MINUTES ENVIRONMENTAL QUALITY BOARD MEETING September 15, 2020

VOTING MEMBERS AND/OR ALTERNATES PRESENT

Patrick McDonnell, Chair, Secretary, Department of Environmental Protection Erin Smith Wachter, alternate for Meg Snead, Secretary, Governor's Office of Policy and Planning Dennis Davin, Secretary, Department of Community and Economic Development

Dr. Rachel Levine, Secretary, Department of Health

(Peter Blank, alternate for Dr. Rachel Levine, Secretary, Department of Health)

Jerry Oleksiak, Secretary, Department of Labor and Industry

Yassmin Gramian, Secretary, Department of Transportation

(Natasha Fackler, alternate for Yassmin Gramian, Secretary, Department of Transportation)

Heather Smiles, alternate for Tim Schaeffer, Executive Director, Pennsylvania Fish and Boat Commission Russell Redding, Secretary, Department of Agriculture

Michael DiMatteo, alternate for Bryan Burhans, Executive Director, Pennsylvania Game Commission

Andrea Lowery, Executive Director, Pennsylvania Historical and Museum Commission

Gladys Brown Dutrieuille, Chairman, Public Utility Commission

Senator Gene Yaw, Senate Environmental Resources and Energy Committee of Pennsylvania

Senator Steven Santarsiero, Senate Environmental Resources and Energy Committee of Pennsylvania

Representative Daryl Metcalfe, House Environmental Resources and Energy Committee

Representative Greg Vitali, House Environmental Resources and Energy Committee

Cynthia Carrow, Citizens Advisory Council

Mark Caskey, Citizens Advisory Council

Duane Mowery, Citizens Advisory Council

John St. Clair, Citizens Advisory Council

Jim Welty, Citizens Advisory Council

DEPARTMENT OF ENVIRONMENTAL PROTECTION STAFF PRESENT

Laura Griffin, Regulatory Coordinator Jessica Shirley, Policy Director Robert "Bo" Reiley, Bureau of Regulatory Counsel

CALL TO ORDER AND APPROVAL OF MINUTES

The virtual meeting of the Environmental Quality Board (EQB or Board) was called to order by Chairperson McDonnell at 9:02 a.m. via Webex. The Board considered its first item of business; approval of the July 21, 2020, EQB meeting minutes.

Representative Vitali made a motion to adopt the July 21, 2020, EQB meeting minutes. Senator Santarsiero seconded the motion, which was unanimously approved by the Board. (19-0)

CONSIDERATION OF PROPOSED RULEMAKING: CO₂ BUDGET TRADING PROGRAM (25 Pa. Code Chapter 145, Subchapter E)

Krishnan Ramamurthy (Deputy Secretary for Waste, Air, Radiation and Remediation) provided an overview of the proposed rulemaking. Allen Landis (Executive Policy Specialist for Policy Office) and Jennie Demjanick (Assistant Counsel for Bureau of Regulatory Counsel) assisted with the presentation.

Following the Department's presentation, Representative Vitali thanked Mr. Ramamurthy and the Department for the comprehensive presentation and for the work that has been done on the proposed regulation. He commented that a yes vote today is a no brainer and that the big picture is that climate change is the most serious long-term threat to this planet. He noted that we are seeing climate change impacts already, like the current wildfires in California as well as Superstorm Sandy and Hurricanes Katrina and Maria. He pointed out that Pennsylvania will experience negative effects on the ski industry, trout fishing, agriculture and Lyme disease. Climate change needs to be dealt with and this proposal is logical and a market-based solution. It puts a price on emitting carbon into the atmosphere and allows businesses to figure out the most efficient way to do that. He stressed the benefits of the proposal, including reductions in the air pollutants NOx, SOx and particulate matter, as well as additional jobs. Representative Vitali noted the success current RGGI participants have had and referenced the Acadia study which showed a 5.7% reduction in electricity rates in RGGI states over the last ten years. He continued by saying that Pennsylvania is a major greenhouse gas producer and needs to get to carbon neutrality. He noted that critics of the proposal have not proposed any solutions of their own. He concluded that we need to get the rulemaking process started because we are running out of time.

Dr. Levine stressed strong support for the RGGI initiative as there are numerous health benefits that closely align with the Department of Health's vision for a healthy Pennsylvania for all. This includes health benefits for adults and critically important health benefits for children. In the public health field, the environment is considered a social determinant of health. Social determinants of health are other societal interests that are not usually thought of in terms of traditional health care, such as a living minimum wage, transportation, education, and food availability and nutrition, noting that the environment is a very important health issue. She said research suggests that negative health impacts from climate change and greenhouse gases disproportionately impact vulnerable communities. Because Pennsylvania's participation in RGGI would decrease health care costs while improving public health, Dr. Levine reiterated her support for the proposed rulemaking.

Secretary McDonnell stated all questions and comments related to the regulation or the Department's presentation would be taken first and the motions and other discussion would be handled last.

Representative Metcalfe asked for a detailed explanation regarding the statutory authority of the Department and EQB. He requested to hear the argument as to why the RGGI auction would meet the definition of a fee under Pennsylvania law, instead of a tax. He also questioned why this would not be required to be submitted to the General Assembly for approval.

Jennie Demjanick responded that the EQB has the authority to promulgate this proposed rulemaking under the Air Pollution Control Act (APCA). Through the APCA, the Legislature granted the Department and the Board the authority to protect the air resources of this Commonwealth, which is inclusive of controlling carbon dioxide (CO₂) pollution. CO₂ falls under the definition of "air pollution" in Section 3 of the Air Pollution Control Act APCA (35 P.S. § 4003).

She stated that Section 5(a)(1) of the APCA (35 P.S. § 4005(a)(1)), grants the Board the authority to adopt rules and regulations for the prevention, control, reduction, and abatement of air pollution in this Commonwealth. Under Section 5(a)(1) of the APCA, the Department is also authorized and currently participates in regional cap and trade programs similar to the Regional Greenhouse Gas Initiative (RGGI). In fact, two of the Department's existing cap and trade regulations, the NOx Budget Trading Program in Chapter 145, Subchapter A and the Clean Air Interstate Rule NOx and SO₂ Trading Program in Chapter 145, Subchapter D, were promulgated under the authority of Section 5(a)(1) of the APCA. Additionally, as required under the Commonwealth Documents Law, the Office of Attorney General will review this proposed rulemaking for form and legality prior to publication.

Demjanick stated that CO₂ is a regulated air pollutant under both the APCA and the Federal Clean Air Act (CAA). Pennsylvania Courts have found that the regulation of air pollution has long been a valid public interest. The Commonwealth Court has also endorsed the Department's position that the General Assembly, through the APCA, gave the Department the authority to reduce greenhouse gas emissions, including CO₂. Federal courts have also stated that CO₂ is a regulated air pollutant. In *Massachusetts v. EPA*, 549 U.S. 497 (2007) the U.S. Supreme Court recognized that similarly broad language in the CAA authorized the U.S. Environmental Protection Agency (EPA) to regulate CO₂ emissions under the CAA.

As provided under Section 9.2(a) of the APCA (35 P.S. § 4009.2(a)), this Commonwealth's auction proceeds will be held in a subaccount within the Clean Air Fund. The Clean Air Fund is administered by the Department "for use in the elimination of air pollution." Section 9.2(a) of the APCA also authorizes the Department to establish separate accounts in the Clean Air Fund as may be necessary or appropriate to implement the requirements of the APCA. Under Section 9.2(a) of the APCA, the Board was required to adopt a regulation for the management and use of the money in the Clean Air Fund. The Board adopted Chapter 143 (relating to disbursements from the Clean Air Fund) to provide for the monies paid into the Clean Air Fund to be disbursed at the discretion of the Secretary for use in the elimination of air pollution. See 25 Pa. Code § 143.1(a). The full and normal range of activities of the Department are considered to contribute to the elimination of air pollution. See 25 Pa. Code § 143.1(b).

Demjanick continued that RGGI participation does not establish a carbon tax. None of the participating states' regulations establish a carbon tax. Additionally, the RGGI program has not been considered a tax in the ten states that currently implement the program. Pennsylvania courts describe taxes as "revenue-producing measures authorized under the taxing power of the government." The intent of the RGGI program is not to generate revenue, but to achieve a common goal of reducing CO₂ emissions from power plants. The Department is limited by its existing statutory authority under Section 9.2(a) of the APCA, and therefore the auction proceeds cannot be spent on anything other than eliminating air pollution. The auction proceeds would be used in Pennsylvania solely "for use in the elimination of air pollution," as authorized under section 9.2 of the APCA (35 P.S. § 4009.2). Funds generated would be deposited in a segregated account in the Clean Air Fund to be used for the specific purpose of eliminating air pollution, particularly greenhouse gas emissions to further achieve the purpose of this proposed rulemaking.

She concluded by stating that Section 6.3(a) of the APCA provides the Department with the authority to establish fees to support the air pollution control program. Under Section 9.2(a) of the APCA, all fines, civil penalties and fees shall be administered by the Department for use in the elimination of air pollution.

Representative Metcalfe also asked about any sort of multistate agreement. Jennie Demjanick responded that states participating in RGGI do not sign a multistate agreement or compact. The Department will not be executing a Memorandum of Understanding with other states, or any other agreement or compact. The

proposed rulemaking's linkage with RGGI does not amount to an agreement or compact for the submission to the General Assembly. RGGI is a regional initiative, where participating states develop regulations that are capable of linking with similar regulations in other states. States may withdraw from participation at any time.

Representative Metcalfe asked if the presentation and the detailed information was the result of work done by ICF. Allen Landis responded that some of the economic modeling results and power sector references mentioned in the presentation were from data provided by the Department's expert modeling consultant, ICF.

Representative Metcalfe questioned why the company hired to model for RGGI has also been advocating on behalf of RGGI and how the proceeds would be spent. Allen Landis answered that the Department has full confidence in ICF's capabilities and the results they provided as ICF is an unbiased modeling consultant. ICF has been hired by several different organizations and companies to perform power sector modeling. He added that the Department had significant oversight of the modeling process. The data and assumptions came from the Department and reputable sources like EPA's Clean Air Market Division and the U.S. Energy Information Administration. He went on to state the model that ICF used is a proprietary model developed by ICF for the power sector and it's the same platform used by EPA for their policy scenarios for several EPA regulatory initiatives. Mr. Landis, regarding the letter sent to EQB members, explained that the letter was representing widespread business support of RGGI and included a broad coalition of businesses across this Commonwealth. While the letter did include ICF's logo, Mr. Landis explained that ICF has repeatedly clarified that it had no knowledge of and did not give permission for its logo to be used in the letter supporting the proposal and had they been asked to participate, they would have declined since ICF is a non-partisan and non-political company. He went on to add the Keystone Energy Efficiency Alliance (KEEA) sent a revised letter to the Board that did not use ICF's logo and further clarified that every signatory for that letter had authorized the use of the logo in support of the proposed rulemaking.

Representative Metcalfe responded by saying KEEA sent another email out to EQB members advocating for RGGI yesterday, and ICF is a listed member of that organization. He asked how ICF is an unbiased organization when they are part of an alliance advocating for the regulation.

Allen Landis stated the Department has been transparent on inputs and assumptions in the modeling and has held multiple public webinars. He went on to explain that ICF is a large international consulting company and referred to ICF's statement that they are a member of certain organizations, but those organizations' positions do not always reflect their views.

Representative Metcalfe questioned the intention and commitment from the Department related to the public hearings: would they be held in person or virtually? Allen Landis answered that the Department intends to have a robust public engagement process during the public comment period. Public hearings on regulations have been conducted virtually since the limitations were placed on large gatherings and the hearings have gone extremely well and have been well attended. He added that the virtual hearings have not shown any limitations on peoples' ability to voice their support or concern.

Representative Metcalfe commented on the current limitations on gatherings because of COVID-19, noting that a federal judge recently struck down the Wolf Administration's orders as being unconstitutional and stated that the limitations are no longer appropriate. He stressed that hearings on this regulation should not be held for public comment until there can be in-person public hearings.

Mark Caskey commented that three advisory boards, the Air Quality Technical Advisory Committee (AQTAC), the Citizens Advisory Committee (CAC), and the Small Business Compliance Advisory Committee (SBCAC), all voted not to move RGGI forward and asked why the Board has the final vote.

Jennie Demjanick responded by saying the Environmental Quality Board is the rulemaking body for the Department as the Department does not have its own authority to promulgate regulations. This is the reason why all of the Department's regulations are formally brought before the Board for their adoption. On the other hand, the Department's advisory committees are advisory, meaning they provide advice to the Department. Throughout the rulemaking process, draft versions of the regulations are brought before advisory committees on numerous occasions over the typical 2-year regulatory process. Allen Landis added that the Department hears the concerns of the advisory committees and may make adjustments to the draft regulatory language as needed. The Department will continue to seek technical advice from advisory committees and address member questions and concerns throughout the rulemaking process.

Mark Caskey asked when the legislative branch gets involved. Allen Landis answered that the Department has been engaging with the Legislature and will continue to do so. Since the Governor issued his Executive Order directing the Department to begin development of the rulemaking, the Administration has made an effort to engage with the Legislature on program design and implementation. He cited Secretary McDonnell's participation in multiple committee hearings on RGGI participation and pointed out that legislators and legislative appointees are members of the Department advisory committees Mr. Caskey referenced as participating in the draft rulemaking. DEP's Legislative Office has had individual meetings with interested legislative members for the past year to provide additional opportunities for input. All efforts occurred prior to today. The Department offers the Legislature multiple opportunities for input throughout the public comment period and the rest of the regulatory process.

Mark Caskey commented on the Legislature voting on HB2025 in a bipartisan manner. Allen Landis replied that there is legislative interest in this regulation and there are multiple bills that have been proposed and some have been voted on. The APCA is the authority the Department and the Board have for the proposed rulemaking. Unless something changes, the Department will continue to use its statutory authority to develop this proposed rulemaking and provide engagement in accordance with the Regulatory Review Act.

John St. Clair asked what anticipated decrease in degrees can Pennsylvania expect as a result of RGGI. Allen Landis explained the perspective is Governor Wolf set a greenhouse gas emissions reduction target of 26% by 2025 and 80% by 2050, relative to 2005 levels. Based on scientific analysis, if other states achieve those reductions and other nations achieve similar targets, then we could limit the global temperature increase to 2 degrees Celsius. Beyond that 2 degrees of warming, scientific experts expect dramatic and irreversible impacts to the global environment. He went on to state this proposed rulemaking is only a piece of the puzzle to reach those targets.

John St. Clair questioned if there was an estimate on how much of a decrease in rainfall percentage, or how much money PennDOT will save, or a decrease in Lyme disease. He said all of these things are impacts but asked to what degree is RGGI going to directly impact all of these things. He further questioned if this is part of a global outreach and a master thesis thought of global climate change.

Allen Landis responded that some of those points are addressed in Pennsylvania's Climate Impacts Assessments and Climate Action Plans. Scientists have stated that greenhouse gases cause global climate change. The global climate system is extremely complicated, but it is necessary to reduce greenhouse gas emissions to slow down global warming which can have irreversible and catastrophic effects down the line, which will vary in different areas. While the Department cannot predict the rainfall change in 2050 based on this regulation, that is not a reason to stop making efforts to reduce greenhouse gas emissions. The Department is committing to reduce greenhouse gas emissions across the state, and this is one piece of the puzzle.

John St. Clair stated RGGI has the potential to significantly impact Indiana County. He stressed his fear that RGGI may cause the three coal-fired power plants in that area to close and those impacts cannot be addressed by the way the Department is going about the regulation change. He expressed his concern that hundreds of jobs would be lost and that those losses would impact the general welfare of Indiana County. Mr. St. Clair asked how many jobs are estimated to be lost from the implementation of RGGI, especially with the closure of many coal-fired power plants.

Allen Landis stated that changes are going on in the energy sector that are leading to these shifts. The job analysis posted online details potential impacts to different sectors that could be affected, including the fossil fuel sector. There are potential job losses in that sector that are netted out in a positive direction overall up to 2030. Based on the price of natural gas and the shift in the electricity market and age of Pennsylvania's coal-fired plants, we know that coal jobs are facing losses with or without RGGI. The Department views RGGI as giving Pennsylvania the opportunity to help transition workers and communities through the investment portion of the program. The Department will continue to evaluate and mitigate the shift in trends in the energy sector to ensure certain Pennsylvania communities are not disproportionately disadvantaged and identify ways to mitigate those impacts. The Department is working with the Department of Labor and Industry as well as the Department of Community and Economic Development (DCED) to identify the potentially impacted communities and what the impacts will look like to best help these communities, address any impacts and look to diversify their economies. The modeling projects that recent trends will continue regarding coal generation and the shift in the electricity sector. The Department recognizes the concern and wants to explore all available options.

John St. Clair commented that the proceeds from RGGI cannot be invested into the community where impacts occur. He stated his concern that if the coal-fired power plants shut down permanently, the potential electricity generation sources that might replace them, such as solar, would not employ as many people as the power plants did. Mr. St. Clair expressed the concerns that the way the regulation is written, it can only be invested for reduction of air quality parameters and he did not know how that would translate into helping out a community like Indiana County. He thanked the Department for reaching out to the Legislature and the community at large. Lastly, Mr. St. Clair asked if the model is wrong, is there a sunset clause or a way to modify the regulation if it turns out the predictions are wrong.

Allen Landis said as part of the RGGI program, there is a program review performed periodically to analyze the impacts, and how the program and market are functioning. Adjustments may be made to the RGGI Model Rule to ensure it is reducing emissions and that there are no significant economic effects. The review is built into the process and the states come together and do that collaboratively by a consensus to ensure all states are being treated equally. Additionally, there are mechanisms built into the allowance market, like the emissions containment reserve and the cost containment reserve. He added that RGGI has been in existence since 2009 and has proven to be very effective with few unforeseen circumstances. If issues arise, there are mechanisms in place that can be used to mitigate those issues.

John St. Clair asked if any proceeds from RGGI would be involved in carbon capture or direct air capture or carbon dioxide.

Allen Landis stated the proceeds can be used to reduce air pollution, which is a broad category. It gives a lot of options to invest money into certain communities through the elimination of air pollution, including research and development and carbon capture utilization, energy efficiency, etc. It will continue to be talked about as the investment plan is drafted.

Senator Yaw said he did not think there is any question that climate change is happening, but the climate has been changing for thousands of years. He noted that people emit carbon dioxide and the population has doubled in the past 50 years. He stated that one of his objections to RGGI is that Pennsylvania is an energy producer. Pennsylvania supplies electricity and gas to the surrounding states but has nothing in common with them. Pennsylvania produces the energy and the other states use it, so they do not have the burden of reducing air pollution. He added that RGGI is a superficial fix by addressing one small part of the electricity generation industry, but not addressing the pollution produced by other generation types like nuclear and renewables. Senator Yaw stressed the need to look at the big picture. Since 2005, Pennsylvania cut greenhouse gases by about 25%, without participating in RGGI. He expressed concern over the loss of Pennsylvania jobs from power plants closing and stated that those jobs will go to Ohio and West Virginia. He questioned why Pennsylvania should move forward with the rulemaking if the three advisory committees chose not to concur with its advancement as proposed. He concluded that participating in RGGI and closing a few power plants does not address the environment or pollution problems enough to justify the loss of Pennsylvania jobs.

Senator Santarsiero commented that the science is irrefutable: the earth is warming at an exponential rate, not in a way that it may have fluctuated in temperatures over the last few millennia. The science is clear that the warming is being caused by human activity, not the existence of more humans, but rather as a result of industrialization and the associated effects accumulating over time to impact our climate and our environment. The scientists have equally been clear that not just Pennsylvania, not just the United States, but the entire world community needs to react and take dramatic action now to reverse these trends. He stated we have just the next few years to make changes and if we miss that opportunity, the consequence will be rising oceans, massive population migrations leading to geopolitical instability, and loss of entire food sources and farmland. He pointed out that 70% or more of Pennsylvanians understand that climate change and global warming are happening and that it's caused by human activity and most of them support strict controls on carbon emissions, like the fee used by RGGI. He noted that the younger generation is watching what those who are in positions of authority are doing and not doing, with the expectation that action will be taken to address the problem.

Senator Santarsiero commented that Senator Yaw is correct that Pennsylvania's emissions have decreased in the last 15 years, but he added that the decrease is partly due to the Legislature passing the Alternative Energy Portfolio Standards. He stated that the science is clear that the progress made so far is insufficient to avoid the kind of catastrophic changes he described. He said that the Pennsylvania Constitution is unique among the states because it contains the Environmental Rights Amendment, which provides that all Pennsylvanians are entitled to clean air, pure water and the preservation of our natural resources. He further noted that the Pennsylvania Supreme Court stated in a decision about three years ago that it is an obligation of the General Assembly to actually pass legislation that effectuates that amendment and provides for those things that we need to do to protect our environment, but the General Assembly has not acted. Joining RGGI is an important step and likely the most important thing Pennsylvania can do right now because it doesn't require the General Assembly to act. The General Assembly acted when it passed

Pennsylvania's clean air law. It gave the Administration and the Department the ability to take the step that we are going to begin today.

Senator Santarsiero expressed his sympathy for the communities that have lost jobs due to coal-fired power plant closures and said he wants to help them as the economy transitions. He noted that those plants have been closing for fifteen years now and all projections indicate that they are going to close whether Pennsylvania joins RGGI or not. The Legislature has not addressed those communities' needs. There is an opportunity in joining RGGI to use the auction proceeds to help those communities. He acknowledged that to provide help would require legislative action because the APCA limits what the proceeds can be used for, but that's where the Legislature can actually do something productive. He continued by saying that other communities in Pennsylvania are being impacted, too, but by climate change. Eventually all Pennsylvanians will feel the effects in the form of higher food prices, costs to address extreme weather events, and shrinking job markets because of the impacts to the global economy. Every country, every state within the United States, every community within Pennsylvania has an impact on global climate change. Everyone must do their part. He noted that one action Pennsylvania can take to limit carbon emissions is by joining RGGI. He applauded the Department for putting together the plan and for the work that's been done. He concluded that he would like to move that the Board move forward with this process and specifically adopt the proposed rulemaking for Pennsylvania ultimately to join the Regional Greenhouse Gas Initiative.

Dennis Davin, Secretary of DCED, said DCED reviewed the areas in Pennsylvania where 13 or 14 coalfired power plants have closed over the past decade to see the impacts from the lost jobs and lost revenue for the school districts and communities and to try to repurpose some of those sites. He stated that some of the sites have other development opportunities because they are located along railroads, waterways, or highways, providing good power capabilities that companies want. DCED staff is already working to help market these sites. Secretary Davin said that we need to focus on manufacturing, expanding existing companies and bringing new opportunities to Pennsylvania, specifically prioritizing areas that are going to lose jobs from power plant closures. He said that the harsh reality is they're going to lose these jobs anyway. Noting that he grew up in Pittsburgh during the collapse of the steel industry, Secretary Davin stressed that we all have to do what we can to help these communities and help the people that are going to eventually lose these jobs. He said he appreciated Senator Yaw's comment about the jobs going to Ohio and West Virginia but was unsure that the jobs are going to be available in Ohio and West Virginia. Pennsylvania needs to take advantage of everything that can be done right now and put resources towards job training and retraining. He emphasized that we also need to do what we can to focus on expanding manufacturing in Pennsylvania and there is a great opportunity and potential to do that. However, everybody needs to increase the amount of effort to help these industries instead of letting them decline alone. We need to help them and the people who are working and the communities where they are located to bring new opportunities to these areas. He wanted to make sure that folks knew that this is something DCED takes very seriously and has been and will continue to highly prioritize.

Jim Welty asked how this program has been benefiting the current RGGI states. He asked for confirmation that there has been 45% reduction of CO₂ emissions in RGGI states with a baseline year of 2005.

Allen Landis responded that there has been one report that came out with 45% reduction, and that it may be dated from 2005 for those RGGI states.

Jim Welty asked why 2005 was used when RGGI itself didn't come into effect until 2009. It captures 4 years that there was no RGGI.

Allen Landis responded that the number came from a report that was not done by the Department, but the Department cited the report and may have used that 2005 number. He speculated that since the MOU was signed in 2005 to start the process to join the program, perhaps in their analysis they saw some effects due to the future projected participation. He then noted that there are a number of other statistics that show the numerous benefits to RGGI states. They have created jobs, saved money for consumers and improved public health while reducing emissions. Even looking at 2009, you still see reductions. For Pennsylvania at least, the Department is projecting forward and looking at significant emission reductions of 188 million tons between now and 2030.

Jim Welty stated that his analysis of the data did not appear to support that 45% figure, other than in 2014 when there was an adjustment of the allowance cap from 165 million short tons to 91 million short tons which is a 45% reduction. However, that was in the allowance cap and it's widely known that the initial cap for RGGI set limits that were above the actual emissions. A number of entities banked those allowances early on which allows for the quick reduction. That is the only 45% that can be attributed when you look at the EIA numbers in the RGGI states from 2009 through 2017; it's a 33% reduction of CO₂ emissions. He pointed out that Pennsylvania's data for that timeframe demonstrates a 33% reduction of CO₂ emissions without any mandates. Also, during that time generation in those RGGI states fell 10% whereas Pennsylvania generation grew. The same amount of reduction occurred in RGGI states as in Pennsylvania, with Pennsylvania actually putting more generation online, which is something to be proud of. The Executive Order establishes emissions goals of 26% reduction by 2025, and 80% reduction by 2050 and uses 2005 as a base year. Now in 2017, Pennsylvania's electric generation sector had already decreased CO₂ emissions by 39% compared to that 2005 baseline emissions. DEP's own power sector modeling under the business as usual scenario shows that this reduction rises to 42% by 2025 and 52% by 2030. He said the power generation sector is doing what it needs to do to drive those emissions down without needing the Governor's mandates.

Mr. Welty said he is providing these numbers to have the full picture that the Department's modeling shows 42% reductions by 2025 and 52.4% reductions by 2030 under this scenario, which is further benefited from the NOx and SOx emissions and power generation sector we have seen. There have been 93% reductions in SOx, and 81% reductions in NOx since 2005. It is important for the EQB to understand the numbers a little better, that in fact Pennsylvania is achieving necessary reductions through the free market. He said the ICF modeling for this proposal shows that if Pennsylvania participates in RGGI, the amount of CO₂ reductions would be 43 metric short tons, not the 180 that is counted within the state lines. This means 23 million tons increase in the 16 southern states, it means 93 million short tons increase in the rest of the PJM states, and it also means the boost of 137 million short tons of carbon emissions in the rest of the eastern interchange connection. The result would be increases in carbon emissions in other states if Pennsylvania joins RGGI.

Mr. Welty continued that it is important to understand what the statistics and modeling show, which is that the vast majority of those claimed reductions are actually shifting to other states. He noted that the modeling covers 2019 to 2030 and, therefore, captures current reductions even though Pennsylvania would not be able to participate in RGGI until 2022 at the earliest. This is shown by the modeling which shows business as usual at 78 million short tons and then the policy modeling of 57 million short tons in 2022. He questioned how 21 million short tons of emissions could be wiped off the books before Pennsylvania joins RGGI.

Allen Landis said the Department started the modeling process toward the end of 2019 by inputting all the known variables available up to that time. Since the process started in 2019 and utilized numbers based on information available in 2019, the result is a modeling year of 2020. The modeling starts in 2020 and then goes out to 2030. Because of the differences between the reference case and the policy case between 2020 and 2022, the model will vary based on the projected price. So basically, in the model starting in 2022, the RGGI allowance price is added on. Things start to shift a little bit leading up to that and that is why there are slight differences in the reference case versus the policy case between 2020 and 2022. The model is a tool that the Department used to project, and things don't necessarily happen exactly as projected. There will be some shifts, but the model is a tool to use to gauge that and there are slight adjustments based on how the model operates between 2020 and 2022 because the model sees it at a certain price starting in 2022. To the broader point about the numbers, the Department recognizes there have been decreases in emissions since 2005, about 18% overall for the state reduction on the path to the Governor's goals of 26% by 2025, which is something to be proud of.

Mr. Landis continued that the Department's Climate Action Plan projects that greenhouse gas emissions overall are going to increase in Pennsylvania by about 4 or 5% going forward. Looking economy-wide and Pennsylvania-wide, the decreases in Pennsylvania are not projected to continue and there are some sectors that are emitting more. To reduce from an economy-wide standard, the electricity sector has proven it can reduce emissions. The Department wants to continue to reduce emissions at the least cost possible. That is the approach with this rulemaking, so it is helpful for context to note that emissions are projected to increase. Reducing emissions from the electricity sector through this proposed rulemaking is one piece of combatting that projected increase. The Department is not focusing solely on the electricity generation sector but combatting climate change in several ways and in a number of different sectors, including the transportation sector, refrigerants, and methane rules. Although this is one piece of the puzzle, it is necessary because the statewide emissions are projected to increase over time.

Jim Welty stressed that Pennsylvania is seeing historic emissions reductions in the power generation sector that are occurring because of the free market and the Department's modeling shows that they will continue, at least through 2030. He noted that the health impacts modeling does not take into account the leakage that would result from Pennsylvania to upwind states from Pennsylvania. The modeling shows that there's going to be leakage of generation to other states, such as West Virginia, Ohio, Illinois, Indiana. However, the Department's health impacts modeling doesn't take that into account because there will be increased NOx and SOx emissions in West Virginia and Ohio flowing over into Pennsylvania. He asked if the Department can look into what the true impacts would be from a health perspective.

Allen Landis said it is a good question and important to think about. The Department's health analysis is based on the projected reductions in NOx and SO₂ emissions. The Department used EPA's methodology of quantifying those benefits both economically and from a public health perspective. Those emission reductions come from the model which does things based on borders, so those emissions are within Pennsylvania's borders. There are other considerations based on how emissions from other states transport into and out of Pennsylvania. If Pennsylvania continues to emit and those emissions go downwind, it's two sides of the same coin. It is certainly something the Department considers, but that is the estimate on the health benefits using the data that was provided. It is difficult to analyze how emissions may change at certain plants in different states over time and how that will move through and concentrate in different areas and then quantify it. It is a bit advanced, but the Department's results indicate that the savings are quite significant from a public health standpoint and a health cost standpoint. The Department's air quality program does a lot of monitoring and has experts to analyze the data and

those are the results. The Department will continue to look at this and, if possible, will attempt to provide more context and more analysis to address those concerns.

Jim Welty stressed that Pennsylvania has already seen significant reductions in carbon emissions that demonstrate exponentially more significant health benefits to people in Pennsylvania. When you look at the actual SOx and NOx reductions and use the Department's methodology that translates into 31 billion to 71 billion dollars in annual public health benefits resulting from the free market. He stated that there are health benefits for what has happened since 2005 that can be demonstrated through the Department's own methodology. He concluded by asking what percentage and the dollar amount of the projected \$2.4 billion in projected auction proceeds would go to RGGI, Inc. for administration of the program.

Allen Landis responded that the Department modeled a couple of investment scenarios, but those scenarios are certainly not commitments by the Department. As Mr. Ramamurthy alluded to and others have said, the Department intends to have an investment plan, development process and public comment period that will actually impact the decisions that haven't been made yet. In the Department's modeling scenario, RGGI, Inc. receives 1% of the proceeds, which was based on historical averages since RGGI began. Other RGGI states have typically contributed 1% of the program proceeds to RGGI, Inc. as RGGI, Inc. is the nonprofit that provides programmatic services to all the states and manages the interstate coordination and the consultants that conduct and monitor the auction. There is a small cost in doing that. The Department has not made a decision. If the 1% figure does not work for Pennsylvania, that is something to discuss.

Jim Welty asked if the Department calculated what the cost is for the Department to manage the program moving forward.

Allen Landis responded that other states have averaged 5% to manage the program. The Department modeled allocating 5% of the auction proceeds to cover the Department's programmatic costs.

Jim Welty summarized the costs as approximately 1% to RGGI and approximately 5% for managing the program.

Mark Caskey stated that he grew up in Pittsburgh in the 60s and 70s and noted that while the air quality has improved quite a bit, that was partly a result of the steel industry closures. He expressed his concern that if Pennsylvania joins RGGI, it would be giving up its economic advantage by reducing energy produced by fossil fuels, noting that Pennsylvania is the second largest producer in the United States behind Texas. He questioned how solar and wind would be able to take the place of fossil fuels when those renewables are about 3% of Pennsylvania's current energy production.

Allen Landis responded that for this proposed rulemaking, the allowance price may drive the transition to cleaner energy. It doesn't necessarily mean an increased deployment of renewables. It could mean nuclear facilities continue to operate, further transition from coal to natural gas, or aging facilities to transition to more efficient combined cycle facilities. There is also battery storage technology and carbon capture. RGGI does not pick between different technologies, it puts a price signal on the market to let the market adapt. In looking at Pennsylvania, there have been a number of analyses that show that the grid could handle more renewables. The Department's Pennsylvania Solar Future project, which is a published report online, projected 10% solar generation, which is a very possible increase for Pennsylvania. For this proposed rulemaking, the Department is focused on regulating CO₂ emissions from stationary air contamination sources, not decreasing or increasing sources of generation. However,

there is plenty of evidence out there that suggests that the grid could handle more renewables here and going forward.

Russell Redding, Secretary of the Department of Agriculture, appreciated the opportunity to discuss the proposal as part of Pennsylvania's solution to climate change, understanding there is a social cost to carbon dioxide for public health, food, the environment and jobs. From an agricultural perspective, agriculture lives and dies by climate. Climate change poses significant risk to Pennsylvania agriculture and the food system – magnifying the risk of disease in Pennsylvania is one example. This is a great concern of course, since 60% of all human diseases and 75% of all emerging infectious diseases are zoonotic, meaning agriculture is going to be on the front line of new diseases and outbreaks. There is great promise for the industry to help address climate change and improve air quality in Pennsylvania through biodigesters, renewable energy deployment, and carbon storage. For these reasons, he expressed his support for the approval of the proposed rulemaking for a carbon dioxide budget trading program.

Laura Griffin explained that some members of the public were asking questions in the Webex Q&A box and might not be aware that during EQB meetings, the discussion is only held between the members and Department staff. She went on to say, assuming the proposed rulemaking is adopted and moves forward with publication and the public comment period, any comments and questions may be provided during the formal public comment period.

Secretary McDonnell, to maintain order, called on Representative Metcalfe who indicated having a motion whenever it was the appropriate time to do so.

Representative Metcalfe asked if a motion for the Board to consider the proposed regulation was required before motions could be made regarding the regulation and consideration of it. Bo Reiley responded that would be appropriate.

Senator Santarsiero made a motion to adopt the proposed rulemaking. Representative Vitali seconded the motion. (The Board's vote on the motion is recorded on page 14.)

Secretary McDonnell asked if there was any discussion on the motion.

Representative Metcalfe commented that audio-only virtual proceedings only provide for a minimal level of engagement and made a motion to table the regulation until the proposal can be considered with full engagement of the Board in an in-person, public setting. Mark Caskey seconded the motion. **The motion failed with a vote of 14-5.** (Voting in favor of the motion: Representative Metcalfe, Senator Yaw, Mark Caskey, John St. Clair and Jim Welty.)

Senator Yaw commented that 60 days is inadequate for the complexity of the regulation and made a motion for the Board to provide a minimum of 180 days for public comment with five public hearings to be held in person. Representative Metcalfe seconded the motion. **The motion failed with a vote of 13-6.** (Voting in favor of the motion: Senator Yaw, Representative Metcalfe, Mark Caskey, Duane Mowery, John St. Clair and Jim Welty.)

Senator Yaw stated more time is needed for the Department to have meaningful public hearings and made a motion to provide a minimum of 120 days for public comment with five public hearings to be held in person. Representative Metcalfe seconded the motion and stressed the need for public input in live settings in those communities that would be the most impacted. John St. Clair agreed and expressed his

interest to hold a public hearing in Indiana County. **The motion failed with a vote of 13-6.** (Voting in favor of the motion: Senator Yaw, Representative Metcalfe, Mark Caskey, Duane Mowery, John St. Clair and Jim Welty.)

Representative Metcalfe made a motion to table the proposed regulation until the Department presents the Board with formal letters of concurrence from AQTAC, CAC, and SBCAC. Mark Caskey seconded the motion. **The motion failed with a vote of 13-6.** (Voting in favor of the motion: Representative Metcalfe, Senator Yaw, Mark Caskey, Duane Mowery, John St. Clair and Jim Welty.)

Representative Metcalfe made a motion to table the consideration of the regulation until the Department presents to the Board, for its approval, a detailed proposed schedule of five in-person public hearings including date, time and location in impacted areas of the Commonwealth. John St. Clair seconded the motion and reiterated his interest for one of the hearings to be held in Indiana County. **The motion failed with a vote of 13-6.** (Voting in favor of the motion: Representative Metcalfe, Senator Yaw, Mark Caskey, Duane Mowery, John St. Clair and Jim Welty.)

Senator Yaw mentioned inconsistencies between the executive summary and the preamble. Bo Reiley replied the Board is only responsible for voting on the Annex, but edits can be made to the other documents without taking a vote on it.

Senator Yaw made a motion for the meeting minutes of AQTAC, CAC, and SBCAC, to become part of the record of this Board meeting when they are prepared and become available. Representative Metcalfe seconded the motion. (The Board's vote on the motion is recorded on the page 14.) Bo Reiley stated the motion should be made after voting and finalizing the original motion since it would not implicate the approval.

Representative Metcalfe stressed the regulation should not move forward. He commented that virtual meetings do not have the same level of debate and engagement and are not as impactful or meaningful as in-person communication and noted that it excludes those who wish to participate in meetings from parts of the state with unreliable internet coverage. He said that the potential impacts to Pennsylvanians' jobs necessitated in-person public hearings for those communities to share their comments. He commented that joining RGGI would hinder Pennsylvania's economic recovery from the COVID-19 pandemic and opined that Pennsylvania is losing business investments to neighboring states because of the decision to pursue joining RGGI. He reiterated his concern that ICF has a conflict of interest because it performed the modeling but is also a member of the Keystone Energy Efficiency Alliance, an entity advocating that Pennsylvania should join RGGI.

Representative Metcalfe said that, to his knowledge, the Wolf Administration had not met with the owners of the power plants that may close if the regulation becomes law or the local unions whose members work at those plants. He requested the minutes of today's meeting reference the letters written by the AFL-CIO, the PA State Building Trades and the Pittsburgh Regional Building Trades, as well as the testimony the House ERE Committee received from a constitutional lawyer who stated EQB lacks the statutory basis to impose a tax on electric generation. He said the APCA and the Uniform Interstate Air Pollution Agreements Act do not give the Administration statutory authority to implement this regulation. The ACPA provides that DEP may formulate such an agreement but must submit it to the General Assembly for its consideration. He went on to say DEP lacks the authority to impose a tax and that the RGGI program's goal is to produce revenue for reinvestment which meets the definition of a tax, not a fee. He noted that both the House and Senate passed HB2025, which would require the Administration to

get legislative approval to join RGGI. He urged fellow EQB members to vote no and for Secretary McDonnell to withdraw this before the vote.

Senator Santarsiero commented that if the process moves forward, there will be plenty of opportunities for public comments. He added that HB2025 was an attempt to take away the Governor's existing authority to join RGGI.

Senator Santarsiero made a motion to adopt the proposed rulemaking. Representative Vitali seconded the motion. **The motion passed by a majority of the Board members with a vote of 13-6.** (Voting in opposition were: Senator Yaw, Representative Metcalfe, Mark Caskey, Duane Mowery, John St. Clair and Jim Welty.)

Senator Yaw made a motion for the meeting minutes of AQTAC, CAC, and SBCAC to become part of the record of this EQB meeting when they are prepared and available. Representative Metcalfe seconded the motion. **The motion failed with a vote of 12-7.** (Voting in favor of the motion: Senator Yaw, Representative Metcalfe, Gladys Brown Dutrieuille, Mark Caskey, Duane Mowery, John St. Clair and Jim Welty.)

Citing from the Air Pollution and Control Act that hearings shall be held in the area of concern, John St. Clair made a motion for a public hearing to be held physically in a location within Indiana County. Jim Welty seconded the motion. **The motion failed with a vote of 13-6.** (Voting in favor of the motion: Senator Yaw, Representative Metcalfe, Mark Caskey, Duane Mowery, John St. Clair and Jim Welty.)

OTHER BUSINESS:

Laura Griffin provided a regulatory update.

- On May 19, 2020, this Board adopted the Control of VOC Emissions from Gasoline Dispensing Facilities (Stages I & II) proposed rulemaking. The proposed rulemaking will be published in the *Pennsylvania Bulletin* on September 26, 2020, opening a 65-day public comment period. Three virtual public hearings are scheduled for October 27, 28, and 29, 2020. More information regarding registration for the hearings will be available on the EQB webpage. The public comment period for the rulemaking will close November 30, 2020.
- On July 21, 2020, this Board adopted the Air Quality Fee Schedule Amendments final rulemaking. The rulemaking is scheduled for consideration at the Independent Regulatory Review Commission's (IRRC) public meeting on Thursday, September 17, 2020.

Mark Caskey emphatically voiced his disappointment on the failed vote to hold a hearing in Indiana County. Policy Director Shirley responded by committing to specifically target Indiana County for a hearing if there was a safe way to incorporate an in-person hearing, during the public health pandemic.

Senator Santarsiero commented that the issue with in-person hearings is whether they could be held in a manner consistent with protecting public health during the pandemic. He acknowledged the importance of addressing the impacted communities and explained we should stand ready to talk about how we can

take the proceeds from the auctions to help the communities that have been struggling already and will continue to struggle, regardless of RGGI.

John St. Clair thanked Ms. Shirley and offered his assistance with outreach.

NEXT MEETING:

The next meeting of the EQB is tentatively scheduled for Tuesday, November 17, 2020. The October meeting is cancelled.

ADJOURN:

With no further business before the Board, Senator Santarsiero moved to adjourn the meeting. Dennis Davin seconded the motion, which was unanimously approved by the Board. The September 15, 2020, meeting of the Board was adjourned at 12:58 p.m.