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FISCAL IMPACT REPORT

SPONSOR	HBI	C	ORIGINAL DATE LAST UPDATED	03/13/09 03/16/09	HB	796/HBICS
SHORT TITL	E	Tax Credits for Rer	newable Energy Interest	S	SB	

<u>REVENUE (dollars in thousands)</u>

ANALYST Francis

	Recurring or Non-Rec	Fund Affected		
FY10	FY11	FY12		
		(\$5,100.0)	Recurring	General Fund

(Parenthesis () Indicate Revenue Decreases)

Relates to HB405a, SB237/CS

SOURCES OF INFORMATION

LFC Files

<u>Responses Received From</u> Taxation and Revenue Department (TRD) Energy Minerals and Natural Resources (EMNRD) Environment Department (NMED)

SUMMARY

Synopsis of HBIC Substitute

House Bill 796 adds two new credits and modifies an existing one for up to 6 percent of the costs of constructing an electric generating facility in New Mexico of up to \$60 million. The two new credits offset personal and corporate income tax liability. The existing credit, the advanced energy tax credit [Section 7-9G-2 NMSA 1978], is renamed the advanced energy combined reporting tax credit (AECRTC) to distinguish it from the new advanced energy income tax credit (AEITC) and the advanced energy corporate income tax credit (AECITC).

The AECRTC offsets combined reporting taxes: gross receipts, compensating, and withholding. TRD must be notified about any allocation. All credits collectively called Advanced Energy Tax Credits (AETC) include the following types of generation with the listed name-plate capacities (the maximum rated output):

Type of Generation*	Name-plate capacity
Biomass (incl. animal waste)	1 MW
Geothermal	1 MW
Coal-based	no more than 700 MW
Recycled	no more than 15 MW
Solar photovoltaic	250 KW
Solar thermal	1 MW
*see "Significant Issues" below	for definitions

HB796/HBICS adds biomass (including animal waste biomass), geothermal, coal-based generation and solar photovoltaic facilities to be eligible to the existing AECRTC. Also, proportionate interest is defined for all of the credits to allow both direct and indirect ownership interests to be able to claim a share of the credit.

NMED will certify the facility as being eligible for the tax credit upon request from an entity that holds an interest in a qualified facility. NMED will determine that a facility qualifies and require the requestor submit appropriate documentation. NMED must make its determination within 180 days of receiving all information required. TRD will verify and approve the credit for each taxpayer.

The credit can be claimed against income tax liability or combined reporting liability until both of those liabilities are exhausted. In the event that the credit exceeds the total liability, the credit can be carried forward for up to 10 years but it is not refundable or transferable.

FISCAL IMPLICATIONS

To date, there have been no applications for the credit and there are no facilities that qualify. However, there are at least three proposed facilities in the works for solar electricity and potentially another geothermal facility. PNM Resources had significant response to its request for proposal for a large scale concentrating solar power plant. The change in the law means investors in a facility would also be able to take advantage of the credit and apply it against personal income tax liability.

LFC is concerned that the impact could be significant. In 2007, the Advanced Energy Tax Credit was enacted and at the time the fiscal impact assumed that there would be one recycled energy facility and one 25 MW plant for a total fiscal impact of \$800 thousand, 60 percent of which is general fund impact. As stated, no credits have been claimed. The fiscal impact below assumes that one facility will be built in the next two years and that 25 percent of the credit would be allowed under current law and so the fiscal impact of *this bill* is 75 percent of the credit due to the expanded scope and inclusion of income tax liability.

House Bill 796/HBICS - Page 3

\$ Millions							
Calendar Year	2	2010	2011	2012	2013	2014	2015
100MW plant		150	300				
20.5 MW plants		2.5	2.5				
6% credit			27.3				0
Tax Year Credit *		0	8.19	5.46	5.46	5.46	2.73
	FY10	FY11	FY12	FY13	FY 14	FY15	
Fiscal Year Cost				6.8	5.5	5.5	4.1
Already included in revenue estimat	e (CRS)**			1.7	1.4	1.4	1.0
Net Impact on General Fund				5.1	4.1	4.1	3.1

Fiscal Impact of HB 796

* Assumes 30% of credit will be claimed in year 1, 20% in year 2, 3, and 4 and the balance in year 5.

** Assumes that 25 % of the credit is under current law.

A single facility, according to a recent National Renewable Energy Laboratories study, with thermal storage would cost approximately \$450 million and takes two years to complete.¹ This means that there is an exposure to as much as \$8 million in FY11 (assuming a plant begins construction January 2010). In a response to House Bill 405, a bill relating to the renewable production tax credit, EMNRD believes that there will be facilities that can take advantage of that credit, a credit for production of renewable electricity, by FY12. Also included in the fiscal impact assumptions are two 0.5 MW facilities with a cost of \$2.5 million each.

Assuming this information, the expanded scope of the credit will cost \$5.1 million in FY12, the first year that a party with an interest in a qualified electric generating facility would be able to take the credit. There is however a strong likelihood that more than one facility will be built over the next few years. A geothermal facility has been discussed but is likely several years away from operation but expanding the scope to include photovoltaic facilities may increase the demand for the credit significantly. Photovoltaic facilities can be operational much more quickly since they do not require as much infrastructure.

The fiscal impact assumes that the primary targets of the credit are solar and geothermal but including a coal plant will dramatically increase the fiscal impact. However, the timing of a coal power plant that can both meet the standards in the bill and receive certification is subject to incredible uncertainty.

There will also be a positive fiscal impact to the air quality permit fund that is indeterminate due to NMED's ability to establish a schedule of fees, none of which can exceed \$150,000.

¹ <u>http://www.nrel.gov/csp/troughnet/pdfs/39291.pdf</u> outlines capital costs of a 100MW concentrating solar power facility. PNM's RFP requires that a facility take no more than two years to build (<u>http://www.pnm.com/rfp/solar/home.htm</u>).

SIGNIFICANT ISSUES

The credit can be allocated among several owners or direct investors without regard to ownership share as long as all taxpayers receiving an allocation collectively own five percent of the facility. This makes the credit attractive to investors who may have significant tax liability. The table below illustrates how the credit might be allocated. In the example, Taxpayer A owns most of the facility (75 percent) but has no tax liability. This could be the operator who has not generated income and so has no liability. The other taxpayers collectively own 25 percent of the facility and the credit of \$27 million is allocated to each but not according to share of ownership. Taxpayer B receives the highest allocation, almost half of the credit, even though Taxpayer A only owns 2 percent of the facility. Taxpayer D owns the second largest share but does not have much tax liability either so a smaller allocation is made. The last column shows that the credit can be applied against different tax liabilities, allowing it to be tailored to the taxpayer.

Example of Allocation

Total		100%	\$	75.0	\$	27.0	
Taxpayer D		21%	\$	5.0	\$	4.0	GRT
Taxpayer C		2%	\$	20.0	\$	10.0	PIT
Taxpayer B		2%	\$	50.0	\$	13.0	CIT
Taxpayer A		75%	\$	-	\$	-	
	C	Share of wnership]	Гах Liability	Al	Credit location	Tax Program
Credit	\$	27.0					
Cost	\$	450.0					
Facility							

Types of Generating Facilities

- 1. Animal waste biomass: any facility that uses animal waste (manure, slaughterhouse and other animal processing waste) to generate more than 1 MW of electricity *to a public utility*.
- 2. Biomass: any facility that uses organic material that is available on a renewable and recurring basis to generate more than 1 MW of electricity *to a public utility* provided that it meets emissions criteria indicated below. Types of biomass include forest-related materials, agriculture-related materials, solid wood (trees removed for landscaping/right of way, waste pallets, construction and manufacturing excluding chemically treated waste), crops and trees planted for use in energy generation, landfill and wastewater gas, and some municipal solid waste.
- 3. Coal-based: a new or repowered facility and any associated coal gasification facility up to 700 MW that meets the emissions criteria below and has all sequestration infrastructure in place by January 1, 2017, or 18 months after commercial production begins and has methods to monitor the disposition of carbon dioxide captured and sequestered in place.
- 4. Geothermal: any facility that uses geothermal energy to generate more than 1 MW of electricity and provides the energy to a preexisting electric generating facility.
- 5. Recycled energy: a facility that produces no more than 15 MW of energy produced by converting otherwise lost energy from exhaust stacks or pipes without the combustion of additional fossil fuel.

House Bill 796/HBICS – Page 5

- 6. Solar photovoltaic: a facility that can produce more than 250 kilowatts (KW) that uses solar photovoltaic energy.
- 7. Solar thermal: a facility that uses solar thermal energy to generate at least 1 MW of electricity including a facility that provides energy to an existing facility that uses other types of fuel.

Emissions criteria:

- Biomass (excluding animal waste) facilities: The facility must emit the lesser of what is achievable by the best technology or 35 thousandths pound per MMBTU of sulfur dioxide, 25 thousandths pound per MMBTU of oxides of nitrogen, and 100th pound per MMBTU of total particulates in flue gas or the emissions
- Coal-based: The facility must emit the lesser of what is achievable by the best technology or 35 thousandths pound per MMBTU of sulfur dioxide, 25 thousandths pound per MMBTU of oxides of nitrogen, and 100th pound per MMBTU of total particulates in flue gas or the emissions. The facility also must remove the greater of what is achievable with the best available control technology or 90 percent of mercury, capture and sequester or control carbon dioxide emissions so that by January 1, 2017, or 18 months after the commencement of commercial production (whichever is later), no more than 1,100 pounds per MWh of carbon dioxide is emitted into the atmosphere.

EMNRD reports that HB796 would promote the use of the state's abundant biomass, solar and geothermal resources, stimulate local economies, reduce air pollution and help curb global warming. The agency also reports that adding geothermal and biomass power can help meet base-load electricity needs unlike solar and wind.

PERFORMANCE IMPLICATIONS

NMED's Air Quality Bureau has a legislative performance measure to reduce annual statewide greenhouse gas emissions to a target level.

RELATIONSHIP

Relates to SB237/CS and HB405. HB405a provides a credit for the *production* of renewable electricity. SB237/CS is very similar to HB796/HBICS but does not include biomass or animal biomass facilities.

TECHNICAL ISSUES

NMED:

The term "best available control technology" (BACT) is used in regulating air pollutants and is intended to require application of state-of-the-art emission control technologies. According to the federal Clean Air Act, BACT "means an emission limitation based on the maximum degree of reduction of each pollutant subject to regulation under this chapter emitted from or which results from any major emitting facility, which the permitting authority, on a case-by-case basis, taking into account energy, environmental, and economic impacts and other costs, determines is achievable for such facility through application of production processes and available methods, systems, and techniques, including fuel cleaning, clean fuels, or treatment or innovative fuel combustion techniques for control of each such pollutant. In no event shall application of best available control technology result in emissions of any pollutants which will exceed the emissions allowed by any applicable standard established pursuant to section 7411 or 7412 of this title. Emissions from any source utilizing clean fuels, or any other means, to comply with this paragraph shall not be allowed to increase above levels that would have been required under this paragraph as it existed prior to November 15, 1990."

The definition of BACT in the New Mexico state air quality rules is consistent with the federal definition.

TRD:

Page 22, paragraph (8) (b) reduces the gross receipts tax rate to 0% if the taxpayer's business location is not described in Subsection A of Section 7-1-6.4 NMSA 1978. This bill requires the taxpayer to submit the certificate of eligibility with their income tax return. The Department determines the amount of the credit for which the taxpayer may apply. This suggests that the taxpayer would be unable to complete their return, as the taxpayer would not know the amount of credit that they could apply. Both income tax sections (page 3, Subsection F and page 11, Subsection E) state that any balance of the advanced energy income tax credit. However, it is also not clear how the balance would get transferred to the entity. Additionally, if the taxpayer is a part owner in the corporation, it is not clear how the taxpayer would take the credit against CRS taxes owed.

ALTERNATIVES

According to NMED, HB 796 as drafted has a sunset provision only for "recycled energy projects" and "qualified generating facilities" that utilize coal. The original language in the Advanced Energy Tax Credit required all qualified generating facilities to begin construction prior to December 31, 2015. The definition for "qualified generating facility" should be redrafted to assure that the sunset provision remains in place.

NF/mt:svb

