March 30, 2016

<u>SUBMITTED VIA ECOMMENT SYSTEM</u>
Department of Environmental Protection
Policy Office
Rachel Carson State Office Building
P.O. Box 2063
Harrisburg, PA 17105-2063

RE: Draft 2015 Climate Change Action Plan Update

Dear Sir/Madam:

On behalf of the solid waste industry, the National Waste & Recycling Association (NWRA) is pleased to provide these comments on the second Draft Climate Change Action Plan Update (Climate Plan). The NWRA is a not-for-profit trade association representing private solid waste and recycling collection, processing, and management companies that operate in all fifty states.

US EPA State Inventory Tool

NWRA supports the use of the US EPA State Inventory Tool (SIT) for the Climate Plan. The DEP already uses it to calculate the annual greenhouse gas (GHG) emissions inventory. The SIT is based upon sound science providing an objective analysis of statewide GHG emissions. According to US EPA, "The SIT and Projection Tool…is most appropriate for use by state agencies or other groups seeking to develop a State GHG inventory."[1] Using the SIT for the Climate Plan ensures that DEP's previous emission inventories are comparable to the Climate Plan results because the same methodology is used for both.

We understand that other commenters have recommended other methodologies for emission inventory purposes, including life-cycle analysis-type analyses such as US EPA Waste Reduction Model (WARM). WARM is a powerful life-cycle based tool for determining the GHG benefits from various end-of-life waste scenarios. However, it is not an appropriate model for calculating annual GHG emissions as stated by US EPA, "This [WARM] life-cycle approach is not appropriate for use in inventories because of the

[1] US EPA, *State Inventory and Projection Tool*, http://www3.epa.gov/statelocalclimate/resources/tool.html (accessed Feb. 23 2016).

diffuse nature of the emissions and emission reductions within a single emission factor."[2] Use of life-cycle analyses is clearly not appropriate for annual emission inventory purposes because its fundamental basis—analyzing the emissions of an activity over its lifetime—is incompatible with the purpose of an annual emission inventory, which calculates the emissions that occur in a specific year.

The Role of Pennsylvania's Landfills in Climate Change

Nationally, landfilling represents a small percentage of GHG emissions, and this holds true for Pennsylvania also. In fact, as shown in Table 3.8.1 of the Climate Plan, landfills had a net reduction on the total statewide GHG emissions by approximately 0.415 MMTCO2e.[3] In fact, the forestry sector and the landfill sub-sector are the only source types identified in the entire statewide emission inventory that have the overall effect of reducing GHG emissions statewide.

One of the reasons driving the positive impact of landfills on climate change is the Commonwealth's historical leadership in the beneficial use of landfill gas. Pennsylvania's landfills were early adopters of technology to use landfill gas to produce renewable energy (a Tier I resource under the Alternative Energy Portfolio Standards Act) and Pennsylvania has the second highest number of landfill gas beneficial use projects in the country. In fact, as the Climate Plan notes, the White House's recent *Climate Action Plan, Strategy to Reduce Methane Emissions* cited a Pennsylvania landfill as the national case study on how to reduce GHG emissions from landfills. NWRA notes that landfills in other states have made significant strides in reducing their GHG emissions and installing renewable energy projects powered by landfill gas and that as a whole, no industry has had a greater reduction in GHG emissions over the last 20 years than landfills.

NWRA believes the contributions of landfills should be more clearly and explicitly noted in the Climate Plan.

Work Plans

Recycling Work Plan

The DEP developed the Recycling Work Plan documenting cost-effective steps to achieving significant GHG reductions through recycling. In essence, these reductions would actually save money. According to Chapter 5 of the 2013 update of the Climate Change Action Plan, if the steps outlined in this work plan were implemented, a net economic benefit to of $90 million would accrue to the citizens and businesses of the Commonwealth.

However, recycling operations around Pennsylvania, just like those across the nation, are struggling under severe economic pressures, mainly due to low commodity prices. This is the result of several factors including decreased demand for feedstocks, strong dollar and low oil prices. As a whole, recycled

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[2] US EPA, Subsection Note to *Waste Reduction Model*, *(WARM)*, https://www3.epa.gov/warm/index.html (last updated Feb. 23, 2016). It is our understanding that this model has been suggested for use to the DEP as it relates to emissions from the waste management industry.

[3] *See* Climate Plan, tables 3.8.1to *Chapter 3: Inventory and Projections*, 33, http://www.elibrary.dep.state.pa.us/dsweb/Get/Document-110839/DRAFT%202015%20Climate%20Change%20Action%20Plan%20Update.pdf.

materials are selling for half what they were selling for just 5 years ago. Pennsylvania's recyclers have not been immune to these factors.

If the Climate Plan included the implementation of the Recycling Work Plan, many of the problems experienced by the recycling industry could be addressed. In addition, the recycling rate would increase, economics would improve, consumer behaviors would support recycling, existing structural/regulatory impediments could be overcome, and recycling availability would expand to underserved areas such as public gathering places.

NWRA urges the DEP to restate its support for the Recycling Work Plan in the Climate Plan and immediately begin implementing the plan. We suggest that DEP also communicate directly with other state agencies, legislators, the Governor's Office and other relevant stakeholders regarding specific actions each group can take to implement this work plan.

Beneficial Use of Municipal Solid Waste Work Plan

Landfill gas derived from municipal solid waste is a source of renewable energy. It is generated from the biodegradation of organic fraction of the waste. When collected, it can be used to produce electricity, processed into a renewable substitute for natural gas, processed into a compressed natural gas substitute for use as a renewable vehicle fuel, or used as a medium-BTU renewable fuel in boilers and similar devices.

The 2013 update of the Climate Plan contained a Beneficial Use of Municipal Solid Waste Work Plan that documented seven barriers to increasing the utilization rate of landfill gas. This work plan suggested specific actions and detailed implementation steps to increase beneficial use of landfill gas. To date, these recommendations have not been implemented, stalling its use. To get back on track, NWRA urges the DEP to support this work plan in the Climate Plan and to immediately begin implementing the recommendations.

Net metering

Public Utility Commission on Net Metering

On January 6, 2015, the Climate Change Advisory Committee (CCAC) unanimously adopted the Digester Work Plan which would create renewable electricity and offset GHG emissions from fossil fuels by supporting manure digesters. The biggest threat to developing digester projects are net metering restrictions due to a regulation proposed by the Public Utility Commission (PUC) on July 5, 2014 that "eliminate[s] any reasonable possibility of future digester installation in Pennsylvania."[4]

The work plan encouraged the PUC to withdraw the net metering rulemaking, noting that it was opposed by a "broad coalition of farmers, renewable energy stakeholders, and environmental advocacy organizations and industry trade groups." The work plan also "encourage[d] single farms and combination farms to build digesters through outreach training and removal of any existing barriers to joint projects…"

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[4] See Appendix B of the Climate Plan, *CCAC Work Plan 13: Manure Digesters*, 248-257 http://www.elibrary.dep.state.pa.us/dsweb/Get/Document-110839/DRAFT%202015%20Climate%20Change%20Action%20Plan%20Update.pdf.

Thirteen months after CCAC's adoption of the Digester Work Plan, the PUC exempted farmers located in specific parts of the state and added barriers that eliminate any possibility of joint digester projects between farmers. These actions directly contradict the DEP's and CCAC's work plan, and will suppress the generation of renewable electricity, particularly from Tier I sources under the Alternative Energy Portfolio Standards Act, thereby increasing GHG emissions statewide.

The PUC failed to recognize or acknowledge CCAC's recommendation, despite receiving formal comments on the matter and despite having a representative on the CCAC. Its actions imply that the DEP's efforts to fight climate change, including the work performed by the CCAC and the Climate Change Action Plan are not taken seriously by senior policy makers in the administration, especially by PUC Commissioners. The PUC must now forward the final rulemaking package to the Independent Regulatory Review Commission (IRRC) for final review. Given the importance of encouraging renewable energy, NWRA recommends that the DEP submit comments to the IRRC opposing this rulemaking.

Legislative Recommendation

NWRA understands that the General Assembly is considering several bills that could restore net metering to sources of biologically derived methane gas, including farm digesters and landfills. NWRA recommends that DEP review and evaluate those bills to determine if it should recommend passage of them in the Climate Plan's Legislation section. NWRA further recommends that the DEP alert senior policy personnel in Governor Wolf's administration to this issue and the importance of combatting climate change.

Conclusion

NWRA appreciates the opportunity to provide comments on the Climate Plan. We believe that this report, which is supported by US EPA recommended models and objective criteria, will further Pennsylvania's efforts to reduce GHG emissions. Should you have any questions about these comments, please call me at 202-364-3724 or e-mail me at agermain@wasterecycling.org.

Very truly yours,

Anne Germain
Director of Waste & Recycling Technology
National Waste & Recycling Association