternative energy systems and technologies. Although much of the discussion of the "NextEnergy" plan has focused on the potential automotive applications for fuel cells, the plan's proponents endorse a broad strategy including not only stationary and portable applications of fuel cell technology, but also other energy sources and technologies that may eventually compete with and/or exist comfortably alongside fuel cells. Legislation has been introduced to position Michigan as the center of research, development, manufacturing, and commercialization of alternative energy systems and technologies.

THE CONTENT OF THE BILL:

Senate Bill 1316 would create the "Michigan Next Energy Authority Act" to establish the Michigan Next Energy Authority as a public body within the Department of Management and Budget. The authority, or "MNEA", would be charged with promoting and increasing the research, development, and manufacturing of "alternative energy technologies," as identified in the act. The act would transfer to MNEA four parcels of state-owned land located in York Township (Washtenaw County) comprising approximately 724 acres; collectively, the land would be referred to as an "alternative energy technology park." MNEA could develop a plan for the reuse or development of the park. MNEA could also manage and oversee an alternative energy zone in the park and receive designation of renaissance zone status for the zone, and it could finance, direct, and aid in the planning and construction of alternative energy technology businesses and

infrastructure within the zone and park. Further, MNEA could convey any or all of the land (or a leasehold in any or all of the land) for its "value" (though not necessarily money), which would be based on the property's "highest and best use" in accordance with the reuse or development plan and MNEA's core mission—i.e., the promotion of alternative energy technologies. Any land conveyed by the authority could be used exclusively for public purposes, including the act's purposes, and if the land was not being used for such purposes, MNEA could reenter and repossess the property. MNEA would be required to obtain an appraisal of property conveyed under the act, and any money that MNEA received from the sale, transfer, or lease of property under the act would have to be deposited into a new alternative energy technology fund created by the act. The fund could be administered for MNEA's general operations and could be used to secure any MNEA-issued notes and bonds.

Senate Bill 1316 is similar to House Bill 6070, and is closely related to several bills that were considered by, and reported out of, the House Energy and Technology Committee and passed by the House. Specifically, House Bill 6071 would allow the Michigan Strategic Fund to designate up to two renaissance zones as alternative energy zones and would specify that an alternative energy zone could have renaissance zone status for up to 20 years. Renaissance zone status would give businesses that located within the alternative energy zone certain tax exemptions, but the bill would only allow the exemptions for commercial real property insofar as that property was used to directly promote and increase the research, development, and manufacturing of alternative energy technology. House Bill 6073 would amend the Single Business Tax Act to create two new SBT credits. House Bill 6074 would amend the General Property Tax Act to create a tax exemption for "alternative energy personal property" from taxes levied by a school district for school operating purposes and taxes levied under the State Education Tax Act; the bill would also allow local tax collecting units to exempt the personal property from all other taxes collected in that unit, under certain conditions. House Bill 6075 would amend the Sales Tax Act to create a sales tax exemption for the retail sale of alternative energy systems, marine propulsion systems, and vehicles after September 30, 2006 and before September 30, 2008. House Bill 6076 would amend the Use Tax Act to create a use tax exemption for the period after September 30, 2006 and before September 30, 2008 for the storage, use, or consumption of alternative energy systems, marine propulsion systems, and vehicles.

Senate Bill 1316 would require MNEA to certify eligibility and provide proof of certification of eligibility for the various tax credits and exemptions proposed by the other bills. Aside from charging MNEA with this responsibility, the act would provide guidance for MNEA by authorizing it do "all things necessary to implement the purposes of this act". The bill enumerates several specific powers that would be given to MNEA, stating that the enumeration of a power was not to be construed as a limitation on MNEA's general authority. In addition to exercising powers normally granted to state authorities, MNEA *could*:

- research and publish studies, investigations, surveys, and findings on the development and use of "alternative energy technology";

- manage and oversee an alternative energy technology park ("park") and alternative energy zone ("zone") on MNEA-owned land and receive designation of renaissance zone status for the zone;

- finance, direct, or otherwise aid in the planning of alternative energy technology businesses and "infrastructure" located within a zone and park;

- lay out, design, construct, acquire, operate, lease, sell, and convey planned sites within a zone and park, subject to certain restrictions;

- construct, acquire, purchase, or lease, reconstruct, improve, repair, or equip a project or any part of a "project", including related infrastructure;

- make grants, loans, and investments, guarantee and insure loans, leases, bonds, notes, or other public and private indebtedness, and issue letters of credit;

- borrow money and issue bonds and notes to finance part or all of the project costs of a project and secure those bonds and notes by mortgage, assignment, or pledge of any of its money, revenues, income, and properties (subject to certain constraints);

- acquire or contract to acquire from a person or government leaseholds, real or personal property or any interest in such property, and own, hold, clear, improve, rehabilitate and sell, assign, exchange, transfer, convey, lease, mortgage, or otherwise dispose of or encumber leaseholds, real or personal property or interest in such property as was

convenient for the accomplishment of the act's and MNEA's purposes;

• charge, impose, and collect fees in connection with transactions and provide for reasonable penalties for delinquent payments;

• enter into a lease, which could include the option to purchase or renew, for the use or sale of a project;

• mortgage or create security interests in a project, lease, loan, or in rents, revenues, or sums to be paid under a lease or loan, in favor of MNEA bond or note holders;

• convey or release a project or part of a project under any agreement after provision had been made for the retirement in full of the bonds or notes issued for that project (subject to other requirements);

• promote research, development, and manufacturing of alternative energy technology through the conveyance or lease of real property;

• develop property to advance MNEA's purposes;

• make and enter into contracts or agreements with various state universities, a community college, governmental agencies, local units of government, and nonprofit corporations necessary or incidental to accomplish the powers and duties of MNEA under the act or other laws that relate to the purposes and responsibilities of MNEA. (Specifically, MNEA could contract or make agreements with the University of Michigan, Michigan State University, Wayne State University, Eastern Michigan University, Michigan Technological University, Central Michigan University, Northern Michigan University, Western Michigan University, Ferris State University, and Grand Valley State University); and

• do anything else necessary to promote and increase the research, development, and manufacturing of alternative energy technology and to otherwise achieve MNEA's objectives and purposes.

Definitions. Senate Bill 1316 contains a long list of definitions of terms used in the bill and in related legislation (House Bills 6071 and 6073-6076). For a conceptual understanding of what the bill proposes to accomplish, the most important definitions are given below:

"Alternative energy technology" would be defined as equipment, component parts, materials, electronic devices, testing equipment, and related systems that are solely related to the following:

• the storage or generation of hydrogen for use in an alternative energy system;

• the process of generating and putting into a usable form the energy generated by an alternative energy system;

• a microgrid—i.e., the lines, wires, and controls to connect two or more alternative energy systems.

The term would not include the component parts of an alternative energy system that are required regardless of the energy source.

"Alternative energy system" would refer to the "small-scale" (i.e., up to two megawatts, in the case of a single energy system, or up to ten megawatts, in the case of an integrated system) generation or release of energy from one, or any combination, of the following types of energy systems (each of which is defined more fully in the bill):

• fuel cell;

• photovoltaic;

• solar-thermal;

• wind;

• CHP ("combined heat and power");

• microturbine;

• macroturbine;

• Stirling cycle;

• battery cell;

• clean fuel; and

• electricity storage system.

An "alternative energy technology business" would be defined as a business engaged solely in the research, development, or manufacturing of an alternative energy technology.

"Alternative energy vehicle" would refer to a motor vehicle that was propelled by an alternative energy system and that was manufactured by an original equipment manufacturer that did both of the following: (1) fully warranted and certified that the

vehicle met federal motor vehicle safety standards for its class of vehicles as defined by the Michigan Vehicle Code, and (2) certified that the vehicle met local emissions standards. It would include the following types of vehicles, each of which is defined more fully in the bill: alternative fueled vehicles, fuel cell vehicles, electric vehicles, hybrid vehicles, solar vehicles, and hybrid electric vehicles.

"Alternative energy technology park" would refer to the land in York Township that would be transferred to MNEA by the act.

An "alternative energy zone" would be a renaissance zone designated as an alternative energy zone by the board of the Michigan Strategic Fund, as described in a section of the Michigan Renaissance Zone Act that would be added by House Bill 6071. House Bill 6071 would allow the strategic fund to designate up to two renaissance zones as alternative energy zones, though Senate Bill 1316's definition of "alternative energy zone" specifies that an alternative energy zone could not include land other than the York Township land transferred to MNEA under the act.

"Infrastructure" would mean a "public facility" as it is defined in the Local Development Financing Act (Public Act 281 of 1986) but would also include a facility or facilities that supported an alternative energy technology project and that were located within an alternative energy park.

"Project" would refer to an alternative energy technology project and would also mean the acquisition, construction, conversion, conveyance, or leasing of land or facilities inside the alternative energy technology park to carry out the purposes of the act and of MNEA. Several examples are listed in the bill.

Authority. MNEA would exercise its prescribed powers, duties, and functions independently of the director of the DMB, but the director would supervise and direct its budgeting, procurement, and related administrative functions. MNEA could contract with the DMB for the purpose of maintaining its rights and interests. MNEA's accounts could be subject to annual financial audits by the auditor general, and its records would have to be maintained according to generally accepted accounting principles.

Board. MNEA would be governed by a seven-member board consisting of state residents appointed by the governor. One board member, chosen from a list of at least three names provided by the county board of commissioners, would represent the Washtenaw County government and would be appointed for an initial three-year term; this board member could be a county commissioner. One board member, chosen from a list of at least three names provided by the York Township Board of Trustees, would represent the York Township government and would be appointed for an initial four-year term; this board member could be a member of a city council or a township trustee. Of the remaining five board members, one would be appointed for an initial two-year term, two would be appointed for initial three-year terms, and the other two would be appointed for initial four-year terms; also, one of these five members would have to have at least ten years of experience in planning or real estate development. A board member would enter office and exercise the duties of the office once he or she had been appointed and had taken and filed the constitutional oath of office. After the first appointment, each member would serve for four-year terms, except that a person appointed to fill a vacancy would be appointed for the balance of the unexpired term. A member would hold office until a successor had been appointed by the governor, and members could be reappointed. The governor would designate one member of the board to serve as its chairperson, and the board would elect from its members a vice-chairperson, secretary, and any additional officers that it considered necessary. The chair would serve a four-year term, and the other officers would be elected annually. Members of the board would not be paid but would be reimbursed for expenses.

The board could hold its first meeting as soon as four members had been appointed, and the first board meeting would have to be held not more than 60 days after the creation of MNEA. Except for those powers reserved or delegated to a chief executive officer of MNEA by the act or by the board, the board could not delegate any power of the board to any other officer or committee. The board could withdraw any power that the board had previously delegated to the chief executive officer (CEO), if it appointed one (see below). The board would have to conduct its business at public meetings held in accordance with the Open Meetings Act, and writings prepared, owned, used, in the possession of, or retained by the board in the performance of an official function would have to be made available to the public in accordance with the Freedom of Information Act.

The board could only act by resolution with a majority of members then in office constituting a quorum for the transaction of business. In general a vote of the majority of members present when there

was a quorum would constitute an action of the board (or a committee of the board). However, a vote of a majority of the members serving at the time of the vote would be required to approve the issuance of bonds, to approve or amend the annual budget, or to hire, remove, discharge, or set the salary of the CEO. Before the beginning of each fiscal year, the board would have to prepare a budget containing all of the following: an itemized statement of the estimated current operation expenses and the expenses for the operation and development of the land under the board's jurisdiction; the amount necessary to pay the principal and interest of any outstanding bonds or obligations maturing during the ensuing fiscal year or that had previously matured and remained unpaid; an estimate of the revenue of the authority from all sources for the ensuing fiscal year; and other amounts necessary to further purposes of the act. MNEA's budget would be funded by proceeds derived from the conveyance of land that MNEA held and any gifts, grants, loans, and other aids from any person or the federal, state, or a local government or any government agency.

Chief executive officer. The board could appoint a person who was not a member of the board to serve as MNEA's CEO, to whom the authority could delegate any of its administrative powers and authorization. The CEO would be an ex officio member of the board. He or she would not have a vote, would not be considered in determining whether a quorum was present, and would have to have professional qualifications commensurate with the responsibility of the position. During employment, the CEO could not have a financial interest in facilities or projects over which MNEA had jurisdiction or power to act. The CEO would have to take and file the state constitutional oath of office before performing duties of his or her office. Subject to the board's approval, the CEO would supervise, and be responsible for, all of the following: MNEA's performance of its functions; a regular report describing its activities and financial condition; the issuance of bonds and notes approved by the board; the negotiation and establishment of compensation and other terms and conditions of employment for employees; the negotiation, supervision, and enforcement of contracts and the supervision of contractors and subcontractors in the performance of their duties; and other activities or functions that the board considered necessary. The CEO would have to be a Michigan resident.

Chief financial officer. If the board considered it necessary, the CEO could appoint a person with the appropriate professional qualifications as chief financial officer (CFO) who would serve as MNEA's treasurer. Despite any law or charter provision to the contrary, the CFO would receive all money belonging to MNEA or arising or received in connection with the land over which jurisdiction had been transferred to MNEA, from whatever source derived. The CFO could only deposit, invest, and spend MNEA money in accordance with the act or with policies, procedures, ordinances, or resolutions adopted by the board. The CFO would be required to provide to the board copies of all reports that he or she provided to the CEO. The CFO would have to be a Michigan resident.

Other employees. The board could also employ legal and technical experts, private consultants and engineers, accountants, and other agents or employees for rendering necessary professional and technical assistance and advice. MNEA would determine the qualifications, duties, and compensation of its employees.

Liability, public service and conflicts of interest. A member of the board or an officer, appointee, or employee of MNEA would not be subject to personal liability when acting within the scope of his or her authority or on account of MNEA's liability. The bill allows the board or MNEA to indemnify and procure insurance for various persons acting on its behalf. Members of the board and officers and employees of MNEA would be considered public servants subject to acts dealing with contracts between public servants and public entities (Public Act 317 of 1968) and conflicts of interest (Public Act 318 of 1968). A board member, or an officer, employee, or agent of MNEA would be required to discharge his or her duties in a nonpartisan manner, in good faith, in the best interests of MNEA, and with diligence, care, and skill. The board would be required to establish policies and procedures requiring periodic disclosure of relationships that could give rise to conflicts of interest. The board would also require that a member who had a direct or indirect interest in any specific matter before MNEA disclose his or her interest and any reasons why the transaction might not be in the public's best interest before the board took any action with respect to the matter. The bill proposes various other guidelines for determining the existence of, and dealing with, conflicts of interest.

MNEA powers. In addition to the powers listed above, the bill would state that MNEA could MNEA could acquire "real property" or "personal property" or rights or interests in such property by gift, devise, transfer, exchange, foreclosure, purchase, or otherwise on terms and conditions and in a manner

that MNEA considered proper. (As used in the act, "real property" and "personal property" refer exclusively to real property located in the alternative energy technology park and personal property located or intended for use in the park; there is one exception, which is noted below.) MNEA could own, lease (as lessor), convey, demolish, relocate, or rehabilitate real or personal property or rights or interests in such property, consistent with the purposes of the act. MNEA *could not* acquire, own, purchase, lease develop, or otherwise possess an interest in real property located outside of the alternative energy technology park or personal property not intended to be used in the park.

The bill would specify that real property purchased by MNEA could be obtained by any method deemed desirable by MNEA. MNEA could purchase real property or rights or interests in such property for any purpose it considered necessary to carry out the act's purposes. Among other things, MNEA could purchase real property for the purpose of using or developing property that it had otherwise acquired for alternative energy technology or related infrastructure. It could also purchase real property for the purpose of facilitating the assembly of property for sale or lease to any other person, as long as that person's use of the property was consistent with the purposes of the act.

MNEA could take various actions necessary to preserve the value of property that it held inside the park and would be required to defend any actions concerning title claims against property that it held or owned. MNEA would have exclusive jurisdiction over all property that it held or owned. All powers and duties granted by the act to the governor, MNEA, or the board, including the authority to convey, transfer, or dispose of property, could be exercised regardless of any charter provision or ordinance to the contrary.

In the exercise of its powers and duties under the act and its powers relating to property held or owned by MNEA, MNEA would have "complete control as fully and completely as if it represented a private property owner" and would not be subject to restrictions imposed by any charter, ordinance, or resolution of a local unit of government. The bill would specify, however, that this provision was not to be construed as prohibiting a local unit of government from enforcing its local police and fire ordinances.

Certification and proof. MNEA would be required to certify and provide proof of certification of eligibility for tax credits and exemptions that would be created by House Bills 6074 - 6076, as follows:

- an alternative energy marine propulsion system, an alternative energy system, and an alternative energy vehicle as eligible for the exemption provided under a section of the General Sales Tax Act that would be added by House Bill 6075;

- an alternative energy marine propulsion system, an alternative energy system, and an alternative energy vehicle as eligible for the exemption provided under a section of the Use Tax Act that would be added by House Bill 6076; and

- an alternative energy marine propulsion system, an alternative energy system, an alternative energy vehicle, *all personal property* of an alternative energy technology business, and *all personal property* of a business that was not an alternative energy technology business that was solely used for the purpose of researching, developing, or manufacturing an alternative energy technology eligible for the exemption provided under a section of the General Property Tax Act that would be added by House Bill 6074. (With the sole exception of this provision, "personal property", as used in the act, would refer to personal property located or intended to be used in the alternative energy technology park.)

MNEA would also have to certify and provide proof of certification of an alternative energy technology business and would have to provide proof of certification to the assessor of the local tax collecting unit in which the business was located. MNEA would have to certify and provide certification of a taxpayer as an eligible taxpayer for the purposes of claiming the nonrefundable credit for "qualified business activity" provided under a section of the Single Business Tax Act that would be added by House Bill 6073. MNEA would have to certify and provide proof of certification of the qualified business activity.

Prohibition of certain activities. MNEA could not operate an alternative energy technology business or otherwise engage in the manufacturing of any commercial products.

Legislative statement. The act would contain the following statement:

"The authority is encouraged not to purchase foreign goods or services, or both, if competitively priced and comparable quality American goods or services, or both, are available. The authority shall encourage

all business entities that locate or operate in the park to purchase American goods or services, or both. The authority shall encourage and support the creation and retention of jobs in this state, and the manufacture, assembly, and construction of alternative energy marine propulsion systems, alternative energy systems, and alternative energy vehicles in this state."

Bonds and notes. MNEA could authorize and issue its bonds or notes payable solely from revenues or funds available to MNEA. The bonds and notes would not be a debt or liability of the state and would not create or constitute any indebtedness, liability, or obligations of the state or constitute a pledge of the faith or credit of the state. Nor would the bonds or notes be a general obligation of the authority. All expenses incurred in issuing bonds and notes would be payable solely from revenues or funds provided or to be provided under the act. The bonds and notes would not be subject to the Revised Municipal Finance Act but their issuance would be subject to the Agency Financing Reporting Act. MNEA could issue bonds and notes in principal amounts that it considered necessary for any purpose; the bill enumerates several possible purposes. The bill sets forth various specifications for the bonds including that they could mature at a time or times not exceeding 30 years from the date of issuance. The members of the board and any person executing bonds or notes issued as provided in the bill and any person executing any agreement on behalf of MNEA would not be personally liable on the bonds or notes by reason of their issuance.

The state would pledge to and agree with the holders of bonds or notes that it would not limit or restrict the rights vested in MNEA by the act to fulfill the terms of an agreement made with the holders of MNEA bonds or notes or in any way impair the rights or remedies of the holders of the bonds or notes of MNEA until the bonds and notes, together with any interests, and all costs and expenses in connection with an action or proceedings by or on behalf of those holders are fully met, paid, and discharged. The bill sets forth various other provisions with respect to bonds and notes.

Fund. The bill would create the Michigan Alternative Energy Technology Fund under MNEA's jurisdiction and control, which could be administered for the general operations of MNEA and to secure any of MNEA's notes and bonds. MNEA would deposit into the fund all money it received from the sale, transfer, or lease of property under the act. MNEA would also credit to the fund the proceeds of the sale of notes or bonds to the extent provided for in the authorizing resolution of MNEA and any other money made available to MNEA for the purposes of the fund. The fund could only be used for purposes set forth in the act. Money in the fund at the end of the fiscal year would remain in the fund and would not lapse into any other fund.

Tax exemption. MNEA would be exempt from and would not be required to pay taxes on real or personal property that it owned and that was being used for a public purpose; the bill states that MNEA property would be public property devoted to an essential public and governmental function and purpose. MNEA's income and operation, including bonds or notes that it issued and the interest and income derived from the bonds or notes, would be exempt from all taxes and special assessments of the state or a political subdivision of the state.

Transfer of state owned property to MNEA. The bill would transfer to MNEA, without consideration, four designated parcels of state owned property in York Township (Washtenaw County) totaling approximately 724 acres of land. The parcels would be subject to any easements, rights-of-way, or restrictions existing at the time of transfer. After the land was transferred, MNEA, on behalf of the state and for the purposes of MNEA, could convey for value, or could convey a leasehold in, any portion or all of the parcels of property designated. Any reuse or development of the property conveyed or leased under the act would have to be done by MNEA in conformance with a plan that it developed. The authority could enter into an agreement with any of the state universities listed above, a local unit of government, a governmental agency, or a nonprofit corporation to create the plan or develop the property conveyed.

Despite any other provisions to the contrary, value of the designated property would be determined by MNEA based on the property's highest and best use in accordance with MNEA's reuse or development plan and MNEA's purposes. MNEA, on terms and conditions, and in a manner for consideration that it considered proper, fair, and valuable, could convey, sell, transfer, exchange, lease (as lessor), or otherwise dispose of property or rights or interests in property in which it held a legal interest to any public or private person "for the specific purpose of fulfilling the act". Consideration received from any conveyance of MNEA's real or personal property would be deposited in the Michigan Alternative Energy Technology Fund.

Any conveyance of the property described would have to provide for all of the following:

• that the property would be used for public purposes or to further the public purposes of the act, as determined by MNEA according to the purposes in the act, and that upon termination of that use or use for any other purpose, MNEA could reenter and repossess the property, terminating the grantee's estate in the property;

• that any subsequent conveyance by the grantee or the grantee's successor would also be subject to the "exclusive use" and right of reentry and possession provisions; and

• that if the grantee or the grantee's successor disputed MNEA's exercise of its rights of reentry and possession and failed to promptly deliver possession of the property to the state, the attorney general could bring an action to quiet title to, and regain possession of, the property.

A conveyance authorized under the act would be by quitclaim deed approved by the attorney general and would convey all rights held by the state to coal, oil, gas, and other minerals found on or under the property conveyed.

Appraisal. MNEA would be required to obtain an appraisal of the property. (The act would not specify when the appraisal had to be obtained.)

Liberal construal of intent. The bill states the following: "This act shall be construed liberally to effectuate the legislative intent and its purposes. All powers granted shall be cumulative and not exclusive and shall be broadly interpreted to effectuate the intent and purposes and not as a limitation of powers."

School tax revenue. The bill would require the state to reimburse intermediate and local school districts each year for tax revenue lost as the result of the exemption of certain property under the section of the General Property Tax Act that would be added by House Bill 6074. The state would also be required to reimburse the school aid fund for all revenues lost as the result of the exemption of certain property under the new section of the property tax act. These reimbursement requirements would only apply to revenues lost on property that had previously been subject to the collection of taxes under the General Property Tax Act. The bill would also specify that foundation allowances calculated under the State School Aid Act of 1979 would not be reduced as a result of lost revenues from the exemption of property under the property tax act.

HOUSE COMMITTEE ACTION:

The substitute version of Senate Bill 1316 reported by the House Energy and Technology Committee would require an original equipment manufacturer to certify that a motor vehicle that otherwise met the definition of "alternative energy vehicle" met local emissions standards. The Senate-passed version would not.

The Senate-passed version of the bill would allow MNEA to create one or more administrative "centers" to manage MNEA land and perform various other responsibilities. The House substitute would not.

Both versions of the bill would call for the creation of a seven-member board to govern MNEA. All board members, including a representative of the government of Washtenaw County and a representative of the government of York Township, would be appointed by the governor. The House substitute would require the governor to choose these two representatives from a list of names provided by the Washtenaw County Board of Commissioners and the York Township Board of Trustees. The House substitute would also specify that a county commissioner, city council member, or township trustee could serve as an MNEA-board member. The Senate-passed version contains neither of these provisions.

The House substitute would require that MNEA's CEO and CFO, if appointed, were residents of Michigan, but the Senate-passed version would not.

Both versions of the bill would recognize MNEA as having "complete control as fully and completely as if it represented a private property owner" and as not being "subject to restrictions imposed by *any* charter, ordinance, or resolution of a local unit of government" (emphasis added). The House substitute would qualify this provision by specifying that it was not to be construed as prohibiting a local unit of government from enforcing its local police and fire protection ordinances.

The House substitute would allow exemptions on existing and new personal property meeting the criteria of the act, but the Senate-passed version would only allow exemptions on new personal property.

The House substitute would require MNEA to certify sales and use tax exemptions, but the Senate-passed version would not.

The House substitute would prohibit MNEA from operating a business or engaging in the manufacturing of commercial products, but the Senate-passed version would not.

The Senate-passed version did not contain the statement encouraging MNEA not to purchase foreign goods or services and directing MNEA to encourage entities that located or operated in the park to purchase American goods and services.

The House substitute would require MNEA to appraise the land constituting the alternative energy technology park, but the Senate-passed version would not.

The House substitute would require the state to reimburse local and intermediate school districts and the school aid fund for property tax revenues lost on property that was previously subject to the collection of taxes under the General Property Tax Act and that was lost as the result of the exemption that would be created by House Bill 6074.

BACKGROUND INFORMATION:

CAR/MEDC report. In August 2001, the Michigan Economic Development Corporation and the Michigan Automotive Partnership released a report written on their behalf by a senior industry analyst at the Center for Automotive Research. The report, titled, *Positioning the State of Michigan as a Leading Candidate for Fuel Cell and Alternative Powertrain Manufacturing*, outlines both the promise of and the substantial barriers to mass producing automotive applications of fuel cell technology. Exceeding beyond its original scope, which was to advise the state as to how it could become a "prime location for fuel cell manufacturing investment", the report issued five recommendations for how the state can "better position itself as a leader in alternative powered vehicle technology, and concomitantly, a viable candidate for fuel cell manufacturing":

- establish the "Michigan Advanced Automotive Powertrain Technology Alliance" as "an umbrella organization whose mission is to assist the industry in charting the course for widespread commercialization of advanced powertrain vehicles in the new millenium";

- investigate the feasibility of creating a power electronics "Center of Excellence" to respond to the "significant challenge" of increasing the number of "power-electronics-proficient people" in the state;

- establish a "Michigan Hydrogen Infrastructure Working Group" to help the state "become a leader in understanding the infrastructure issues " that the "hydrogen economy" will present;

- become a leader in the demonstration and testing of prototype fuel cell vehicle development and commercialization of fuel cells for advanced vehicles and stationary applications; and

- conduct an economic study to determine the most appropriate financial incentives for the development and commercialization of fuel cell and other advanced technology vehicles.

In April Governor Engler unveiled a "blueprint" of his "NextEnergy proposal", which offers environmental as well as economic reasons for making Michigan the premier site for work on fuel cells and other alternative energy technologies. The blueprint describes the proposal as a "bold approach to ensure the economic future for generations to come in Michigan while also contributing to the national efforts to reduce our dependence on foreign oil". The blueprint further states that "Most industry experts believe that fuel cells are America's long-term answer to its energy needs. NextEnergy is designed to dramatically accelerate the commercialization of this technology, while also supporting interim alternative energy strategies to transition our economy to this solution". Finally, the blueprint outlines several major components of the proposed initiative as follows:

- establish the NextEnergy Center;

- designate a Michigan NextEnergy Zone to build an *industry cluster*;

- obtain a commitment from the federal government to establish a federal research facility within the NextEnergy Center;

- provide incentives to alternative energy technology companies that locate within Michigan;

- adopt state policies that spur demand for alternative energy technologies;

- appoint a Michigan NextEnergy Leadership Council;

• construct alternative energy technologies demonstration microgrids in Michigan;

• implement an alternative energy technologies business development program; and

• market Michigan as the location for the alternative energy technologies industry.

The full report and the Governor's NextEnergy report are available online at: www.nextenergy.org.

FISCAL IMPLICATIONS:

Fiscal information is not available.

ARGUMENTS:

For:

Senate Bill 1316, in conjunction with House Bills 6071 and 6073-6076, proposes a solid economic development plan for the state by encouraging research into, development of, manufacturing of, and ultimately purchase of alternative energy systems, technologies, and vehicles. Given the United States' high level of energy consumption, and given the projected growth of domestic and worldwide consumption, the energy industry needs to find alternatives to oil. Pursuing alternative energy strategies makes sense not only because known oil reserves are dwindling, but also because alternative energies promise to be better for the environment. While pundits promote incremental efficiency and emissions gains, the "Next Energy" legislation promises to make leaps and bounds.

With so many government and industry officials convinced that fuel cells are the next revolution in automotive technology, the state needs to take steps to create a cluster of fuel cell activity in the state. Experts contend that fuel cell factories are more like chemical factories than auto plants, and unless Michigan wants to lose the 200,000 jobs connected with current drive train technology, the state needs to assert itself as an innovator. As Governor Engler said in his 2002 State of the State address, "Michigan cannot sit back and assume that being home to the auto industry is our birthright." And as an auto analyst quoted in an April 18 New York Times article stated: "if some day fuel cells replace the internal combustion engine, it would be a disaster for the state if these new engines were made somewhere else."

Despite the well-grounded enthusiasm for fuel cells, the "Next Energy" package is all-inclusive insofar as it refuses to pick winning and losing technologies, leaving those decisions to the Michigan Next Energy Authority and more importantly to the businesses engaged in the promotion of alternative energy technology. Skeptics contend that other states, like California and New York, have left Michigan to follow at their heels, but in reality research, development, and manufacturing of fuel cells and other alternative energy technologies is scattered throughout the U.S. and the world. The "Next Energy" proposal is unique insofar as it represents a collaborative effort, uniting the state's world class universities with the Big Three's automotive excellence under the aegis of a state government fully committed to help where it can. By creating a technology park in York Township, establishing a Renaissance Zone within the park, and giving MNEA various powers to attract alternative energy businesses to the zone and assist them once they are there, the state could create a cluster of activity unparalleled anywhere in the world. The 725-acre park located close to Detroit Metro Airport and the University of Michigan, and not so far from the Big Three car manufacturers, makes a perfect site for anyone working on vehicular applications for alternative energy technologies, and the tax benefits that come with Renaissance Zone status make the incentive overwhelmingly attractive.

Response:

Senate Bill 1316 would create a state authority, the Michigan Next Energy Authority, with various powers to promote research and development of alternative energy systems, technologies, and vehicles. Beyond that it is difficult to say exactly what MNEA would do. It seems fairly clear, for instance, that MNEA would seek renaissance zone status for the alternative energy zone in York Township. Promoters of the legislation have also suggested that MNEA would set aside approximately half of the 725 acres constituting the "alternative energy technology park" as an area for commercial development (e.g., hotels and restaurants) supporting the alternative energy businesses located within the zone, though the bill does not contain any such suggestion. It is less clear to what extent MNEA would promote a broad array of alternative energy systems and technologies, including vehicle technologies such as electric hybrids, and to what extent MNEA would focus on the promotion of fuel cell vehicles to the exclusion of all else. Since the bills do not really charge MNEA with many duties, statements about the MNEA's probable activities are somewhat speculative. One speculation, namely that the salary of MNEA's CEO might rival that of the Michigan Broadband Development Authority's CEO, is a good reason to set a limit in statute.

With respect to the one duty that the bill does give MNEA, namely the responsibility for certifying eligibility for the various tax credits and exemptions proposed by the bills, the bill offers little guidance for how MNEA will determine who is eligible for the various tax credits and exemptions. The bill appears to regard this as a simple determination of whether a given technology that is being researched, developed, or manufactured is included in the bills' definitions. Instead, the bills should articulate performance-based standards for determining what represents a true qualitative innovation and what is new but hardly improved. The bills should also provide guidelines for improving standards for the non-alternative energy vehicles that will far outnumber alternative energy vehicles throughout the next decade and most likely beyond. Characterizing emissions standards such as "CAFÉ" as incremental or passe ignores the importance of incorporating interim solutions into long-term plans.

Finally, it is not altogether clear what effect, if any, the Next Energy act and related legislation would have on business activity. Some businesses currently located in the state are already working on fuel cells and other alternative energy technologies, and they would probably continue to do so regardless of whether the bills were enacted. Moreover, Washtenaw County, which is a very active site in terms of new business activity, does not give any tax incentives, which raises the question of whether the proposed tax incentives would really be decisive for businesses currently located in other areas of the country or for individuals considering various locations for new businesses.

Reply:

It would be foolish to try to "micromanage" MNEA. Rather, the state should create a flexible framework for MNEA to engage university and industry officials in collaborative efforts, and the fruits will flow from their endeavors. Clearly, many supporters of the package are thinking about its potential to stimulate work on fuel cell vehicle technology, but the bills would encourage MNEA to promote a wide range of alternative energy technologies and applications. Regarding the CEO's salary, setting a cap would be a mistake, especially if it made reference to the salaries of other government officials. MNEA would want to find the best person for the job, and this would likely involve paying a salary that was competitive with salaries for comparable positions in the private sector.

For:

Although the bill is clearly focused on spurring new work on alternative energy technologies and would concentrate that effort in the York Township "alternative energy zone", Senate Bill 1316 and the related bills would also help existing Michigan businesses that are currently working on alternative energy technologies, whether or not they wished to relocate, and would help communities throughout the state attract alternative energy businesses. For instance, the personal property tax exemption would be available to businesses in Michigan that are currently working on alternative energy technologies, and not only to businesses that relocated to Michigan or started such work after the bills were enacted. This grandfather clause would help ensure that Michigan's current "cutting edge" alternative energy businesses are not punished for their foresight and innovation. Also, the bills would allow for the creation of another alternative energy zone in a rural area of the state and would create property tax incentives for businesses working on alternative energy technologies throughout the state. Such measures would ensure that the benefits of economic development are spread throughout the state.

Response:

It would be a mistake to grandfather in alternative energy businesses currently operating in Michigan. The point of the legislation should be to give incentives to spur economic development in the area of alternative energy technology, not to give rewards to businesses that have already begun work in the area.

Reply:

To give tax breaks to some businesses that are working in the field of alternative energy and not to others who are working in the same field would be unfair.

Against:

Promoting alternative energy technologies is a good idea, but giving away over 700 acres of state land, whose value remains undetermined, and an indeterminate amount of tax credit during a fiscal crisis may not be the most responsible way to go about it. Although the Michigan Education Association has not taken a position on the legislation that would create the Next Energy authority, it has opposed House Bills 6073-6076 because of their potential negative impact on funding for K-12 education and community colleges in the state.

Response:

Although no one has appraised the value of the land, the land being given away is probably not worth very much anyway. The land is located near several

prisons, and it would need to be cleaned up and would need infrastructure before it could be used productively. With respect to the effect that the bills would have on schools in particular, Senate Bill 1316 would require the state to reimburse schools and the state school aid fund for tax revenue lost on property that was previously subject to property taxes and that would be excluded under the General Property Tax Act as amended by House Bill 6074.

Reply:

From the beginning, various parties have raised concerns about how much the land in York Township is worth. Since no concrete answer to this question has been given, it is hard to know exactly what the state and its taxpayers are giving up, though Senate Bill 1316 would require MNEA to obtain an appraisal of the land's value. While reimbursing schools for some of the lost tax revenue is a step in the right direction, the bills would still have a strong, negative effect on both the general fund and education funding.

Against:

It would be better to continue (and perhaps accelerate) the scheduled phase-out of the SBT rather than giving tax credits to promote specific industries. Instead of picking "winners and losers", the state should concentrate on creating a friendlier business climate for all industries. In the end this would have the same desired effect of encouraging economic growth.

Against:

It is unclear why township trustees, city council members, and county commissioners should be allowed to serve on MNEA's board. Allowing elected officials to work so closely with private businesses raises concerns about potential conflicts of interest.

Response:

The Downtown Development Authority Act—another act that allows for the creation of authorities clearly focused on economic development issues—not only allows, but even requires that certain elected local officials serve on the authority's board. The bill contains a provision for dealing with potential conflicts of interest to which all board members would be subject. More importantly, between the local government's own selection process and the governor's examination of the recommendations provided by the local government, it is unlikely that a trustee, council member, or commissioner with a serious conflict of interest would be appointed.

POSITIONS:

The Michigan Environmental Council supports the bill. (6-18-02)

The Michigan Manufacturers Association supports the bill. (6-18-02)

The Michigan Townships Association supports the bill. (6-18-02)

The Michigan Economic Development Corporation supports the bill in concept. (6-18-02)

The Michigan Municipal League supports the bill in concept. (6-18-02)

Analyst: J. Caver

■This analysis was prepared by nonpartisan House staff for use by House members in their deliberations, and does not constitute an official statement of legislative intent.