COVANTA
Powering Today. Protecting Tomorrow.

Comments for the Record

Submitted by Paula Soos
Covanta Vice President, Government Relations
To the U.S. Senate Committee on Finance
Business Income Tax Working Group
April 15, 2015

Summary of Comments:

- Covanta operates over 40 Waste to Energy ("WTE") facilities in North America. WTE technology converts municipal solid waste ("MSW") that would otherwise be put in a landfill into clean, reliable baseload electricity. Covanta's North American facilities annually produce enough energy to power one million homes and reduce greenhouse gas ("GHG") emissions by 20 million tons annually.

- WTE technology is eligible to claim the existing Section 45 Production Tax Credit ("PTC").[1] However, as a practical matter, WTE facilities have been unable to utilize the PTC for new facility development because of the temporary nature of the incentive combined with the long project lead times involving local government procurement laws, and lengthy construction cycles associated with these job-creating infrastructure projects. The ability of other technologies to utilize the PTC and the Section 48 Investment Tax Credit ("ITC") while WTE technology is effectively denied similar tax treatment under current law has had the practical impact of putting new and existing WTE technology at a distinct competitive disadvantage in the energy marketplace.

- In order to give the policy certainty required to encourage the deployment of additional renewable baseload electricity generation, Covanta supports providing a long-term, accessible, clean energy tax incentive for WTE facilities in the Internal Revenue Code. Similarly, tax reform should avoid an arbitrary phase-down or phase-out of tax incentives for baseload renewable technologies.

- A host of policy and market conditions have created challenging economic conditions that threaten to erode the nation's baseload renewable electricity production capacity. Recognizing the need to preserve existing renewable baseload energy capacity, Congress should allow existing WTE and biomass power facilities to claim the PTC on new renewable energy production for two years. This would serve as a meaningful transition to a reformed clean energy tax incentive that could be readily accessed and utilized by baseload renewable energy technologies.

[1] Section 45 Production Tax Credit lapsed on December 31, 2014.

- In the absence of a national renewable energy policy, such as a Renewable Portfolio Standard ("RPS") or Renewable Energy Standard ("RES"), tax policy will continue to be the primary policy tool available to encourage the expanded use of new, and sustain the current operation of, clean energy technologies such as WTE. Recognizing the vital role publicly-owned WTE facilities play in helping meet the nation's energy and environmental objectives, a reformed tax code should provide a mechanism that allows publicly-owned WTE facilities to access and utilize clean energy tax incentives in a manner similar to privately-owned renewable energy projects.

- Covanta supports providing a clean energy tax incentive in the Internal Revenue Code that encourages the domestic production of clean energy that reduces GHG emissions. Covanta is, however, very concerned that subjecting technologies that currently qualify for the PTC or ITC to a rulemaking process that determines a technology's GHG emission profile would subject investors and developers to significant regulatory and legal uncertainty. This would have the unintended consequence of undermining the stable policy framework that is needed to encourage the deployment of clean energy technology.

- The climate benefits of WTE technology are well-documented, both internationally and in the U.S. In the interest of avoiding redundant analysis and significant regulatory and legal uncertainty, it is appropriate for Congress to clarify in statute that WTE technology qualifies fully for a performance-based clean energy tax incentive.

- A comprehensive renewable policy embedded in tax policy should provide equitable benefits and development opportunities; provide a mechanism for supporting technologies adversely affected by piecemeal and conflicting policies which render them artificially uncompetitive; should apply to public and privately owned generators, and include as a component a long term extension of the PTC with technology specific access triggers.

- Covanta sincerely appreciates the important work of the Business Income Tax Working Group ("Working Group") as well as the U.S. Senate Committee on Finance's ("Committee") leadership on this important issue, and looks forward to constructively working with both the Working Group and the Committee to enact a reformed clean energy tax incentive that will allow the expanded use of WTE technology to meet the nation's energy and environmental policy objectives.

****

Covanta appreciates having the opportunity to submit comments to the Working Group. Tax policy plays an integral role in promoting the domestic deployment and use of renewable energy technologies. Comprehensive tax reform provides an opportunity to implement a rational, comprehensive policy that allows baseload renewable energy technologies such as WTE to access and utilize clean energy technologies in a fair and equitable manner. This is an objective consistent with sound federal energy and tax policy, and Covanta stands ready to work constructively with the Working Group and the Committee to achieve this important policy goal.

About Covanta:

Covanta is an internationally recognized owner and operator of WTE and renewable energy projects and has provided reliable and sustainable MSW management to communities since 1986. The company operates over forty state of the art facilities that convert everyday trash into clean, renewable energy for communities around the world. Covanta's North American facilities supply electricity for approximately one million homes. The baseload renewable electricity that Covanta generates is derived from MSW that is consistently replenishable, and all of the energy recovered from the WTE process preserves natural resources, reduces GHG emissions associated with putting MSW in landfills and avoids secondary impacts from mining and the combustion of those resources.

Covanta's U.S. operations process approximately 65 percent of the nation's WTE volume and generate, in combination with our other renewable energy facilities, approximately 8 percent of America's non-hydro renewable electricity. As part of the process, Covanta recovers over 400,000 tons of metal annually for recycling that would have otherwise been lost in landfills. Covanta supports recycling and actively promotes programs that encourage communities to recycle. Studies have shown that communities with a WTE facility typically enjoy higher recycling rates than the national average. In addition, processing MSW at WTE facilities for electricity offsets, on average, one ton of GHG emissions for every ton of waste processed. This occurs by displacing fossil fuels, avoiding methane produced by decomposing trash at landfills and recovering metals for recycling.

Waste to Energy Experience with Current Tax Law:

Overview of Current Law:

Current law provides several important tax incentives to encourage the production and use of renewable electricity. The Section 45 PTC is available to qualifying wind, closed-loop biomass and geothermal projects. A reduced PTC is available for hydropower, small irrigation, open-loop biomass and municipal solid waste, including WTE technology. Qualifying projects that commence construction prior to January 1, 2015 are eligible to claim the credit.

In addition, a 30 percent Section 48 ITC is available to qualifying solar, geothermal, fuel cell, microturbines, combined heat and power, small wind and geothermal heat pump systems that are placed in service by December 31, 2016. *The Tax Increase Prevention Act of 2014* (P.L. 113-295) also allows PTC eligible projects that commence construction prior to January 1, 2015 to claim the ITC in lieu of the PTC.

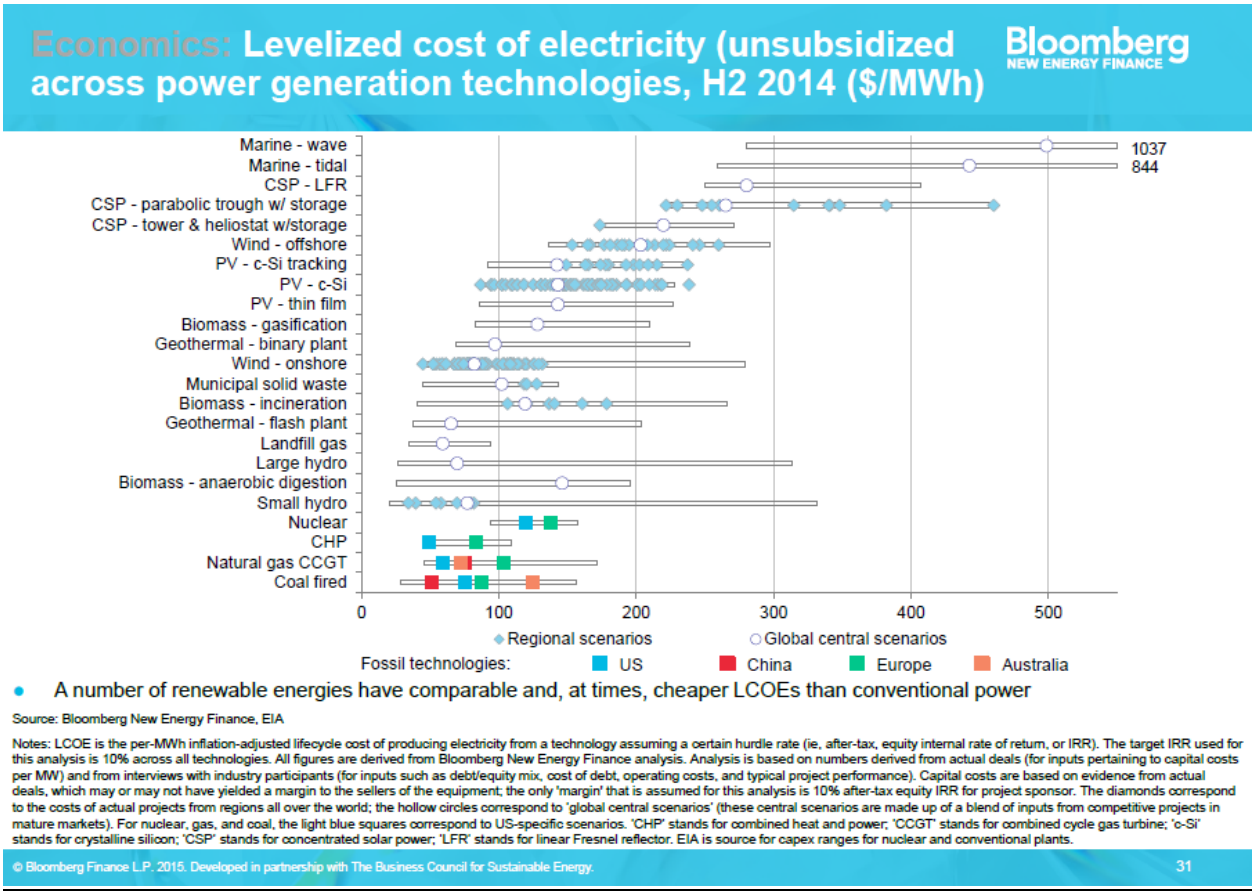
Competitiveness, Levelized Cost and Tax Policy:

The structure and function of current law clean energy tax incentives have had the practical effect of putting WTE companies at competitive disadvantage in the marketplace.

All things being equal, WTE is a competitive renewable energy technology. The U.S. Department of Energy's Energy Information Administration ("EIA") typically uses Levelized Cost ("LCOE") to measure the competitiveness of a particular energy resource. EIA defines LCOE as:

"Levelized cost is often cited as a convenient summary measure of the overall competiveness of different generating technologies. Levelized cost represents the present value of the total cost of building and operating a generating plant over an assumed financial life and duty cycle, converted to equal annual payments and expressed in terms of real dollars to remove the impact of inflation. Levelized cost reflects overnight capital cost, fuel cost, fixed and variable O&M cost, financing costs, and an assumed utilization rate for each plant type."

As the following chart demonstrates, WTE technology has a LCOE that is very competitive with other commercial sources of renewable electricity.



Source: Bloomberg New Energy Finance/Business Council for Sustainable Energy *Sustainable Energy in America 2015 Factbook.*

For some technologies, current law renewable electricity tax incentives, namely the PTC and ITC, have been highly effective in spurring the deployment of certain types of technology. For example, the American Wind Energy Association notes that the U.S. has installed over 65 GW of capacity through the end of 2014, and 31% of new generating capacity over the last 5 years. The solar industry has experienced significant growth, and Solar Energy Industries Association notes that 20,000 GW of solar has been installed since the ITC was enacted in 2006. This impressive growth is due in large part to the fact that the PTC and ITC are structured in a manner that readily allows these industries to effectively utilize these tax incentives.

By contrast, and despite being a technology with a highly competitive LCOE that produces reliable baseload electricity, there has been only one new greenfield WTE facility placed in service in the U.S. since 1995, along with several facility expansions. Neither this project nor the expansion qualified for the PTC, and other projects that might have qualified failed to advance beyond the development stages. This is due in large part to the structure of the PTC. Under current law, WTE projects are eligible for a PTC that is one half the value on a per kilowatt hour basis compared to the PTC that can be claimed by eligible wind, geothermal and closed-loop biomass projects. As a practical matter, however, the PTC cannot be utilized by WTE facilities because of, among other things, the long lead times involving local government procurement laws, and lengthy construction cycles associated with these otherwise economically competitive projects. Additionally, any facility with local government ownership is precluded from claiming the PTC as it is not a tax-paying entity. The ability of other technologies to utilize the PTC and ITC while WTE technology is effectively denied similar tax treatment under current law has the practical impact of putting WTE technology at a distinct competitive disadvantage in the energy marketplace.

Covanta Perspective on Tax Reform:

Covanta Supports Maintaining Clean Energy Tax Incentives in the Internal Revenue Code:

Experience with the current law PTC and ITC has shown that tax incentives can effectively promote the deployment and use of renewable energy technologies when taxpayers can readily access and utilize the incentives. To address the nation's environmental and energy policy objectives, it is appropriate for Congress to provide equitable tax incentives fairly across all renewable technologies that encourage the production and use of clean energy within the context of tax reform.

The Need for Policy Certainty and Reliability:

Long-term policy certainty is the optimal way to maximize the environmental, economic and energy diversity benefits of a tax incentive designed to spur the deployment of clean and renewable energy technologies such as WTE. A permanent clean energy incentive would be the best way to spur private sector investment and provide certainty in the marketplace, as it would significantly mitigate the regulatory, legal and legislative uncertainty that hinders the deployment of clean energy technology. Accordingly, Covanta supports providing a long-term, seamless and reliable clean energy tax incentive in the Internal Revenue Code.

Policy certainty is vital to Covanta and the WTE industry. Due to the unique permitting, financing, engineering and municipal negotiations required to build a new WTE facility, it takes a minimum of five to eight years from project inception to place a WTE facility in service. These long project lead times combined with the limited and sporadic duration of federal tax incentives have impeded Covanta's ability to access the existing renewable energy tax incentives that have been widely available and utilized by other participants in the energy marketplace. Providing municipalities and private industry the certainty needed to incorporate the value of an incentive in a WTE project's financing model will significantly improve the prospects of a project coming to fruition, and in the process, level the competitive playing field for WTE projects.

Tax Reform Should Not Include an Arbitrary Phase-Down of PTC Eligibility for WTE and Other Baseload Renewable Technologies:

The current law PTC can be utilized by qualifying wind, closed-loop biomass, geothermal, hydropower, small irrigation, open-loop biomass and MSW, including WTE, technologies. However, baseload renewable energy technologies – in particular WTE projects – have historically been limited in their ability to access and utilize the PTC. As it has with other renewable baseload technologies, this has inadvertently hindered the deployment of new WTE facilities and put existing facilities that have been unable to utilize the PTC at a competitive disadvantage in the marketplace.

There are significant energy and environmental policy benefits associated with WTE technology. The ability to generate baseload power from renewable sources such as MSW enhances the stability of the electricity grid and protects energy consumers against fluctuations in commodity markets. Converting MSW that would otherwise be put in a landfill into a baseload renewable electricity in a manner that significantly reduces GHG emissions is a superior way of managing MSW and is consistent with the nation's environmental policy objectives.

To maintain existing baseload renewable infrastructure and reap the significant energy and environmental benefits associated with WTE and other baseload renewable energy technologies, tax reform should provide access to a long-term renewable energy tax incentive and avoid an arbitrary phase-down or phase-out of tax incentives for baseload renewable technologies.

Taxpayers Should be Able to Utilize Either a PTC or ITC:

Current law allows taxpayers who qualify for the PTC to claim the ITC in lieu of the PTC. If both a PTC and ITC are maintained in a reformed tax code, the ability of taxpayers to make this election should be preserved. Allowing this common sense election in a technology neutral manner provides taxpayers with additional flexibility that will help meet the unique financing considerations of specific WTE projects.

Existing WTE Facilities Should Be Allowed to Access Renewable Energy Tax Incentives for New Production:

Revenue from a WTE facility is primarily derived from the sale of baseload renewable electricity; fees charged to accept and combust waste material; and the recovery and resale of recyclable materials. Competition from landfills and other energy providers, many of which have been able to readily access and utilize existing federal and state incentives, have contributed to a challenging economic climate for WTE facilities.

Enactment of *the American Jobs Creation Act of 2004* (P.L. 108-357) expanded the list of technologies eligible to claim the PTC to include WTE facilities. However, due to a historical anomaly in the evolution of the PTC, the vast majority of existing WTE facilities were never eligible to claim the 10 years of production credits generally allowed for other competing renewable electricity technologies. Further, only one new greenfield WTE facility has been placed in service since the technology became eligible to claim the PTC.

It is in the national interest to encourage the deployment of new WTE facilities. It is equally important to maintain existing WTE facilities. WTE facilities are a vastly superior alternative to landfills as it pertains to the safe and environmentally responsible management of waste. Existing utility scale WTE facilities also provide reliable generation of renewable baseload electricity that helps diversify the nation's energy portfolio and provides a hedge against swings in commodity prices.

In the 113th Congress, U.S. Senators Robert Menendez (D-NJ), Susan Collins (R-ME) and Ben Cardin (D-MD) introduced S. 2865. Recognizing the need to preserve existing renewable baseload energy capacity, the proposal would allow existing WTE and biomass power facilities claim the PTC for two years. Under the proposal, qualifying facilities would be prohibited from claiming an aggregate stream of credits totaling more than 10 years. Covanta strongly supports this common-sense proposal, as it would not only help promote the worthwhile policy objective of preserving environmentally-friendly energy infrastructure, but could serve as a transition to a more rational clean energy tax incentive that can be readily accessed and utilized by WTE projects.

Need for Equitable Access for Municipal WTE Facilities:

Covanta operates over 40 WTE facilities in the U.S. Nearly half of these facilities are owned by municipalities who enter into a contractual arrangement with Covanta to utilize the company's expertise to manage and operate a publicly-owned WTE facility.

At the federal level, tax incentives have been and continue to be the primary policy mechanisms used to drive the deployment and use of clean energy technology. To the degree that various technologies have been able to widely access and utilize these tax incentives, it has increased overall deployment and reduced costs.

In the absence of a national renewable energy policy, such as a Renewable Portfolio Standard ("RPS") or Renewable Energy Standard ("RES"), tax policy will continue to be the primary policy tool available to encourage the expanded use of clean energy technology such as WTE. Recognizing the vital role publicly-owned WTE facilities play in helping meet the nation's energy and environmental objectives, a reformed tax code should provide a mechanism that allows publicly-owned WTE facilities to access and utilize clean energy tax incentives in a manner similar to privately-owned renewable energy projects.

Perspective on Performance-Based Measures:

On December 18, 2013, the Committee released the document *Staff Discussion Draft on Energy Tax Reform* ("Draft"). In general, the Draft outlined a performance-based clean energy tax incentive that would base credit eligibility on the grams of CO2e per KWh emitted by an eligible facility.

Covanta supports providing a clean energy tax incentive in the Internal Revenue Code that encourages the domestic production of clean energy that reduces GHG emissions. Covanta applauds the Draft's intent to give investors policy certainty by providing a long-term clean energy incentive. Covanta also supports giving taxpayers the option to claim a reformed clean energy incentive as either a PTC or an ITC.

Covanta is very concerned, however, that subjecting technologies that currently qualify for the PTC or ITC to a rulemaking process that determines a technology's GHG emission profile would subject

investors and developers to significant regulatory and legal uncertainty. This would have the unintended consequence of undermining the stable policy framework that is needed to encourage the deployment of clean energy technology.

GHG Emission Calculations, Rulemakings and Policy Uncertainty:

The Draft would provide a 2.3 cents per KWh PTC (indexed for inflation) or a 20% ITC for clean electricity that is determined to have no GHG emissions. Facilities emitting between one and 372 grams of CO2e per KWh would be eligible for a reduced credit on a linear sliding scale. Taxpayers opting to claim the PTC would be eligible to claim credits for 10 years after the facility was placed in service.

To determine the value of the incentive for individual technologies, the Draft would require the U.S. Department of Treasury ("Treasury"), in consultation with the Environmental Protection Agency ("EPA"), to determine a technology's GHG emission profile, based on source GHG emissions expressed as grams of CO2e per KWh. Treasury would be charged with establishing through regulations safe-harbor GHG emission rates for types or categories of facilities that taxpayers can utilize for purposes of calculating the value of either the clean energy ITC or PTC.

The Draft also provides that in the case of a facility that produces electricity from non-fossil fuel combustion or gasification, GHG emissions will be determined based on a facility's net emissions, expressed as grams of CO2e per KWh. For facilities that produce electricity from non-fossil combustion or gasification, it is appropriate to consider a technology's net lifecycle GHG emission profile. Covanta supports a life cycle analysis of the net greenhouse gas emissions of WTE facilities, as well as the use of EPA's Decision Support Tool in determining those emissions. On a national average, the Decision Support Tool shows WTE facilities have a net-negative GHG impact of one ton below zero for each ton of waste processed.

Covanta is very concerned, however, that the regulatory regime provided for in the Draft would require redundant analysis and could have the unintended consequence of undermining the proposal's goal of providing policy certainty in a technology neutral manner. Specifically, the requirement that Treasury, in consultation with EPA, would promulgate rules to determine a technology's GHG emission profile would inject a significant degree of redundancy, volatility and uncertainty. This could have the practical impact of subjecting WTE companies to regulatory risk and exposure beyond what is caused by the uncertainty of current law. Given the recognition of WTE both in the U.S. and internationally as a net GHG mitigating technology, this step appears to add unnecessary and burdensome requirements.

Covanta fully supports the underlying premise in the Draft that clean energy tax incentives should provide policy certainty and be directed to technologies that reduce GHG emissions. However, the regulatory regime outlined in the draft would have the unintended consequence of causing significant regulatory and legal uncertainty, particularly for non-fossil combustion and gasification technologies. This would undermine the draft proposal's laudable goal of providing a stable, transparent and technology neutral policy framework for stakeholders and investors in clean energy projects – in particular for non-fossil combustion and gasification technologies such as WTE projects.

It is important to specifically note that the uncertainty associated with the Draft's GHG regulatory regime would impede the ability to incorporate the value of the clean energy incentive in a WTE project's cost structure. It typically takes between $300 million and $500 million to place a WTE facility

in service, depending on the facility's size. WTE projects are unique in that a WTE company like Covanta must successfully conclude complex financial negotiations with a municipality before construction of a facility can move forward.

The ultimate success of these negotiations is based on a number of factors, including the cost of a WTE facility compared to the environmentally inferior option of a municipality sending its MSW to a landfill. Just as the short-term duration of the current law PTC precludes WTE projects from accessing existing clean energy incentives for new project development, a prolonged and uncertain rulemaking process that casts doubt on a project's ability to access the incentive would also make it highly improbable that the value of the Draft's clean energy tax credits could be utilized to lower the overall negotiated cost of a WTE facility.

Approach to Provide Policy Certainty and Promote Clean Energy Technologies:

The current law Section 45 PTC and Section 48 ITC identify in statute technologies that are eligible to claim these renewable energy tax incentives. The environmental attributes of these technologies are well-documented, and it is the appropriate role for Congress to clarify in statute the eligibility of technologies that currently qualify for the existing Section 45 PTC and Section 48 ITC to utilize the full value of the reformed clean energy tax incentives provided in the Draft.

The committee should have confidence that listing WTE in statute as qualifying for the full reformed clean energy incentive provided in the Draft is consistent with the policy goal of incentivizing technologies with zero net lifecycle GHG emissions. Recognition of WTE as a GHG mitigation tool (and inclusion of WTE as an eligible source of carbon offsets) follows the long established recognition of the U.S. EPA[2], U.S. EPA scientists[3], Intergovernmental Panel on Climate Change (IPCC)[4], the Clean Development Mechanism (CDM) of the Kyoto Protocol[5], and the European Union[6]. The World Economic Forum in its 2009 Davos Report, identified waste-to-energy as one of eight technologies likely to make a significant contribution for a future low carbon global energy future[7]. This is also consistent with other legislative drafts considered in the Senate which simply identified WTE as eligible for a full credit.

---

[2] USEPA, Air Emissions from MSW Combustion Facilities webpage http://www.epa.gov/epawaste/nonhaz/municipal/EfW/airem.htm#7

[3] Kaplan, P.O, J. DeCarolis, and S. Thorneloe, 2009, Is it better to burn or bury waste for clean electricity generation? *Environ. Sci. Technology* 43 (6) pp1711-1717. Available at: http://pubs.acs.org/doi/abs/10.1021/es802395e

[4] WTE identified as a "key mitigation measure" in IPCC, "Climate Change 2007: Synthesis Report. Contribution of Work Groups I, II, and III to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change" [Core Writing Team, Pachauri, R.K and Reisinger, A. (eds.)]. IPCC, Geneva, Switzerland, 104 pp. Available at: http://www.ipcc.ch/publications_and_data/publications_ipcc_fourth_assessment_report_synthesis_report.htm

[5] Clean Development Mechanism Executive Board: "Approved baseline and monitoring methodology AM0025: Avoided emissions from organic waste through alternative waste treatment processes." Available at: http://www.cdm.unfcc.int/methodologies/DB/3STKBX3UY84WXOQWIO9W7J1B40FMD

[6] European Environmental Agency (2008) Better management of municipal waste will reduce greenhouse gas emissions. Available at: http://www.eea.europa.eu/publications/briefing_2008_1/EN_Briefing_01-2008.pdf

[7] World Economic Forum. *Green Investing: Towards a Clean Energy Infrastructure.* January 2009. Available at: http://www.weforum.org/pdf/climate/Green.pdf

This accomplishes the objective of providing a reliable tax policy framework that encourages the deployment of proven clean energy technologies that reduce GHG emissions. This approach would also avoid the unintended and unnecessary regulatory and legal uncertainty that would undoubtedly result from a lengthy and uncertain rulemaking process that requires Treasury, in consultation with EPA, to conduct the analysis required to determine technology's GHG emission profile.

Recognizing the policy rationale for a reformed clean energy incentive to accommodate new technologies that are not currently eligible for either the Section 45 PTC or the Section 48 ITC, the committee could consider several options. For example, a process could be employed to allow technologies that do not qualify for the current law PTC or ITC to petition Treasury, who in consultation with EPA, would determine if the technology meets the GHG emission parameters established in the Draft. Another approach would allow for agency-initiated rulemakings to address these technologies. In addition, Congress should retain its prerogative to independently review a specific technology's energy and environmental benefits and list the technology in statute as qualifying for the reformed clean energy incentives. This would give taxpayers a method to become eligible for the incentives independent of a statutory change while preserving Congress' ability to include a technology in an instance where a petition or a rulemaking process have become mired in bureaucratic delay and the facts and circumstances merit listing of the technology in statute.

In Conclusion:

Covanta sincerely appreciates the committee's efforts to reform and improve the important tax incentives that encourage the domestic deployment and use of clean energy technologies. Experience has shown that properly crafted tax incentives can help the nation meet its larger energy and environmental policy objectives, and Covanta stands ready to work constructively with both the Working Group and the committee to craft an energy tax reform package that addresses the shortcomings of current law and includes WTE technology.

Again, Covanta thanks you for the opportunity to provide comments to the Working Group and applauds the committee's efforts to address this issue of vital importance to America's WTE industry.