## In The Matter Of:

Delaware Department of Natural Resources
Division of Air Quality

VW and Audi Mitigation Plan March 23, 2017

Wilcox & Fetzer, Ltd.
1330 King Street
Wilmington, DE 19801

email: depos@wilfet.com, web: www.wilfet.com

phone: 302-655-0477, fax: 302-655-0497



Original File DNREC VW and Audi Plan 03-23-17 AirQuality Hearing.txt

Min-U-Script® with Word Index

## 

RE: Public Meeting to Request Public Comment Regarding The Volkswagen and Audi Environmental Mitigation Plan

.. .. .. .. .. ..

DNREC State Street Commons 100 Water Street Dover, Delaware 19901

Thursday, March 23, 2017 6:00 p.m.

.. .. .. .. .. ..

BEFORE: Valerie Gray and Deanna Morozowich

-- Transcript of Proceedings --

WILCOX & FETZER
1330 King Street
Wilmington, DE 19801
(302) 655-0477
www.wilfet.com



MS. MOROZOWICH: Good evening. I
would like to thank everyone for coming tonight to
discuss Volkswagen Environmental Mitigation Plan.
Here is our agenda for the evening. I'm Deanna
Morozowich representing the Department.
Here with me this evening we have a
court reporter recording all of the discussion this
evening, so if any comments are made, please state
your name for the record so that we can get it well
documented.
For our agenda, we are going to be
discussing the settlement, the EPA or the
Volkswagen settlement.
Some requirements of the settlement:
Some mobile NOx emission sources, some qualified
mitigation actions under the plan, Delaware's
timeline, next steps, and then we will open the
floor up for comments and questions.
But if you have any comments or
questions throughout the discussion, please feel
free to ask.
So Volkswagen violated the Clean Air
Act for 580,000 vehicles between model year 2009 to

1 differently during normal operation and use than during emission testing. 2 The vehicles emit levels of nitrogen 3 4 oxides, typically known as NOx, significantly in excess of EPA's compliance levels. 5 So Volkswagen has agreed to suspend 6 7 \$14.7 billion to settle the allegations of the cheating devices that they installed on these 8 The settlement funds will be used to buy 9 vehicles. back and/or modify vehicles, and they will support 10 11 national and state-level projects to reduce NOx 12 emissions. 13 So, for the national settlement, 14 there is \$10 million set aside for vehicle buyback 15 and modification, \$2 billion set aside for zero-emission vehicles, and \$2.7 billion set aside 16 17 for the environmental mitigation trust. 18 And of that money, we are worried about the blue piece of the pie here, the 19 \$2.7 billion. And Delaware is entitled to apply for 20 21 \$9 million of that environmental mitigation trust. So the requirements of the plan: 22 23 has to include an overall goal use of the funds, 24 categories of eligible mitigation actions,



consideration to disproportionately impacted populations where NOx is the primary emission of concern, and a description of the emission benefits that would result from the implementation of the plan.

So we looked at the EPA NEI, the National Emission Inventory for the State of Delaware, and we grouped it into categories for the NOx emissions.

And if you had access to our plan on the website, the categories of the plan correspond to the categories on the pie chart. So we are looking at on-road diesel, heavy-duty vehicles, non-road equipment, locomotives, commercial marine vessels, and on-road light-duty vehicles. And then the 9.7 shown here within the graph, they are not eligible to apply.

So these are the qualified mitigation actions under the plan. And this chart basically tells you which vehicles can be replaced or repowered, the model year of the vehicle or the engine that you are looking at, the funding that has been set aside for those actions, whether it's for government or non-government, and if scrappage is

1 required under the plan. So Delaware's timeline: In the fall 2 3 of 2016, the court approved the partial settlement, 4 and they were supposed to approve a trustee. 5 the court has not approved the trustee yet. Right now they are considering Wilmington Trust, but all 6 7 that has not been finalized. But we are looking to file a 8 9 beneficiary certification sometime this spring once 10 the beneficiary is -- the trustee is named. 11 then we are hoping to become certified as a 12 beneficiary also this spring. 13 And we are accepting public comment 14 on the proposed draft. And then we are looking to 15 submit our environmental mitigation plan, hopefully 16 by this summer, and look for projects by the fall of 17 this year. 18 So the next steps include applying to be a beneficiary, seeking public comment from people 19 here in this room on the plan, and then we are going 20 21 to be looking for projects. 22 So that concludes the presentation. 23 This is the way you can comment to us. You can use

our resource mailbox, join our Listserv, e-mail me,

1	call me. Yes?
2	MR. BARCHAK: I have got a really
3	small technical question. But on the eligible
4	vehicles for mitigation, the slide refers to school
5	buses
6	MS. MOROZOWICH: Yes.
7	MR. BARCHAK: 2006 and older. And
8	that doesn't seem to agree with the appendix
9	document, which is 2009 and older school buses.
10	THE REPORTER: Can you get his name?
11	MR. BARCHAK: It is a small point,
12	but I was just
13	MS. MOROZOWICH: You are correct. It
14	goes back to 1992 to 2009. And may I get your name
15	for the record?
16	MR. BARCHAK: Tim Barchak.
17	MS. MOROZOWICH: Oh, wait. That was
18	drainage trust. I'm sorry. I will concur that the
19	year is wrong, but I will have to get the correct
20	year for you.
21	MR. BARCHAK: Okay. Thanks.
22	MS. MOROZOWICH: Yes?
23	MS. VALENTINO: My name is Ellen
24	Valentino. I represent Mid-Atlantic Propane Gas



1 Association. 2 I just want a better understanding. 3 This is sort of barebones. I thought there would be 4 a little more deliberation on when you say "apply for projects," you know, we want to make sure that 5 6 at least propane is considered, whether it be on 7 school bus fleets or some of these other fleets, because it's just as clean and does qualify under 8 9 your programs. 10 So what do you mean projects? 11 is it just like, hey, bring us a project, and we 12 will think about it, or -- where is sort of the meat 13 of you are going to get the money, you are going to 14 be -- there is going to be a trustee, you are going 15 to be the people that sort of have the money. then what? 16 17 MS. MOROZOWICH: We are looking for 18 help in crafting the plan. We want to know what you want projects -- the money, the funds to be spent 19 Where do you believe that the funds should be 20 on. 21 spent, how do you believe they should be spent. are looking for ideas for the plan. 22 23 MS. VALENTINO: And then you will

have another public comment on the funds, or the

1 project, or you will just put a self determined --2 how does it work from there? That's just sort of 3 not there yet or --4 MS. MOROZOWICH: It has not been 5 determined yet. 6 MS. VALENTINO: Okay. 7 I don't think I will MS. MOROZOWICH: 8 be making the plans. I wish I could. (Laughter) We are looking for input on how you believe the 9 No. funds should be spent, what project categories --10 11 MS. VALENTINO: So I'll just say for 12 the record, and I'll even note that once you all 13 officially go out there, I guess this might be 14 official, and bring us projects, then you will 15 somehow have some kind of transparent public look at 16 what those projects are and give a rationale for how 17 you picked projects and how the money is spent? 18 just trying to figure the oversight little bit. 19 MS. GRAY: Sure. That's a great 20 question. 21 MS. VALENTINO: Yeah. I'm Valerie Gray with 22 MS. GRAY: 23 DNREC. I'm Deanna's supervisor. And we actually 24 will be letting a public request for proposal.



And that's the competitive process 2 that's stipulated in the settlement agreement that 3 all states go through a public process on how they 4 garner these projects. What we are doing tonight is trying 5 6 to get a sense from our community and our public as 7 to how best to apportion the \$9 million over ten 8 years, what makes sense for Delaware. And that's what we are seeking comment on tonight. This is a proposed draft plan. 10 The trustee has been named by the court. 12 Wilmington Trust. And we are waiting on the court 13 to approve the trust agreement. 14 Once that trust agreement is done, 15 then a clock is started, and that's when states will 16 actively be submitting their beneficiary certifications. 17 18 Once those beneficiary certifications are approved by the trustee, then we will be 19 20 submitting these proposed plans to the trustee for 21 approval. 22 So we can amend those plans at anytime with the trustee. 23 But once we have done 24 that, if say like we say we are going to spend

1

9

1	100 percent of our funding on your propane on the
2	school bus fleets, then we would amend the plan to
3	suggest that that's how we are going to actually
4	submit our request to the trustee for utilizing
5	those funds.
6	MS. VALENTINO: That would be a great
7	idea! But I'm teasing. Just going back
8	(Laughter)
9	MS. GRAY: (Inaudible) (Laughter)
10	MS. VALENTINO: I know. I know. I
11	know. I just want to go back because I'm just
12	very I want to make sure that I do this.
13	So I leave here tonight. I represent
14	local propane companies here. I leave here tonight
15	and I say, okay, this is how this works: Dear
16	DNREC, I know you have this money coming. I think
17	five percent ought to be spent in giving tax credits
18	or rebates, however you are going to do it, for
19	propane fleet vehicle truck stations. I hope you
20	consider this. Get back to me. Ellen.
21	Is that sort of how this works? I'm
22	just
23	MS. GRAY: It will be sent through a
24	public process. We will do a response to comment,



1	which we do whenever we receive public comment.
2	What we have to do is we have to be
3	within the construct and the boundaries
4	MS. VALENTINO: Sure. Yeah.
5	MS. GRAY: of what the settlement
6	agreement tells us we have to do. So you can't ask
7	for a pie in the sky
8	MS. VALENTINO: No.
9	MS. GRAY: and the world, but it
LO	would be nice
L1	MS. VALENTINO: Okay.
L2	MS. GRAY: because that's not
L3	publicly how a court will review it.
L 4	And the trustee agreement is supposed
L5	to stipulate a lot of all the bells and whistles
L6	that we have to follow in terms of the states, and
L7	that has not been agreed upon yet, so we have to
L8	wait for that, kind of the rest of the story.
L9	But what they have asked to us do as
20	states is to present our hypothetical proposed
21	plans, how might they suggested that we focus on
22	NOx emission reductions, which is what the VW fleet
23	violated, was NOx emissions.
24	So what I would be looking from you



1	would be you telling me why I should put my money in
2	this bin versus this other bin, why the benefits for
3	this particular category outweigh any other bin.
4	And that will help us formulate how
5	we might spend the \$9 million over the ten years.
6	And that's kind of what we are looking for tonight.
7	MS. VALENTINO: And that process is
8	now?
9	MS. GRAY: That's now?
10	MS. VALENTINO: Then we should
11	correspond with you in an official form now?
12	MS. GRAY: And if you will go back to
13	the last slide, I think it tells you (Vacuum
14	cleaner starts running outside the open door to the
15	conference room. Ms. Gray continues to speak) it
16	tells you how to submit it through there so that
17	it's in the official document, and
18	THE REPORTER: Can we shut that door?
19	MS. GRAY: That will be very, very
20	helpful to us, if that makes sense.
21	MS. VALENTINO: Yes.
22	(Someone shuts the door.)
23	MS. GRAY: Because we can spend it
24	any number of ways, submit categories, how do I cut



1	this pie.
2	(Someone is raising hand)
3	MS. MOROZOWICH: Yes, ma'am?
4	MS. DRYDEN: I have a question.
5	MS. MOROZOWICH: Your name, please?
6	MS. DRYDEN: Yeah, I was just
7	MS. MOROZOWICH: Your name, please?
8	MS. DRYDEN: Oh, Penny Dryden
9	representing the Delaware Concerned Residents for
10	Environmental Justice.
11	And my question would be, I hear you
12	saying that tonight you can put forth some general
13	comments. But if you go through to one of these
14	sites, that's the official way of doing it? That's
15	where the documents?
16	MS. GRAY: No, this is one way
17	MS. DRYDEN: Okay.
18	MS. GRAY: for many of you. So
19	that's why we asked for a court reporter to be
20	here
21	MS. DRYDEN: Okay.
22	MS. GRAY: so that we could take
23	in all that information, and she can record it for
24	the record for us tonight, if you chose not to



1 present written comments, but orally would be more 2 comfortable for you. 3 MS. DRYDEN: And then the other part 4 of that is who would be eligible? I represent 5 non-profit. So are we, you know, can we assure that 6 a portion of these funds can be solicited by 7 non-profit organizations from environmental justice communities? 8 9 MS. MOROZOWICH: These are eliqible 10 You have got your school buses, shuttle sources. 11 buses, transit buses, and the like, your heavier --12 the medium-duty class four to seven trucks, the local freight trucks, class eight, freight and 13 14 switchers, tugs and ferries --15 MS. DRYDEN: Uh-huh. 16 MS. MOROZOWICH: Ocean-going vessels, 17 airport ground and other service equipment, 18 forklifts, and light-duty bin. We also have a DERA category. 19 So if you're -- we can use this -- the funds can also be 20 21 used for -- to match the DERA grant, if you are familiar with projects being submitted through the 22 23 DERA process. 24 MS. DRYDEN: But I think my question



1	is eligibility.
2	MS. GRAY: You would be eligible,
3	because you would be a non-government entity.
4	MS. DRYDEN: Okay.
5	MS. GRAY: And what changes within
6	the settlement agreement and if you look at
7	Appendix D by going to the website, you can see the
8	appendix. It's a real long appendix. They actually
9	have the whole settlement agreement in it.
10	In Appendix D it stipulates how I
11	have to cost share projects with a non-government
12	entity, which are what the percentages are there,
13	what I can and can't spend money on.
14	And it's right after the Diesel
15	Emission Reduction Act
16	MS. DRYDEN: Uh-huh.
17	MS. GRAY: with comments that we
18	gave when they set this up within the settlement.
19	So let's say your community owned a
20	diesel shuttle bus.
21	MS. DRYDEN: Uh-huh.
22	MS. GRAY: That would be eligible
23	because it's diesel. It has to be fueled by diesel.
24	And your organization would be eligible.



1	And when we ask for send us a
2	proposal, that would be the time that you would go
3	we have a project, we are looking at this, and it
4	fits these timeframes, we're looking at purchasing a
5	newer model year that fits the qualifications of the
6	agreement.
7	And that's what we are looking for
8	help with. And it's typically a 25 percent to
9	75 percent cost share. We would provide 25 percent
10	of the funds out of the VW settlement to your
11	organization. We would enter into a contract, and
12	all that legal rigaramore would go on.
13	And you would purchase your new
14	shuttle bus, brand new model year with all the bells
15	and whistles, all the newest controls for shuttle
16	buses, and your community would have a new bus.
17	MS. HERRON: Or you could get an
18	electric bus.
19	MS. GRAY: You could get an electric
20	bus. That is true.
21	UNIDENTIFIED SPEAKER: Or you could
22	buy a fuel cell.
23	MS. GRAY: Either that, or you can
24	huz a fuel cell. So there are a lot of options that



1	you can
2	MR. DETRICK: Or a miniature gas bus
3	if you are all
4	(Laughter)
5	MS. GRAY: We have to share the
6	wealth. But those are all the options that your
7	community would be eligible for. And we will be
8	letting a competitive RFP request for proposal
9	sometime late this fall. We have to wait on reports
10	so we know how they are. Yes, sir?
11	MR. PRASAD: So my name is Ajay
12	Prasad representing University of Delaware.
13	So I actually read online your
14	appendix. So it has ten different categories of
15	vehicles. And it looks like you have already laid
16	out all the cost share percentages for
17	non-government versus government organizations.
18	So with there is so much detail in
19	here, it seems like you have a lot of specificity.
20	So I'm wondering, you know, what are you what do
21	you need from us today in addition to what you have
22	already laid out in over here?
23	MS. GRAY: A lot of what's laid out
2.4	that Deanna has put into the mitigation work plan



1	and I'm probably speaking for her. And I apologize.
2	I do that. So excuse me.
3	But the plan has to follow certain
4	requirements of the settlement agreement. We don't
5	have a lot of flexibility on what categories we
6	select
7	MR. PRASAD: Uh-huh.
8	MS. GRAY: or what the cost shares
9	are.
10	MR. PRASAD: Uh-huh.
11	MS. GRAY: But we are seeking comment
12	on that. And we will, if, for instance, we want to
13	do more or less, we would have to put that into the
14	plan to get approvals.
15	But the categories, it's the
16	apportionment of how do I slice this pie? Do I put
17	50 percent into school buses? Do I put another
18	50 percent into ferries and tugs? How should I
19	apportion that?
20	And what she has tried to spell out
21	in the work plan is this is what our missions
22	profile looks like today.
23	MR. PRASAD: Uh-huh.
2.4	MS GRAY: And because the settlement



1 is saying you need to focus on NOx emissions, the best bang for the buck would be those that have the 2 3 highest NOx emissions based upon our emissions 4 profile. Or another way to think 5 MR. PRASAD: about it would be to ask, for every dollar that is 6 spent out of this fund, what is the maximum return 7 8 you are getting in terms of NOx reduction? 9 MS. GRAY: That would be another way 10 to look at it, as well. 11 MR. PRASAD: And if I could continue 12 with that theme, where are those NOx reductions happening? 13 14 I mean, if you do it out in the open 15 water as opposed to a densely-populated urban 16 environment, the same NOx reduction out in open 17 water may be less harmful to people than if you do it in an urban environment. 18 19 MS. GRAY: That would be another consideration. 20 21 MR. PRASAD: Yeah. 22 And the settlement MS. GRAY: 23 agreement also asks us, as states, to take that into 24 consideration.



1	We are soliciting our environmental
2	justice communities where they are
3	disproportionately affected
4	MR. PRASAD: Yes.
5	MS. GRAY: by our pollution at
6	large. So we would be seeking to work with groups
7	that are
8	MR. PRASAD: Yes.
9	MS. GRAY: actually in
10	disproportionately-affected communities.
11	MS. MOROZOWICH: You had a comment?
12	MR. DRYDEN: Ken Dryden with the
13	NAACP and with the Delaware Concerned Residents for
14	Environmental Justice.
15	In the requirements there at page two
16	you see, what is DNREC defining as the
17	disproportionate-impacted population? What
18	population are you referring to? The EJ?
19	MS. GRAY: EJ, yes.
20	MR. DRYDEN: Okay. The EJ on that.
21	So now let me ask here is my second part: So
22	would that with that said, can these dollars,
23	outside of what you have put forth, the programs you
24	have there go to some sort of indoor um



1 MS. MOROZOWICH: No. I don't believe 2 I believe that they have to be used the way 3 that the mitigation plan intended. 4 MS. GRAY: The settlement agreement 5 stipulates the categories. And they are looking for 6 vehicles, mobile source emissions. Because that's 7 what Volkswagen was. They were a car manufacturer, and they violated our tailpipe emissions standards. 8 So we are looking to try to focus it on tailpipe 9 10 So indoor air quality wouldn't emissions. 11 necessarily be one that would qualify for this. 12 MR. DRYDEN: But if you say you're 13 going into the EJ communities, and those communities may have been impacted their health-wise from the 14 15 emissions, can that be crafted in a way or can 16 DNREC -- I know you say that there is the courts 17 have laid out what the money can be spent on. 18 But is the plan that you are saying here, is it what -- how DNREC wants to spends the 19 20 money in the state, or are we saying that in those 21 EJ communities the emissions have also affected folks' health? 2.2 23 So I'm getting back to my question 24 that says how do we fit that into the EJ communities



1	who were impacted by the emissions that way?
2	MS. DRYDEN: If I could just add
3	THE REPORTER: Can you say your name
4	every time you speak?
5	MS. DRYDEN: Yes. Penny Dryden. I
6	think what we are trying to get at is, if this is
7	all about vehicles that are traveling heavily
8	through communities, EJ communities
9	MS. GRAY: Uh-huh.
LO	MS. DRYDEN: and they are setting
L1	off these emissions, then it has to impact the
L2	indoor quality of air, of these homes. So do you
L3	see what I'm saying?
L4	MS. GRAY: Uh-huh.
L5	MS. DRYDEN: Air goes where it goes.
L6	So we want to be able to, I guess, test that to see
L7	if there is some real impact with this what's it?
L8	NO? NOx.
L9	MS. MOROZOWICH: NOx.
20	MS. DRYDEN: If we can determine if
21	that is a problem in these people's homes along
22	these communities where these heavily-traveled
23	vehicles go.
2.4	MS GRAY: It's an interesting



1	concept, and I think that's something that's
2	probably outside this particular set of funding that
3	we have available.
4	But I think it's a very interesting
5	program that we might want to partner with other
6	help on.
7	MS. DRYDEN: Okay.
8	MS. GRAY: And perhaps pursue it a
9	little bit further and try to get some data.
10	MR. DRYDEN: Or maybe something that
11	you want to partner with with one of the where we
12	are talking about someone in the EJ community.
13	MS. GRAY: Absolutely.
14	MR. DRYDEN: And bring that forward.
15	MS. DRYDEN: Are you ruling that out,
16	or is this money that we can
17	MS. GRAY: It's not something that
18	qualifies for this bin of money.
19	MS. DRYDEN: Okay.
20	MS. GRAY: For this bucket of money,
21	I cannot use it for something indoor air quality
22	study. Though I am very interested in probably
23	looking at something like that for the future, and I
24	think it would have some really interesting benefits



1	to evolve.
2	MS. MOROZOWICH: Yes. Your name?
3	MR. MELVIN: Caleb Melvin. So, you
4	know, with Delaware being such a small state, a lot
5	of these businesses don't do business just in
6	Delaware.
7	Is there any like weighted system
8	that gives priority to businesses that only do
9	business in Delaware?
10	Because I'm thinking that if this
11	\$9 million is allocated to businesses that are in
12	Delaware but do most of their business in Maryland,
13	we are kind of throwing that money into the other
14	state rather than using it specifically here.
15	Is there any weighted system to
16	ensure that it's more focused here?
17	MS. MOROZOWICH: That is not part of
18	it. And it's very intriguing. I'm very interested
19	in that. And we are glad to take your comments on
20	that, and we will look into it. Because they are
21	very valid points that we should definitely
22	consider.
23	MR. MELVIN: Right. And I think that
24	if it can't be like focused beyond that, a comment



from me would be to more centralize that on
something we could handle, like governmental type of
changes that can be established to offset NOxes, you
know, just as a comment.
MS. MOROZOWICH: Thank you.
MS. HERRON: So like you are focusing
on
MS. MOROZOWICH: Your name, please?
MS. HERRON: I'll give it at the end.
MS. GRAY: Stephanie Herron.
MS. HERRON: Can I say it at the end?
MS. GRAY: Yes.
MS. HERRON: Okay on vehicles that
are doing the majority of their traveling in
Delaware. So, by nature, these are moving vehicles
that we have to focus on. We would maybe want to
somehow incent specifically vehicles that we know
will do a majority of their traveling in Delaware
or, if possible, we can get even more specific and
focus on vehicles that are traveling through,
especially impacted communities, like say buses that
we know are going through certain neighborhoods.
Right? Is that what we
MR. MELVIN: Right. And basically,



1	to expand on that Caleb Melvin is my name.
2	MS. HERRON: Stephanie Herron.
3	MR. MELVIN: So what if there was a
4	company that was in Maryland, you know, and they do
5	business in Maryland but also do a lot of business
6	in Delaware, would they be eligible for this, or
7	would it just be like a Delaware business?
8	MS. GRAY: We would only be able to
9	give for vehicles registered and owned in Delaware.
10	Where they operate, I'm not quite
11	sure I can be that restrictive in telling you you
12	can only operate your vehicle in Delaware. That
13	might be a little overstretch.
14	But it's a very intriguing idea. And
15	I think what you are trying to get at is the
16	priority should be for Delaware-owned and operated
17	vehicles that primarily are here.
18	MR. MELVIN: Yes.
19	MR. PRASAD: Because Maryland
20	presumably is getting its own share of the pie.
21	MS. GRAY: They are getting a very
22	large share.
23	MR. PRASAD: Exactly.
24	MS. GRAY: And it's based on



1	vehicles, the number of vehicles that we have
2	registered Delaware for this time period.
3	So it's based on those violating
4	vehicles. And I believe it's 2009 to 2014. It's
5	that population of vehicles. And that's how this
6	court apportions the \$2.9 billion amongst the
7	states. So our share is \$9 million, because we
8	don't have that many registered Volkswagen vehicles.
9	MS. MOROZOWICH: You had your hand up
10	first. Your name?
11	MR. BARCHAK: Tim Barchak. And when
12	I commented previously, I didn't say I'm with the
13	National Education Association, as well as being a
14	Delaware resident.
15	So, I mean, in terms of sharing
16	vehicles that are going to be operating totally
17	within the boundary of your state, that means school
18	district fleet buses are going to fit that bill for
19	sure.
20	And school districts are generally
21	starved of money, but their transportation funds are
22	always stretched.
23	And then my last question, and then I
24	will shut up: Is there a stakeholders' group, or



1	will there be a stakeholders' group?
2	MS. MOROZOWICH: We haven't gotten
3	that far. But would you like one? Do you think one
4	is necessary?
5	MR. BARCHAK: I'm not sure. You know
6	the business of distributing this kind of money
7	better than I.
8	I mean, truthfully, 9 million is not
9	a whole lot of money. But it seems like, in some
10	ways, by the time we got a stakeholders' group up
11	and going, that money would be out the door, but
12	MS. GRAY: That's not the intent. We
13	do have a Listserv, and that's how we hope to push
14	information out to our stakeholders that are
15	interested in what we are doing with the Volkswagen
16	settlement.
17	We also have another organization
18	that's called the Clean Cities Coalition. And their
19	purpose is to look at alternative fueled vehicles.
20	And you may have picked up some materials when you
21	came in.
22	And that's another mechanism for
23	working on alternative fueled vehicles in reducing
24	that whole carbon footprint of our fleet.



We also are working very closely with our Department of Education on moving propane school buses into our fleet. We have done a number of vehicles through DERA, the Diesel Emission Reduction Act branch, for the past couple of years. We have a couple of folks in the room who are very attuned with that kind of work that we have been doing. And it's unfortunate that a representative from DOE could not be here tonight. So they did send their apologies to us. MS. MOROZOWICH: Who was next to comment? I'm Bill Macleod with MR. MACLEOD: the Fuel Cell and Hydrogen Energy Association. I have a statement I would like to read, if you bear with me. As background, the association is the trade association that's dedicated to commercialization of fuel cells and hydrogen energy technologies. Members include the full supply chain of hydrogen and fuel cell companies, including automakers; material, component, fuel cell stack and system manufacturers; hydrogen producers and energy

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23



1	companies; utilities; and end users.
2	Prominent among these members are two
3	innovative companies operating here in Delaware.
4	Air Liquide operates a research and development
5	center in Newark. And W. L. Gore, also in Newark,
6	produces membrane electrode assemblies and membranes
7	for the proton exchange membrane fuel cells.
8	I'm here with Laura Geiman, who is a
9	representative of W. L. Gore.
10	As background, fuel cell
11	installations and deployments are increasing every
12	year, in number and in megawatts. There are more
13	than 235 megawatts of large stationary fuel cells
14	currently operating in 43 states.
15	Electric utilities use fuel cells to
16	provide megawatts of power to local users.
17	Cities are adopting fuel cells to
18	power central services when the grid goes down.
19	Rail and telecom companies use fuel
20	cells to power communication towers and signaling
21	infrastructure.
22	Further, major corporations are
23	installing hundreds of fuel cell systems to power
24	retail sites, data centers, and other facilities.



1 Companies are deploying fuel cell forklifts as an example to work in their warehouses and distribution 2 3 centers across the country. 4 Fuel cell vehicles are available for purchase and lease in California, getting into 5 personal transport, and soon will be available in 6 7 several northeastern states. Finally, fuel cell buses are in 8 operation in several states, including here in 9 10 Delaware. 11 These examples display the industry's 12 capacity and capability to successfully deliver the kind of projects that the draft mitigation plan 13 14 envisions funding. 15 FCHEA endorses the plans and goal of improving ambient air quality by seeking significant 16 17 and sustained cost-effective reductions in nitrogen 18 oxide emissions and expediting deployment and adoption of zero-emission vehicles and near-ZEV 19 vehicles and engines. 20 21 A couple suggestions: So, first, to enhance the fulfillment of the plan, FCHEA 22 23 recommends an economic impact factor be added to the



plan's anticipated project selection criteria.

1	Doing so will help further promote the growth of
2	Delaware's fuel cell industry.
3	Next, FCHEA also supports ZEV
4	vehicles, zero-emission vehicles, as a key pathway
5	to advancing energy independence and reducing the
6	carbon intensity of transportation fuels. Because
7	fuel cell vehicles combine the emissions-free
8	driving of battery electric vehicles with the range
9	and convenience of gasoline-powered vehicles, FCHEA
10	supports building refueling infrastructure that
11	support bringing these vehicles to market.
12	To expedite the deployment of the ZEV
13	as called for by the plan, FCHEA recommends
14	available ZEV supply equipment-related funds, which
15	we understand are capped at 15 percent of the total,
16	be allocated in coordination with
17	private-sector-funded hydrogen refueling networks.
18	Hydrogen providers and automakers are
19	exploring the development of such a network in the
20	I-95 corridor here in the northeast region.
21	Last, FCHEA recommends that a "zero
22	emissions miles dispensed" factor be added to the
23	plan's anticipated project selection criteria.
24	By giving added preference to those



1 projects capable of dispensing greater zero-emission 2 driving miles, NOx reduction benefits can be maximized. 3 4 That is my statement. I appreciate your bearing with me. I'll be happy to answer any 5 6 questions you all have about fuel cell and hydrogen 7 technology. 8 THE REPORTER: Do you have an extra 9 copy? 10 MR. MACLEOD: Yes. I will give you a 11 Thank you very much. copy. 12 MS. MOROZOWICH: Thank you. MR. JONES: My name is Carl Jones. 13 14 I'm with Cummins Engine Company. Very similar, I 15 have some information based on trying to help with 16 the proposal. 17 First, I want to thank you for the opportunity to speak. So with Cummins I represent 18 19 the automotive -- the automotive side highway business for our dealers Delaware, Maryland, and 20 21 northern Virginia. 22 In reference to the VW settlement 23 goals, the state should get the most NOx reduction 24 possible by the funds being provided. The



1 settlement requires the states to measure their NOx reductions in achieving their mitigation plans. 2 3 Delaware can do this by reducing or 4 replacing their older heavy-duty vehicles with the latest and most cost-effective technology available. 5 Cummins offers a clean diesel and natural gas 6 7 technology. The latest clean diesel and natural 8 gas technologies meet or exceed the most stringent 9 10 emission requirements established by the US EPA. 11 For example, a 2010 newer diesel 12 truck running in a non-attainment area will emit 13 cleaner air through the tailpipe than it takes in 14 from the environment. 15 Another example is 60 clean diesel trucks emit the same NOx level as a truck 16 manufactured back in 1988. 17 Cost-effective solutions to make this 18 Replacing your older diesel engines with 19 happen: new diesel and natural gas engines is the most 20 21 cost-effective way to reduce emissions. 22 According to the U.S. Department of Transportation, one ton of NOx emissions can be 23 24 eliminated by investing \$20,000 in clean diesel



1 technology versus \$1 million in electrical 2 infrastructure. \$5 million spent towards 3 natural-gas-powered vehicles can reduce 3,800 tons 4 of smog-forming emissions compared to 1,200 tons from electrical -- electric-powered vehicles by the 5 6 grid. 7 Clean diesel and natural gas are technologies that are available for immediate 8 availability to the State of Delaware for reducing 9 10 their emissions footprint. 11 Cummins is a global power leader in 12 designing, manufacturing, selling, and servicing diesel engines, natural gas engines, power 13 14 generation, and related products and technologies. 15 Our clean diesel and natural gas 16 products are available in a wide range of heavy-duty 17 on-highway, off-highway, locomotive, and marine 18 applications to exceed the most stringent emission 19 requirements established by the EPA. Cummins has for years had experience 20 21 working with the DERA program, the Diesel Emissions 22 Reduction Act. And we continue to provide 23 alternatives for replacing or repowering of 24 equipment.



1	In conclusion, clean diesel and
2	natural gas provides the fastest and most
3	cost-effective solution for addressing NOx emissions
4	in the state. And we support the State's decision
5	to keep the proposed mitigation plan open to all
6	technologies and all project types.
7	And I thank you. And if you have any
8	questions, please let me know.
9	(The reporter asked for a copy of the
10	statement read into the record by Mr. Jones.)
11	MR. PRASAD: My question has to do
12	with I have heard ten years as the timeframe that
13	was mentioned.
14	So it's \$9 million over ten years.
15	Is it an annual RFP that's going to come out, or is
16	it a one-time RFP that's going to disperse the
17	entire \$9 million in one shot?
18	Can you give some shed some light
19	on that?
20	MS. MOROZOWICH: We have not
21	developed that plan, either.
22	MR. PRASAD: Okay.
23	MS. MOROZOWICH: Our hope was to have
24	large projects and disperse the larger funds over a



1 shorter time period. But we can certainly go with smaller projects and disperse them over a longer 2 3 time period, as well. 4 MR. PRASAD: So my question is what 5 does a ten-year exactly refer to, then? MS. GRAY: It's a 30-month settlement 6 7 I can go to the trustee, and I can request cycle. funding every 30 months. 8 So where we would probably be in 9 10 terms of constructing an RFP could be one RFP that 11 would cover projects over a longer time horizon or 12 three smaller RFPs covering a one-year time frame 13 following a similar program that DERA follows, which 14 is a one-year time horizon. 15 We take comment on what your 16 preference might be in terms of constructing that 17 RFP -- should it be a shorter time frame, a longer 18 time frame -- what makes the best sense for 19 Delaware? MS. DRYDEN: I will take one more 20 21 stab at this. Do we know the percentage of EJ communities that were impacted by this violation and 22 23 resulting into these funds? Do we have any idea the 24 percentage?



1	MS. MOROZOWICH: No.
2	MS. DRYDEN: No idea at all?
3	MS. GRAY: No.
4	MS. DRYDEN: But we know that it's
5	high.
6	MS. GRAY: It's probably higher than
7	a rural community with fewer people.
8	MS. HERRON: Like closer near a
9	highway.
10	MS. DRYDEN: Yes, along Route 9 for
11	example, with the trucks. Okay. And so we said
12	that zero percent of these funds should do any
13	indoor? We got all that.
14	MS. GRAY: Unfortunately, that's what
15	the boundaries are.
16	MS. DRYDEN: Okay. So, based on that
17	information, if for the record, this is Penny
18	Dryden again I'm sorry if we could at least
19	put it on the record that there is a strong request
20	that there be some portion.
21	I don't know who could modify, who
22	could help us out here, but at least that go into
23	the record that there was a strong request for that,
24	that that at least happen.



1 MS. GRAY: Just to clarify: asking for modification of the settlement 2 3 categories, or that you are requesting that we 4 construct our categories so that when we receive projects, that if they come from communities that 5 6 are in these areas, that we would give them a 7 greater consideration than another project? 8 Is that what you are asking? Well, yeah, that, too. 9 MS. DRYDEN: 10 But they want to know how this whole -- this 11 violation has impacted them. And there is no way to 12 know if I -- if this NOx is in my home because of There is no way for them to know 13 that violation. 14 unless they do some sort of indoor air quality test. 15 MS. GRAY: That's correct. 16 MS. DRYDEN: And so, you know, that kind of leaves out. And how is that tied into their 17 18 health issues that they are having? Because if that NOx shows up when they do this test, then we know 19 exactly that this is a direct correlation with this 20 21 violation. 22 Well, we do have monitors MS. GRAY: 23 throughout the state. I think Ron Amirikian can 24 speak a little bit better to where the monitors are



1 and the data that we receive. 2 And you can even go on our DNREC 3 website, and you can see live data of what the 4 monitorings are actually collecting, the ambient air quality what we breathe outside. 5 And you can see 6 what they are collecting. 7 And I don't believe we have had any NOx emission violations in the ambient air quality 8 I don't think we had any last summer. 9 in awhile. 10 MR. AMIRIKIAN: I'm Ron Amirikian. 11 I --12 MS. DRYDEN: Well, if it's in the air anywhere, it's in somebody's home, so. 13 14 MR. AMIRIKIAN: Maybe just a little 15 bit of background, maybe: We are talking NOX emissions and nitrogen oxide emissions. And this is 16 17 something that basically every single vehicle that 18 burns gasoline emits. All cars emit NOx, all trucks 19 emit NOx, if they are burning fossil fuels. What happened here is the Volkswagen 20 21 vehicles exceeded the standards for NOx. A vehicle is only allowed to emit so much of it. And these 22 23 vehicles from VW were exceeding the federal 24 standards more than they were allowed.



So I'm not sure if a monitor, if it picks up nitrogen oxides, that we could really tie it to a certain Volkswagen vehicle, because everything is emitting. Our power plants are emitting NOx and burn fossil fuels.

So it's something that's in our atmosphere. There are air quality standards for it, as Valerie just mentioned. And Delaware has always been in attainment for those standards and well within attainment. None of them exceed nitrogen oxide standards.

What our concern here is, we are in non-attainment of ozone standards. And ozone isn't directly emitted from sources. What happens is in the atmosphere nitrogen oxides combine with other pollutants, and they form ozone.

So that's why we are concerned with the NOx emissions coming from the vehicles. We set standards to reduce the NOx emissions to reduce the concentration of ozone. And Volkswagen exceeded those standards, so they interrupted the plans we had, which is the issue. They did that across the country.

I'm not sure if that helps or not.



1	MS. DRYDEN: It still doesn't tell me
2	how's the community is impacted. I don't know if it
3	can.
4	MS. GRAY: Without a broader study,
5	I'm not sure if that could be done. But it's
6	intriguing. It would be very interesting to work on
7	something like that.
8	Any other questions or comments? You
9	have an opportunity to submit comments to Deanna.
10	MR. DETRICK: Just at this stage
11	MS. MOROZOWICH: Your name?
12	MR. DETRICK: Dave Detrick,
13	Chesapeake Utilities. So we are conceiving of a
14	number of options here for this that involve natural
15	gas, CNG for example, in helping communities get CNG
16	waste trucks, for example.
17	At this stage, is this the time to
18	submit concepts like that, or do you want more
19	broad, general comments on the 12 for example,
20	the 12 points here on the one handout? I mean
21	how at this point how
22	MS. GRAY: We are not making a formal
23	proposal. We are not requesting proposals today.
2.4	MR DETRICK: Right



1	MS. GRAY: Probably we are looking
2	more for the broader questions that kind of the how
3	might we apportion this pie? How much should be
4	dedicated to CNG equipment over another category.
5	MR. DETRICK: Right.
6	MS. GRAY: And we would be looking
7	for how that meets the NOx emissions and the like.
8	MR. DETRICK: Okay.
9	MS. GRAY: But we are very interested
10	in receiving projects once we are allowed to ask for
11	them.
	CIICIII.
12	MR. DETRICK: A follow-up on that.
13	And this goes to who can submit comments? Can the
14	coalition submit comments?
15	MS. GRAY: I would ask Morgan and
16	Kathy in the back to answer, since they are our
17	coordinators.
18	MS. ELLIS: Morgan Ellis, DNREC,
19	Division of Energy and Climate. I would have to
20	check into that, Dave.
21	MR. DETRICK: Okay. Fair enough.
22	MS. GRAY: Do you have something
23	else?
24	MR. DRYDEN: I guess I came down



1	here, and I'm finding out that I may have not been
2	clear on maybe what the actual court order for the
3	settlement was.
4	And it appears that I'm looking at
5	mitigation, but it appears that this money is to be
6	spent on the vehicles, you are saying. And that's
7	what the court ordered, not DNREC?
8	MS. GRAY: That is correct.
9	MS. MOROZOWICH: Correct.
10	MR. DRYDEN: That's what the court
11	ordered, that this money just be on vehicles?
12	MS. GRAY: Right.
13	MR. DRYDEN: That is not DNREC's
14	plan?
15	MS. GRAY: That is correct. Our plan
16	is how might we spend the money that the court has
17	said you can spend it in these categories. Does
18	that make sense?
19	MR. DRYDEN: Say that again? Say it
20	again.
21	MS. GRAY: The court said the
22	violation was for Volkswagen diesel-powered
23	vehicles.
24	They want to offset that violation by



1 having a penalty and having states be able to offset those emissions by spending it on cleaner diesel 2 technologies or vehicles that reduce NOx within the 3 4 categories that they spelled out. Does that make sense? 5 So the court 6 said, "You, the states, can do this, but you get to 7 decide how you do this. And we are going to give Delaware \$9 million. How do you want to spend it? 8 But this is the box you have to work in." 9 Does that make sense? It is what it 10 11 is, unfortunately. 12 MR. DETRICK: Maybe I missed it. is there some estimate during the violation time 13 14 period of the amount of NOx emitted by registered 15 Volkswagen vehicles in this situation? Is there any 16 sort of swaq on that? It seems to me that might be 17 a cure for someone deciding. I don't believe -- I think 18 MS. GRAY: we would have to look into the court documents. 19 I would have to get back to you on 20 don't know. 21 that, on how they decide that. 22 In terms of how to MR. PRASAD: 23 apportion the money, I'm going to go back to the 24 point I made first, which is you keep an open mind

as to all the different items that come in, and you make your decisions based on which projects is going to get the best bang for your buck in terms of reduction for those spent. And, you know, the non-attainment areas preferably. So, to me, that way you are not putting artificial boundaries; you are getting all sorts of projects coming in; you get a diversity of projects; you are not putting -- I mean, if you are talking \$9 million over ten years, that's \$0.9 million per year on average. And a single electric bus could blow the budget right there. One year's budget is gone in a single acquisition, which, you know, seems it's like putting all your eggs in one basket. So I think a mix of small and large projects and diversity of projects affecting as many population areas as possible, I think those are all good metrics to look for by looking at proposals. MS. GRAY: Thank you. That's helpful. Any other comments, questions, considerations we should look at? MS. MOROZOWICH: Hearing none, thank everyone for coming tonight.

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24



1	(Concluded at 6:54 p.m.)
2	
3	
4	
5	
6	
7	
8	
9	
10	
11	
12	
13	
14	
15	
16	
17	
18	
19	
20	
21	
22	
23	CERTIFICATE
24	I, Lorena J. Hartnett, a Notary Public and



Registered Professional Reporter, do hereby certify that the foregoing is an accurate and complete transcription of the proceeding held at the time and place stated herein, and that the said proceeding was recorded by me and then reduced to typewriting under my direction, and constitutes a true record of the testimony given by said witnesses. I further certify that I am not a relative, employee, or attorney of any of the parties or a relative or employee of either counsel, and that I am in no way interested directly or indirectly in this action. IN WITNESS WHEREOF, I have hereunto set my hand and affixed my seal of office on this 23th day of March 2017. Lorena J. Hartnett Registered Professional Reporter 



ф	acquisition (1)	agree (1)	9:22 10:2
\$	46:14	6:8	Amirikian (4)
***	across (2)	agreed (2)	39:23 40:10,10,14
\$0.9 (1)	31:3 41:22	3:6 11:17	among (1)
46:10	Act (4)	agreement (11)	30:2
\$1 (1)	2:23 15:15 29:5	9:2,13,14 11:6,14	amongst (1)
35:1	35:22	15:6,9 16:6 18:4	27:6
\$10 (1)	actions (4)	19:23 21:4	amount (1)
3:14	2:16 3:24 4:19,23	Air (13)	45:14
\$14.7 (1)	actively (1)	2:22 21:10 22:12,	and/or (1)
3:7	9:16	15 23:21 30:4 31:16	3:10
\$2 (1)	actual (1)	34:13 39:14 40:4,8,12	annual (1)
3:15	44:2	41:7	36:15
\$2.7 (2)	actually (6)	airport (1)	another (10)
3:16,20	8:23 10:3 15:8	14:17	7:24 18:17 19:5,9,
<b>\$2.9</b> (1)	17:13 20:9 40:4	Ajay (1)	19 28:17,22 34:15
27:6	add (1)	17:11	39:7 43:4
\$20,000 (1)	22:2	allegations (1)	answer (2)
34:24	added (3)	3:7	33:5 43:16
<b>\$5 (1)</b>	31:23 32:22,24	allocated (2)	anticipated (2)
35:2	addition (1)	24:11 32:16	31:24 32:23
<b>\$9</b> ( <b>9</b> )	17:21	allowed (3)	anytime (1)
3:21 9:7 12:5 24:11	addressing (1)	40:22,24 43:10	9:23
27:7 36:14,17 45:8	36:3	along (2)	anywhere (1)
46:10	adopting (1)	22:21 38:10	40:13
	30:17	already (2)	apologies (1)
$\mathbf{A}$	adoption (1)	17:15,22	29:10
	31:19	also (10)	apologize (1)
able (3)	advancing (1)	5:12 14:19,20	18:1
22:16 26:8 45:1	32:5	19:23 21:21 26:5	appears (2)
Absolutely (1)	affected (2)	28:17 29:1 30:5 32:3	44:4,5
23:13	20:3 21:21	alternative (2)	appendix (6)
accepting (1)		28:19,23	
5:13	affecting (1)	·	6:8 15:7,8,8,10 17:14
access (1)	46:17	alternatives (1)	
4:10	after (1)	35:23	applications (1)
According (1)	15:14	always (2)	35:18
34:22	again (3)	27:22 41:8	apply (3)
achieving (1)	38:18 44:19,20	ambient (3)	3:20 4:17 7:4
34:2	agenda (2)	31:16 40:4,8	applying (1)
	2:4,11	amend (2)	5:18

41:9,10 attuned (1) 29:7 automakers (2) 29:23 32:18 automotive (2) 33:19,19 availability (1) 35:9 available (7) 23:3 31:4,6 32:14 34:5 35:8,16 average (1) 46:11 awhile (1) 40:9	32:8 bear (1) 29:15 bearing (1) 33:5 become (1) 5:11 being (4) 14:22 24:4 27:13 33:24 believe (8) 7:20,21 8:9 21:1,2 27:4 40:7 45:18 bells (2) 11:15 16:14	blue (1) 3:19 boundaries (3) 11:3 38:15 46:7 boundary (1) 27:17 box (1) 45:9 branch (1) 29:5 brand (1) 16:14 breathe (1) 40:5
29:7  automakers (2) 29:23 32:18  automotive (2) 33:19,19  availability (1) 35:9  available (7) 23:3 31:4,6 32:14 34:5 35:8,16  average (1) 46:11  awhile (1)	29:15 bearing (1) 33:5 become (1) 5:11 being (4) 14:22 24:4 27:13 33:24 believe (8) 7:20,21 8:9 21:1,2 27:4 40:7 45:18 bells (2)	boundaries (3) 11:3 38:15 46:7 boundary (1) 27:17 box (1) 45:9 branch (1) 29:5 brand (1) 16:14 breathe (1)
automakers (2) 29:23 32:18 automotive (2) 33:19,19 availability (1) 35:9 available (7) 23:3 31:4,6 32:14 34:5 35:8,16 average (1) 46:11 awhile (1)	bearing (1) 33:5 become (1) 5:11 being (4) 14:22 24:4 27:13 33:24 believe (8) 7:20,21 8:9 21:1,2 27:4 40:7 45:18 bells (2)	11:3 38:15 46:7 boundary (1) 27:17 box (1) 45:9 branch (1) 29:5 brand (1) 16:14 breathe (1)
29:23 32:18  automotive (2)	33:5 become (1) 5:11 being (4) 14:22 24:4 27:13 33:24 believe (8) 7:20,21 8:9 21:1,2 27:4 40:7 45:18 bells (2)	boundary (1) 27:17 box (1) 45:9 branch (1) 29:5 brand (1) 16:14 breathe (1)
automotive (2) 33:19,19 availability (1) 35:9 available (7) 23:3 31:4,6 32:14 34:5 35:8,16 average (1) 46:11 awhile (1)	become (1) 5:11 being (4) 14:22 24:4 27:13 33:24 believe (8) 7:20,21 8:9 21:1,2 27:4 40:7 45:18 bells (2)	27:17 box (1) 45:9 branch (1) 29:5 brand (1) 16:14 breathe (1)
33:19,19 availability (1) 35:9 available (7) 23:3 31:4,6 32:14 34:5 35:8,16 average (1) 46:11 awhile (1)	5:11  being (4)  14:22 24:4 27:13  33:24  believe (8)  7:20,21 8:9 21:1,2  27:4 40:7 45:18  bells (2)	box (1) 45:9 branch (1) 29:5 brand (1) 16:14 breathe (1)
availability (1) 35:9 available (7) 23:3 31:4,6 32:14 34:5 35:8,16 average (1) 46:11 awhile (1)	being (4)  14:22 24:4 27:13  33:24  believe (8)  7:20,21 8:9 21:1,2  27:4 40:7 45:18  bells (2)	45:9 branch (1) 29:5 brand (1) 16:14 breathe (1)
35:9  available (7)  23:3 31:4,6 32:14  34:5 35:8,16  average (1)  46:11  awhile (1)	14:22 24:4 27:13 33:24 believe (8) 7:20,21 8:9 21:1,2 27:4 40:7 45:18 bells (2)	branch (1) 29:5 brand (1) 16:14 breathe (1)
available (7) 23:3 31:4,6 32:14 34:5 35:8,16 average (1) 46:11 awhile (1)	33:24  believe (8)  7:20,21 8:9 21:1,2  27:4 40:7 45:18  bells (2)	29:5 brand (1) 16:14 breathe (1)
23:3 31:4,6 32:14 34:5 35:8,16 average (1) 46:11 awhile (1)	believe (8) 7:20,21 8:9 21:1,2 27:4 40:7 45:18 bells (2)	brand (1) 16:14 breathe (1)
34:5 35:8,16 average (1) 46:11 awhile (1)	7:20,21 8:9 21:1,2 27:4 40:7 45:18 bells (2)	16:14 breathe (1)
average (1) 46:11 awhile (1)	27:4 40:7 45:18 bells (2)	breathe (1)
46:11 awhile (1)	bells (2)	, ,
awhile (1)	` ′	40:5
` ′	11:15 16:14	
40:9		bring (3)
	beneficiary (6)	7:11 8:14 23:14
	5:9,10,12,19 9:16,	bringing (1)
В	18	32:11
	benefits (4)	broad (1)
back (11)	4:3 12:2 23:24 33:2	42:19
3:10 6:14 10:7,11,	best (4)	broader (2)
20 12:12 21:23 34:17	9:7 19:2 37:18 46:3	42:4 43:2
43:16 45:20,23	better (3)	buck (2)
background (3)	7:2 28:7 39:24	19:2 46:3
29:17 30:10 40:15	between (1)	bucket (1)
bang (2)	2:23	23:20
19:2 46:3		budget (2)
BARCHAK (9)		46:13,13
6:2,7,11,16,16,21		building (1)
27:11,11 28:5	, ,	32:10
barebones (1)		burn (1)
7:3	, ,	41:5
based (6)		burning (1)
19:3 26:24 27:3		40:19
33:15 38:16 46:2		burns (1)
basically (3)		40:18
4:19 25:24 40:17	, ,	bus (9)
basket (1)		7:7 10:2 15:20
46:15		16:14,16,18,20 17:2
	BARCHAK (9) 6:2,7,11,16,16,21 27:11,11 28:5 barebones (1) 7:3 based (6) 19:3 26:24 27:3 33:15 38:16 46:2 basically (3) 4:19 25:24 40:17 basket (1)	19:2 46:3  BARCHAK (9) 6:2,7,11,16,16,21 27:11,11 28:5  barebones (1) 7:3 based (6) 19:3 26:24 27:3 33:15 38:16 46:2 basically (3) 4:19 25:24 40:17 basket (1)  beyond (1) 24:24 bill (2) 27:18 29:13 billion (5) 3:7,15,16,20 27:6 bin (5) 12:2,2,3 14:18 23:18 bit (4) 8:18 23:9 39:24 40:15

March 23, 2017

Division of Air Quality	T	T	March 23, 2017
competitive (2)	constructing (2)	29:9 37:10 38:18,21,	<b>Dave</b> (2)
9:1 17:8	37:10,16	22 41:2 42:5 46:12	42:12 43:20
compliance (1)	continue (2)	country (2)	dealers (1)
3:5	19:11 35:22	31:3 41:23	33:20
component (1)	continues (1)	couple (3)	Deanna (3)
29:23	12:15	29:5,6 31:21	2:4 17:24 42:9
conceiving (1)	contract (1)	<b>court</b> (15)	Deanna's (1)
42:13	16:11	2:7 5:3,5 9:11,12	8:23
concentration (1)	control (1)	11:13 13:19 27:6 44:2,	Dear (1)
41:20	2:24	7,10,16,21 45:5,19	10:15
concept (1)	controls (1)	courts (1)	decide (2)
23:1	16:15	21:16	45:7,21
concepts (1)	convenience (1)	cover (1)	deciding (1)
42:18	32:9	37:11	45:17
concern (2)	coordination (1)	covering (1)	decision (1)
4:3 41:12	32:16	37:12	36:4
Concerned (3)	coordinators (1)	crafted (1)	decisions (1)
13:9 20:13 41:17	43:17	21:15	46:2
Concluded (1)	<b>copy</b> (3)	crafting (1)	dedicated (2)
47:1	33:9,11 36:9	7:18	29:18 43:4
concludes (1)	corporations (1)	credits (1)	defining (1)
5:22	30:22	10:17	20:16
conclusion (1)	correct (6)	criteria (2)	definitely (1)
36:1	6:13,19 39:15 44:8,	31:24 32:23	24:21
concur (1)	9,15	Cummins (5)	Delaware (26)
6:18	correlation (1)	33:14,18 34:6	3:20 4:8 9:8 13:9
conference (1)	39:20	35:11,20	17:12 20:13 24:4,6,9,
12:15	correspond (2)	cure (1)	12 25:15,18 26:6,7,9,
consider (2)	4:11 12:11	45:17	12 27:2,14 30:3 31:10
10:20 24:22	corridor (1)	currently (1)	33:20 34:3 35:9 37:19
consideration (4)	32:20	30:14	41:8 45:8
4:1 19:20,24 39:7	cost (4)	cut (1)	Delaware-owned (1)
considerations (1)	15:11 16:9 17:16	12:24	26:16
46:22	18:8	cycle (1)	Delaware's (3)
considered (1)	cost-effective (5)	37:7	2:16 5:2 32:2
7:6	31:17 34:5,18,21		deliberation (1)
considering (1)	36:3	D	7:4
5:6	<b>could</b> (16)		deliver (1)
construct (2)	8:8 13:22 16:17,19,	data (4)	31:12
11:3 39:4	21 19:11 22:2 25:2	23:9 30:24 40:1,3	densely-populated (1)

19:15	differently (1)	21:16,19 40:2 43:18	-
Department (3)	3:1	44:7	E
2:5 29:2 34:22	direct (1)	DNREC's (1)	
deploying (1)	39:20	44:13	economic (1)
31:1	directly (1)	document (2)	31:23
deployment (2)	41:14	6:9 12:17	Education (2)
31:18 32:12	discuss (1)	documented (1)	27:13 29:2
deployments (1)	2:3	2:10	eggs (1)
30:11	discussing (1)	documents (2)	46:15
DERA (6)	2:12	13:15 45:19	eight (1)
14:19,21,23 29:4	discussion (2)	<b>DOE</b> (1)	14:13
35:21 37:13	2:7,20	29:9	Either (2)
description (1)	dispensed (1)	dollar (1)	16:23 36:21
4:3	32:22	19:6	<b>EJ</b> (9)
designing (1)	dispensing (1)	dollars (1)	20:18,19,20 21:13,
35:12	33:1	20:22	21,24 22:8 23:12
detail (1)	disperse (3)	done (4)	37:21
17:18	36:16,24 37:2	9:14,23 29:3 42:5	electric (5)
determine (1)	display (1)	door (4)	16:18,19 30:15
22:20	31:11	12:14,18,22 28:11	32:8 46:12
determined (2)	disproportionate-impacted (1)	down (2)	electrical (2)
8:1,5	20:17	30:18 43:24	35:1,5
DETRICK (10)	disproportionately (2)	draft (3)	electric-powered (1)
17:2 42:10,12,12,	4:1 20:3	5:14 9:10 31:13	35:5
24 43:5,8,12,21 45:12	disproportionately-affected (1)	drainage (1)	electrode (1)
developed (1)	20:10	6:18	30:6
36:21	distributing (1)	driving (2)	eligibility (1)
development (2)	28:6	32:8 33:2	15:1
30:4 32:19	distribution (1)	DRYDEN (41)	eligible (10)
devices (1)	31:2	13:4,6,8,8,17,21	3:24 4:17 6:3 14:4,
3:8	district (1)	14:3,15,24 15:4,16,21	9 15:2,22,24 17:7 26:6
diesel (19)	27:18	20:12,12,20 21:12	eliminated (1)
4:13 15:14,20,23,	districts (1)	22:2,5,5,10,15,20	34:24
23 29:4 34:6,8,11,15,	27:20	23:7,10,14,15,19	Ellen (2)
19,20,24 35:7,13,15,	diversity (2)	37:20 38:2,4,10,16,18	6:23 10:20
21 36:1 45:2	46:8,17	39:9,16 40:12 42:1	Ellis (2)
diesel-powered (1)	Division (1)	43:24 44:10,13,19	43:18,18
44:22	43:19	during (3)	else (1)
different (2)	DNREC (8)	3:1,2 45:13	43:23
17:14 46:1	8:23 10:16 20:16		e-mail (1)

Division of Air Quality			Wiarch 25, 2017
5:24	24:16	2:2 46:24	30:24
emission (12)	enter (1)	everything (1)	factor (2)
2:15,24 3:2 4:2,3,7	16:11	41:4	31:23 32:22
11:22 15:15 29:4	entire (1)	evolve (1)	Fair (1)
34:10 35:18 40:8	36:17	24:1	43:21
emissions (27)	entitled (1)	Exactly (3)	<b>fall</b> (3)
3:12 4:9 11:23 19:1,	3:20	26:23 37:5 39:20	5:2,16 17:9
3,3 21:6,8,10,15,21	entity (2)	example (7)	familiar (1)
22:1,11 31:18 32:22	15:3,12	31:2 34:11,15	14:22
34:21,23 35:4,10,21	environment (3)	38:11 42:15,16,19	far (1)
36:3 40:16,16 41:18,	19:16,18 34:14	examples (1)	28:3
19 43:7 45:2	<b>Environmental (8)</b>	31:11	fastest (1)
emissions-free (1)	2:3 3:17,21 5:15	exceed (3)	36:2
32:7	13:10 14:7 20:1,14	34:9 35:18 41:10	FCHEA (6)
emit (6)	envisions (1)	exceeded (2)	31:15,22 32:3,9,13,
3:3 34:12,16 40:18,	31:14	40:21 41:20	21
19,22	EPA (4)	exceeding (1)	federal (1)
emits (1)	2:12 4:6 34:10	40:23	40:23
40:18	35:19	excess (1)	feel (1)
emitted (2)	<b>EPA's</b> (1)	3:5	2:20
41:14 45:14	3:5	exchange (1)	ferries (2)
emitting (2)	equipment (4)	30:7	14:14 18:18
41:4,5	4:14 14:17 35:24	excuse (1)	fewer (1)
end (3)	43:4	18:2	38:7
25:9,11 30:1	equipment-related (1)	expand (1)	figure (1)
endorses (1)	32:14	26:1	8:18
31:15	especially (1)	expedite (1)	<b>file</b> (1)
Energy (5)	25:21	32:12	5:8
29:14,19,24 32:5	established (3)	expediting (1)	finalized (1)
43:19	25:3 34:10 35:19	31:18	5:7
engine (2)	estimate (1)	experience (1)	Finally (1)
4:22 33:14	45:13	35:20	31:8
engines (5)	even (3)	exploring (1)	finding (1)
31:20 34:19,20	8:12 25:19 40:2	32:19	44:1
35:13,13	evening (4)	extra (1)	first (4)
enhance (1)	2:1,4,6,8	33:8	27:10 31:21 33:17
31:22	every (5)		45:24
enough (1)	19:6 22:4 30:11	F	fit (2)
43:21	37:8 40:17		21:24 27:18
ensure (1)	everyone (2)	facilities (1)	fits (2)

			,
16:4,5	12:4	23:9 30:22 32:1	3:23 31:15
five (1)	forth (2)	future (1)	goals (1)
10:17	13:12 20:23	23:23	33:23
fleet (5)	forward (1)		goes (5)
10:19 11:22 27:18	23:14	G	6:14 22:15,15
28:24 29:3	fossil (2)		30:18 43:13
fleets (3)	40:19 41:5	garner (1)	<b>going</b> (21)
7:7,7 10:2	four (1)	9:4	2:11 5:20 7:13,13,
flexibility (1)	14:12	Gas (10)	14,14 9:24 10:3,7,18
18:5	frame (3)	6:24 17:2 34:6,9,20	15:7 21:13 25:22
floor (1)	37:12,17,18	35:7,13,15 36:2 42:15	27:16,18 28:11 36:15,
2:18	free (1)	gasoline (1)	16 45:7,23 46:2
focus (5)	2:21	40:18	gone (1)
11:21 19:1 21:9	freight (2)	gasoline-powered (1)	46:13
25:16,20	14:13,13	32:9	Good (2)
focused (2)	fuel (19)	gave (1)	2:1 46:19
24:16,24	16:22,24 29:14,19,	15:18	Gore (2)
focusing (1)	22,23 30:7,10,13,15,	Geiman (1)	30:5,9
25:6	17,19,23 31:1,4,8	30:8	gotten (1)
folks (1)	32:2,7 33:6	general (2)	28:2
29:6	fueled (3)	13:12 42:19	government (2)
folks' (1)	15:23 28:19,23	generally (1)	4:24 17:17
21:22	fuels (3)	27:20	governmental (1)
follow (2)	32:6 40:19 41:5	generation (1)	25:2
11:16 18:3	fulfillment (1)	35:14	grant (1)
following (1)	31:22	getting (6)	14:21
37:13	<b>full</b> (1)	19:8 21:23 26:20,	graph (1)
follows (1)	29:21	21 31:5 46:7	4:16
37:13	<b>fund</b> (1)	give (7)	GRAY (67)
follow-up (1)	19:7	8:16 25:9 26:9	8:19,22,22 10:9,23
43:12	funding (5)	33:10 36:18 39:6 45:7	11:5,9,12 12:9,12,15,
footprint (2)	4:22 10:1 23:2	gives (1)	19,23 13:16,18,22
28:24 35:10	31:14 37:8	24:8	15:2,5,17,22 16:19,23
forklifts (2)	<b>funds</b> (16)	giving (2)	17:5,23 18:8,11,24
14:18 31:1	3:9,23 7:19,20,24	10:17 32:24	19:9,19,22 20:5,9,19
form (2)	8:10 10:5 14:6,20	glad (1)	21:4 22:9,14,24 23:8,
12:11 41:16	16:10 27:21 32:14	24:19	13,17,20 25:10,12
formal (1)	33:24 36:24 37:23	global (1)	26:8,21,24 28:12 37:6
42:22	38:12	35:11	38:3,6,14 39:1,15,22
		goal (2)	42:4,22 43:1,6,9,15,

or and a surface of the surface of t			17141 (11 20, 20
22 44:8,12,15,21	19:17	19:3	22:11,17 31:23
45:18 46:20	Hartnett (1)	highway (2)	impacted (7)
great (2)	47:24	33:19 38:9	4:1 21:14 22:1
8:19 10:6	health (2)	home (2)	25:21 37:22 39:11
greater (2)	21:22 39:18	39:12 40:13	42:2
33:1 39:7	health-wise (1)	homes (2)	implementation (1)
grid (2)	21:14	22:12,21	4:4
30:18 35:6	hear (1)	hope (3)	improving (1)
ground (1)	13:11	10:19 28:13 36:23	31:16
14:17	heard (1)	hopefully (1)	Inaudible (1)
group (3)	36:12	5:15	10:9
27:24 28:1,10	Hearing (1)	hoping (1)	incent (1)
grouped (1)	46:23	5:11	25:17
4:8	heavier (1)	horizon (2)	include (3)
groups (1)	14:11	37:11,14	3:23 5:18 29:21
20:6	heavily (1)	however (1)	including (2)
growth (1)	22:7	10:18	29:22 31:9
32:1	heavily-traveled (1)	how's (1)	increasing (1)
guess (3)	22:22	42:2	30:11
8:13 22:16 43:24	heavy-duty (3)	hundreds (1)	independence (1)
	4:13 34:4 35:16	30:23	32:5
Н	help (7)	Hydrogen (7)	indoor (6)
	7:18 12:4 16:8 23:6	29:14,19,22,24	20:24 21:10 22:12
hand (2)	32:1 33:15 38:22	32:17,18 33:6	23:21 38:13 39:14
13:2 27:9	helpful (2)	hypothetical (1)	industry (1)
handle (1)	12:20 46:21	11:20	32:2
25:2	helping (1)		industry's (1)
handout (1)	42:15	I	31:11
42:20	helps (1)		information (4)
happen (2)	41:24	I-95 (1)	13:23 28:14 33:15
34:19 38:24	HERRON (9)	32:20	38:17
happened (1)	16:17 25:6,9,10,11,	idea (3)	infrastructure (3)
40:20	13 26:2,2 38:8	26:14 37:23 38:2	30:21 32:10 35:2
happening (1)	hey (1)	idea! (1)	innovative (1)
19:13	7:11	10:7	30:3
	high (1)	ideas (1)	input (1)
happens (1)	mgn (1)	1	1 × × ×
<b>happens</b> ( <b>1</b> ) 41:14	9 , ,	7:22	8:9
41:14	38:5	7:22 <b>immediate (1)</b>	8:9 installations (1)
	9 , ,		8:9 installations (1) 30:11

3:8	13:10 14:7 20:2,14	35:11	longer (3)
installing (1)		lease (1)	37:2,11,17
30:23	K	31:5	look (9)
instance (1)		least (4)	5:16 8:15 15:6
18:12	Kathy (1)	7:6 38:18,22,24	19:10 24:20 28:19
intended (1)	43:16	leave (2)	45:19 46:19,22
21:3	keep (2)	10:13,14	looked (1)
intensity (1)	36:5 45:24	leaves (1)	4:6
32:6	Ken (1)	39:17	looking (20)
intent (1)	20:12	legal (1)	4:13,22 5:8,14,21
28:12	key (1)	16:12	7:17,22 8:9 11:24
interested (4)	32:4	less (2)	12:6 16:3,4,7 21:5,9
23:22 24:18 28:15	kind (9)	18:13 19:17	23:23 43:1,6 44:4
43:9	8:15 11:18 12:6	letting (2)	46:19
interesting (4)	24:13 28:6 29:7 31:13	8:24 17:8	looks (2)
22:24 23:4,24 42:6	39:17 43:2	level (1)	17:15 18:22
interrupted (1)	known (1)	34:16	Lorena (1)
41:21	3:4	levels (2)	47:24
intriguing (3)	L	3:3,5	lot (8)
24:18 26:14 42:6	L	light (1)	11:15 16:24 17:19,
Inventory (1)	laid (4)	36:18	23 18:5 24:4 26:5 28:9
4:7	17:15,22,23 21:17	light-duty (2)	
investing (1)	large (5)	4:15 14:18	M
34:24	20:6 26:22 30:13	Liquide (1)	
involve (1)	36:24 46:16	30:4	ma'am (1)
42:14	larger (1)	Listserv (2)	13:3
issue (1)	36:24	5:24 28:13	Macleod (3)
41:22	last (4)	little (6)	29:13,13 33:10
issues (1)	12:13 27:23 32:21	7:4 8:18 23:9 26:13	made (2)
39:18	40:9	39:24 40:14	2:8 45:24
items (1)		live (1)	mailbox (1)
46:1	late (1)	40:3	5:24
	17:9	local (3)	major (1)
J	latest (2) 34:5,8	10:14 14:13 30:16	30:22
	·	locomotive (1)	majority (2)
join (1)	Laughter (4)	35:17	25:14,18
5:24	8:8 10:8,9 17:4	locomotives (1)	make (7)
JONES (3)	Laura (1)	4:14	7:5 10:12 34:18
33:13,13 36:10	30:8	long (1)	44:18 45:5,10 46:2
Justice (4)	leader (1)	15:8	makes (3)

Cara in			
9:8 12:20 37:18	27:17	11	24:16 25:1,19 30:12
making (2)	measure (1)	<b>mind</b> (1)	37:20 40:24 42:18
8:8 42:22	34:1	45:24	43:2
manufactured (1)	meat (1)	miniature (1)	Morgan (2)
34:17	7:12	17:2	43:15,18
manufacturer (1)	mechanism (1)	missed (1)	MOROZOWICH (31)
21:7	28:22	45:12	2:1,5 6:6,13,17,22
manufacturers (1)	medium-duty (1)	missions (1)	7:17 8:4,7 13:3,5,7
29:24	14:12	18:21	14:9,16 20:11 21:1
manufacturing (1)	meet (1)	Mitigation (14)	22:19 24:2,17 25:5,8
35:12	34:9	2:3,16 3:17,21,24	27:9 28:2 29:11 33:12
many (3)	meets (1)	4:18 5:15 6:4 17:24	36:20,23 38:1 42:11
13:18 27:8 46:17	43:7	21:3 31:13 34:2 36:5	44:9 46:23
marine (2)	megawatts (3)	44:5	most (7)
4:14 35:17	30:12,13,16	mix (1)	24:12 33:23 34:5,9,
market (1)	Melvin (7)	46:16	20 35:18 36:2
32:11	24:3,3,23 25:24	mobile (2)	moving (2)
Maryland (5)	26:1,3,18	2:15 21:6	25:15 29:2
24:12 26:4,5,19	Members (2)	model (4)	much (4)
33:20	29:21 30:2	2:23 4:21 16:5,14	17:18 33:11 40:22
match (1)	membrane (2)	modification (2)	43:3
14:21	30:6,7	3:15 39:2	
material (1)	membranes (1)	modify (2)	N
29:23	30:6	3:10 38:21	
materials (1)	mentioned (2)	money (22)	NAACP (1)
28:20	36:13 41:8	3:18 7:13,15,19	20:13
maximized (1)	metrics (1)	8:17 10:16 12:1 15:13	name (14)
33:3	46:19	21:17,20 23:16,18,20	2:9 6:10,14,23 13:5,
maximum (1)	Mid-Atlantic (1)	24:13 27:21 28:6,9,11	7 17:11 22:3 24:2
19:7	6:24	44:5,11,16 45:23	25:8 26:1 27:10 33:13
may (5)	might (9)	monitor (1)	42:11
6:14 19:17 21:14	8:13 11:21 12:5	41:1	named (2)
28:20 44:1	23:5 26:13 37:16 43:3	monitorings (1)	5:10 9:11
maybe (6)	44:16 45:16	40:4	national (4)
23:10 25:16 40:14,	miles (2)	monitors (2)	3:11,13 4:7 27:13
15 44:2 45:12	32:22 33:2	39:22,24	natural (8)
mean (6)	million (14)	months (1)	34:6,8,20 35:7,13,
7:10 19:14 27:15	3:14,21 9:7 12:5	37:8	15 36:2 42:14
28:8 42:20 46:9	24:11 27:7 28:8 35:1,	more (11)	natural-gas-powered (1)
means (1)	2 36:14,17 45:8 46:10,	7:4 14:1 18:13	35:3

nature (1)	non-government (4)	off-highway (1)	27:16 30:3,14
25:15	4:24 15:3,11 17:17	35:17	operation (2)
near (1)	non-profit (2)	official (4)	3:1 31:9
38:8	14:5,7	8:14 12:11,17 13:14	opportunity (2)
near-ZEV (1)	non-road (1)	officially (1)	33:18 42:9
31:19	4:14	8:13	opposed (1)
necessarily (1)	normal (1)	offset (3)	19:15
21:11	3:1	25:3 44:24 45:1	options (3)
necessary (1)	northeast (1)	older (4)	16:24 17:6 42:14
28:4	32:20	6:7,9 34:4,19	orally (1)
need (2)	northeastern (1)	once (6)	14:1
17:21 19:1	31:7	5:9 8:12 9:14,18,23	order (1)
<b>NEI</b> (1)	northern (1)	43:10	44:2
4:6	33:21	one (13)	ordered (2)
neighborhoods (1)	Notary (1)	13:13,16 21:11	44:7,11
25:22	47:24	23:11 28:3,3 34:23	organization (3)
network (1)	note (1)	36:17 37:10,20 42:20	15:24 16:11 28:17
32:19	8:12	46:13,15	organizations (2)
networks (1)	NOx (33)	one-time (1)	14:7 17:17
32:17	2:15 3:4,11 4:2,9	36:16	other (11)
new (4)	11:22,23 19:1,3,8,12,	one-year (2)	7:7 12:2,3 14:3,17
16:13,14,16 34:20	16 22:18,19 33:2,23	37:12,14	23:5 24:13 30:24
Newark (2)	34:1,16,23 36:3 39:12,	on-highway (1)	41:15 42:8 46:21
30:5,5	19 40:8,15,18,19,21	35:17	ought (1)
newer (2)	41:5,18,19 43:7 45:3,	online (1)	10:17
16:5 34:11	14	17:13	out (18)
newest (1)	NOxes (1)	only (4)	8:13 16:10 17:16,
16:15	25:3	24:8 26:8,12 40:22	22,23 18:20 19:7,14,
next (4)	number (5)	on-road (2)	16 21:17 23:15 28:11,
2:17 5:18 29:11	12:24 27:1 29:3	4:13,15	14 36:15 38:22 39:17
32:3	30:12 42:14	open (6)	44:1 45:4
nice (1)		2:17 12:14 19:14,	outside (4)
11:10	О	16 36:5 45:24	12:14 20:23 23:2
nitrogen (6)		operate (2)	40:5
3:3 31:17 40:16	Ocean-going (1)	26:10,12	outweigh (1)
41:2,10,15	14:16	operated (1)	12:3
non-attainment (3)	off (1)	26:16	over (9)
34:12 41:13 46:5	22:11	operates (1)	9:7 12:5 17:22
None (2)	offers (1)	30:4	36:14,24 37:2,11 43:4
41:10 46:23	34:6	operating (3)	46:10

Division of Air Quality			March 25,
overall (1)	people's (1)	plants (1)	26:20
3:23	22:21	41:4	previously (1)
oversight (1)	per (1)	please (6)	27:12
8:18	46:11	2:8,20 13:5,7 25:8	primarily (1)
overstretch (1)	percent (9)	36:8	26:17
26:13	10:1,17 16:8,9,9	pm (1)	primary (1)
own (1)	18:17,18 32:15 38:12	47:1	4:2
26:20	percentage (2)	point (3)	priority (2)
wned (2)	37:21,24	6:11 42:21 45:24	24:8 26:16
15:19 26:9	percentages (2)	points (2)	private-sector-funded (1)
xide (3)	15:12 17:16	24:21 42:20	32:17
31:18 40:16 41:11	performed (1)	pollutants (1)	probably (6)
xides (3)	2:24	41:16	18:1 23:2,22 37:9
3:4 41:2,15	perhaps (1)	pollution (1)	38:6 43:1
zone (4)	23:8	20:5	problem (1)
41:13,13,16,20	period (4)	population (4)	22:21
	27:2 37:1,3 45:14	20:17,18 27:5 46:18	process (5)
P	personal (1)	populations (1)	9:1,3 10:24 12:7
	31:6	4:2	14:23
age (1)	picked (2)	portion (2)	producers (1)
20:15	8:17 28:20	14:6 38:20	29:24
art (3)	picks (1)	possible (3)	produces (1)
14:3 20:21 24:17	41:2	25:19 33:24 46:18	30:6
artial (1)	pie (7)	power (7)	products (2)
5:3	3:19 4:12 11:7 13:1	30:16,18,20,23	35:14,16
articular (2)	18:16 26:20 43:3	35:11,13 41:4	profile (2)
12:3 23:2	piece (1)	PRASAD (16)	18:22 19:4
artner (2)	3:19	17:11,12 18:7,10,	program (3)
23:5,11	Plan (27)	23 19:5,11,21 20:4,8	23:5 35:21 37:13
ast (1)	2:3,16 3:22 4:5,10,	26:19,23 36:11,22	programs (2)
29:5	11,19 5:1,15,20 7:18,	37:4 45:22	7:9 20:23
athway (1)	22 9:10 10:2 17:24	preferably (1)	project (8)
32:4	18:3,14,21 21:3,18	46:5	7:11 8:1,10 16:3
enalty (1)	31:13,22 32:13 36:5,	preference (2)	31:24 32:23 36:6 39:7
45:1	21 44:14,15	32:24 37:16	projects (24)
enny (3)	plans (7)	present (2)	3:11 5:16,21 7:5,10,
13:8 22:5 38:17	8:8 9:20,22 11:21	11:20 14:1	19 8:14,16,17 9:4
eople (4)	31:15 34:2 41:21	presentation (1)	14:22 15:11 31:13
5:19 7:15 19:17	plan's (2)	5:22	33:1 36:24 37:2,11

Division of All Quality			Wiai Cii 23,
17,17	push (1)	32:8 35:16	referring (1)
Prominent (1)	28:13	rather (1)	20:18
30:2	put (9)	24:14	refers (1)
promote (1)	8:1 12:1 13:12	rationale (1)	6:4
32:1	17:24 18:13,16,17	8:16	refueling (2)
Propane (6)	20:23 38:19	read (3)	32:10,17
6:24 7:6 10:1,14,19	putting (3)	17:13 29:15 36:10	region (1)
29:2	46:7,9,15	real (2)	32:20
proposal (5)	_	15:8 22:17	registered (4)
8:24 16:2 17:8	Q	really (3)	26:9 27:2,8 45:14
33:16 42:23		6:2 23:24 41:2	related (1)
proposals (2)	qualifications (1)	rebates (1)	35:14
42:23 46:19	16:5	10:18	replaced (1)
proposed (5)	qualified (2)	receive (3)	4:20
5:14 9:10,20 11:20	2:15 4:18	11:1 39:4 40:1	replacing (3)
36:5	qualifies (1)	receiving (1)	34:4,19 35:23
proton (1)	23:18	43:10	reporter (7)
30:7	qualify (2)	recommends (3)	2:7 6:10 12:18
provide (3)	7:8 21:11	31:23 32:13,21	13:19 22:3 33:8 36:9
16:9 30:16 35:22	quality (8)	record (9)	reports (1)
provided (1)	21:10 22:12 23:21	2:9 6:15 8:12 13:23,	17:9
33:24	31:16 39:14 40:5,8	24 36:10 38:17,19,23	repowered (1)
providers (1)	41:7	recording (1)	4:21
32:18	question (9)	2:7	repowering (1)
provides (1)	6:3 8:20 13:4,11	reduce (6)	35:23
36:2	14:24 21:23 27:23	3:11 34:21 35:3	represent (4)
public (10)	36:11 37:4	41:19,19 45:3	6:24 10:13 14:4
5:13,19 7:24 8:15,	questions (7)	reducing (4)	33:18
24 9:3,6 10:24 11:1	2:18,20 33:6 36:8	28:23 32:5 34:3	representative (2)
47:24	42:8 43:2 46:21	35:9	29:9 30:9
publicly (1)	quite (1)	Reduction (8)	representing (3)
11:13	26:10	15:15 19:8,16 29:4	2:5 13:9 17:12
purchase (2)	D	33:2,23 35:22 46:4	request (6)
16:13 31:5	R	reductions (4)	8:24 10:4 17:8 37:7
purchasing (1)	D 11 (4)	11:22 19:12 31:17	38:19,23
16:4	Rail (1)	34:2	requesting (2)
purpose (1)	30:19	refer (1)	39:3 42:23
28:19	raising (1)	37:5	required (1)
pursue (1)	13:2	reference (1)	5:1
23:8	range (2)	33:22	requirements (6)

Division of the Quality			1/141011 20, 2017
2:14 3:22 18:4	39:23 40:10	selection (2)	18:8
20:15 34:10 35:19	room (3)	31:24 32:23	sharing (1)
requires (1)	5:20 12:15 29:6	self (1)	27:15
34:1	Route (1)	8:1	shed (1)
research (1)	38:10	selling (1)	36:18
30:4	ruling (1)	35:12	shorter (2)
resident (1)	23:15	send (2)	37:1,17
27:14	running (2)	16:1 29:10	<b>shot</b> (1)
Residents (2)	12:14 34:12	sense (7)	36:17
13:9 20:13	rural (1)	9:6,8 12:20 37:18	shown (1)
resource (1)	38:7	44:18 45:5,10	4:16
5:24	g	sent (1)	shows (1)
response (1)	S	10:23	39:19
10:24		service (1)	shut (2)
rest (1)	said (5)	14:17	12:18 27:24
11:18	20:22 38:11 44:17,	services (1)	shuts (1)
restrictive (1)	21 45:6	30:18	12:22
26:11	same (2)	servicing (1)	shuttle (4)
result (1)	19:16 34:16	35:12	14:10 15:20 16:14,
4:4	saying (6)	set (7)	15
resulting (1)	13:12 19:1 21:18,	3:14,15,16 4:23	side (1)
37:23	20 22:13 44:6	15:18 23:2 41:18	33:19
retail (1)	school (9)	setting (1)	signaling (1)
30:24	6:4,9 7:7 10:2	22:10	30:20
return (1)	14:10 18:17 27:17,20	settle (1)	significant (1)
19:7	29:2	3:7	31:16
review (1)	scrappage (1)	settlement (22)	significantly (1)
11:13	4:24	2:12,13,14 3:9,13	3:4
RFP (6)	second (1)	5:3 9:2 11:5 15:6,9,18	similar (2)
17:8 36:15,16	20:21	16:10 18:4,24 19:22	33:14 37:13
37:10,10,17	seeking (5)	21:4 28:16 33:22 34:1	single (3)
RFPs (1)	5:19 9:9 18:11 20:6	37:6 39:2 44:3	40:17 46:12,14
37:12	31:16	seven (1)	sites (2)
rigaramore (1)	seem (1)	14:12	13:14 30:24
16:12	6:8	several (2)	situation (1)
Right (9)	seems (4)	31:7,9	45:15
5:5 15:14 24:23	17:19 28:9 45:16	share (7)	sky (1)
25:23,24 42:24 43:5	46:14	15:11 16:9 17:5,16	11:7
	select (1)		alias (1)
44:12 46:13	,	26:20,22 27:7	slice (1)

slide (2)	sources (3)	stakeholders' (3)	15:10 21:5
6:4 12:13	2:15 14:10 41:14	27:24 28:1,10	story (1)
small (4)	speak (4)	standards (9)	11:18
6:3,11 24:4 46:16	12:15 22:4 33:18	21:8 40:21,24 41:7,	stretched (1)
smaller (2)	39:24	9,11,13,19,21	27:22
37:2,12	SPEAKER (1)	started (1)	stringent (2)
smog-forming (1)	16:21	9:15	34:9 35:18
35:4	speaking (1)	starts (1)	strong (2)
solicited (1)	18:1	12:14	38:19,23
14:6	specific (1)	starved (1)	study (2)
soliciting (1)	25:19	27:21	23:22 42:4
20:1	specifically (2)	state (10)	submit (8)
solution (1)	24:14 25:17	2:8 4:7 21:20 24:4,	5:15 10:4 12:16,24
36:3	specificity (1)	14 27:17 33:23 35:9	42:9,18 43:13,14
solutions (1)	17:19	36:4 39:23	submitted (1)
34:18	spell (1)	state-level (1)	14:22
somebody's (1)	18:20	3:11	submitting (2)
40:13	spelled (1)	statement (3)	9:16,20
somehow (2)	45:4	29:15 33:4 36:10	successfully (1)
8:15 25:17	spend (7)	states (12)	31:12
Someone (4)	9:24 12:5,23 15:13	9:3,15 11:16,20	suggest (1)
12:22 13:2 23:12	44:16,17 45:8	19:23 27:7 30:14 31:7,	10:3
45:17	spending (1)	9 34:1 45:1,6	suggested (1)
something (10)	45:2	State's (1)	11:21
23:1,10,17,21,23	spends (1)	36:4	suggestions (1)
25:2 40:17 41:6 42:7	21:19	stationary (1)	31:21
43:22	spent (11)	30:13	summer (2)
sometime (2)	7:19,21,21 8:10,17	stations (1)	5:16 40:9
5:9 17:9	10:17 19:7 21:17 35:2	10:19	supervisor (1)
soon (1)	44:6 46:4	Stephanie (2)	8:23
31:6	spring (2)	25:10 26:2	supply (2)
sorry (2)	5:9,12	steps (2)	29:21 32:14
6:18 38:18	stab (1)	2:17 5:18	support (3)
sort (8)	37:21	still (1)	3:10 32:11 36:4
7:3,12,15 8:2 10:21	stack (1)	42:1	supports (2)
20:24 39:14 45:16	29:23	stipulate (1)	32:3,10
sorts (1)	stage (2)	11:15	supposed (2)
46:8	42:10,17	stipulated (1)	5:4 11:14
source (1)	stakeholders (1)	9:2	sure (10)
21:6	28:14	stipulates (2)	7:5 8:19 10:12 11:4

Division of Air Quality			March 25, 2017
26:11 27:19 28:5 41:1,	36:12,14 46:10	23:1,4,24 24:23 26:15	27:16
24 42:5	ten-year (1)	28:3 39:23 40:9 45:18	towards (1)
suspend (1)	37:5	46:16,18	35:2
3:6	terms (7)	thinking (1)	towers (1)
sustained (1)	11:16 19:8 27:15	24:10	30:20
31:17	37:10,16 45:22 46:3	Though (1)	trade (1)
swag (1)	test (3)	23:22	29:18
45:16	22:16 39:14,19	thought (1)	transit (1)
switchers (1)	testing (1)	7:3	14:11
14:14	3:2	three (1)	transparent (1)
system (3)	Thanks (1)	37:12	8:15
24:7,15 29:24	6:21	throughout (2)	transport (1)
systems (2)	their (14)	2:20 39:23	31:6
2:24 30:23	9:16 21:14 24:12	throwing (1)	transportation (3)
	25:14,18 27:21 28:18	24:13	27:21 32:6 34:23
T	29:10 31:2 34:1,2,4	tie (1)	traveling (4)
	35:10 39:17	41:2	22:7 25:14,18,20
tailpipe (3)	theme (1)	tied (1)	tried (1)
21:8,9 34:13	19:12	39:17	18:20
talking (3)	there (29)	Tim (2)	truck (3)
23:12 40:15 46:10	3:14 7:3,14 8:2,3,	6:16 27:11	10:19 34:12,16
tax (1)	13 12:16 15:12 16:24	timeframe (1)	trucks (6)
10:17	17:18 20:15,24 21:16	36:12	14:12,13 34:16
teasing (1)	22:17 24:7,15 26:3	timeframes (1)	38:11 40:18 42:16
10:7	27:24 28:1 30:12	16:4	true (1)
technical (1)	38:19,20,23 39:11,13	timeline (2)	16:20
6:3	41:7 45:13,15 46:13	2:17 5:2	trust (7)
technologies (6)	they (39)	today (3)	3:17,21 5:6 6:18
29:20 34:9 35:8,14	3:8,10 4:16 5:4,6	17:21 18:22 42:23	9:12,13,14
36:6 45:3	7:21 9:3 11:19,21	ton (1)	trustee (11)
technology (4)	15:8,18 17:10 20:2	34:23	5:4,5,10 7:14 9:11,
33:7 34:5,7 35:1	21:2,5,7,8 22:10	tonight (10)	19,20,23 10:4 11:14
telecom (1)	24:20 26:4,6,10,21	2:2 9:5,10 10:13,14	37:7
30:19	29:10 39:5,10,14,18,	12:6 13:12,24 29:9	truthfully (1)
telling (2)	19 40:6,19,24 41:16,	46:24	28:8
12:1 26:11	21,22 43:16 44:24	tons (2)	try (2)
tells (4)	45:4,21	35:3,4	21:9 23:9
4:20 11:6 12:13,16	think (18)	total (1)	trying (5)
ten (6)	7:12 8:7 10:16	32:15	8:18 9:5 22:6 26:15
	7.12 6.7 10.16	02.10	

Division of Air Quality			March 23, 201
tugs (2)	23:21 30:15,19	4:15 14:16	wealth (1)
14:14 18:18	used (3)	violated (3)	17:6
two (2)	3:9 14:21 21:2	2:22 11:23 21:8	website (3)
20:15 30:2	users (2)	violating (1)	4:11 15:7 40:3
type (1)	30:1,16	27:3	weighted (2)
25:2	using (1)	violation (7)	24:7,15
types (1)	24:14	37:22 39:11,13,21	what's (2)
36:6	utilities (3)	44:22,24 45:13	17:23 22:17
typically (2)	30:1,15 42:13	violations (1)	whenever (1)
3:4 16:8	utilizing (1)	40:8	11:1
T.	10:4	Virginia (1)	whistles (2)
$\mathbf{U}$	*7	33:21	11:15 16:15
	V	Volkswagen (12)	whole (4)
um (1)		2:3,13,22 3:6 21:7	15:9 28:9,24 39:10
20:24	Vacuum (1)	27:8 28:15 40:20 41:3,	wide (1)
under (4)	12:13	20 44:22 45:15	35:16
2:16 4:19 5:1 7:8	VALENTINO (14)	VW (4)	Wilmington (2)
understand (1)	6:23,24 7:23 8:6,11,	11:22 16:10 33:22	5:6 9:12
32:15	21 10:6,10 11:4,8,11	40:23	wish (1)
understanding (1)	12:7,10,21		8:8
7:2	Valerie (2)	W	within (7)
unfortunate (1)	8:22 41:8		4:16 11:3 15:5,18
29:8	valid (1)	wait (3)	27:17 41:10 45:3
Unfortunately (2)	24:21	6:17 11:18 17:9	Without (1)
38:14 45:11	vehicle (7)	waiting (1)	42:4
UNIDENTIFIED (1)	3:14 4:21 10:19	9:12	wondering (1)
16:21	26:12 40:17,21 41:3	wants (1)	17:20
University (1)	vehicles (48)	21:19	work (8)
17:12	2:23 3:3,9,10,16	warehouses (1)	8:2 17:24 18:21
unless (1)	4:13,15,20 6:4 17:15	31:2	20:6 29:7 31:2 42:6
39:14	21:6 22:7,23 25:13,15,	waste (1)	45:9
up (8)	17,20 26:9,17 27:1,1,	42:16	working (3)
2:18 15:18 27:9,24	4,5,8,16 28:19,23	water (2)	28:23 29:1 35:21
28:10,20 39:19 41:2	29:4 31:4,19,20 32:4,	19:15,17	works (2)
upon (2)	4,7,8,9,11 34:4 35:3,5	way (12)	10:15,21
11:17 19:3	40:21,23 41:18 44:6,	5:23 13:14,16 19:5,	world (1)
urban (2)	11,23 45:3,15	9 21:2,15 22:1 34:21	11:9
19:15,18	versus (3)	39:11,13 46:6	worried (1)
use (7)	12:2 17:17 35:1	ways (2)	, ,
use (1)		• • •	3:18

14:1			
wrong (1)	2	6	
6:19			
<b>\$</b> 7	2006 (1)	6:54 (1)	
Y	6:7	47:1	
	2009 (4)	60 (1)	
year (9)	2:23 6:9,14 27:4	34:15	
2:23 4:21 5:17 6:19,	2010 (1)	7	
20 16:5,14 30:12	34:11	·	
46:11	2014 (1)	<b>75</b> (1)	
years (7)	27:4	16:9	
9:8 12:5 29:5 35:20	2016 (2)	10.5	
36:12,14 46:10	2:24 5:3	9	
year's (1)	235 (1)		
46:13	30:13	9 (2)	
77	25 (2)	28:8 38:10	
${f Z}$	16:8,9	9.7 (1)	
zero (2)	3	4:16	
32:21 38:12	3		
	2 900 (1)		
zero-emission (4)	3,800 (1)		
3:16 31:19 32:4	35:3		
33:1	30 (1)		
ZEV (3)	37:8		
32:3,12,14	30-month (1)		
1	37:6		
	4		
1,200 (1)			
35:4	43 (1)		
100 (1)	30:14		
10:1			
12 (2)	5		
42:19,20			
15 (1)	50 (2)		
32:15	18:17,18		
1988 (1)	580,000 (1)		
34:17	2:23		
1992 (1)			
6:14			
0.17			