



April 20, 2011

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Columbus, Ohio 43216-1049

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RE: 1997 Annual PM_{2.5} Standard Redesignation Request Proposal for Central Ohio Nonattainment

Dear Ms. Prado:

The Mid-Ohio Regional Planning Commission (MORPC) is a voluntary association of over 40 local governments in central Ohio. Our members recognize the importance of clean air and how it impacts the quality of life in the region. Most importantly, we want to ensure that central Ohio maintains healthy air quality levels. As you know, according to U.S. EPA exposure to fine particulate matter (PM_{2.5}) can lead to a variety of short and long-term health effects, including triggering asthma and heart attacks, arrhythmias, increased susceptibility to respiratory infections, reduced lung function, the development of chronic bronchitis and even premature death. Furthermore, if our region does not continue to work diligently to manage air pollution, it could adversely impact our ability to attract and retain businesses.

We believe Ohio EPA has demonstrated attainment of the 1997 Annual PM_{2.5} National Ambient Air Quality Standard in the central Ohio area (Coshocton, Delaware, Fairfield, Franklin, and Licking counties) and strongly support the agency's request for redesignation to attainment. We would like to ensure the Mobile Vehicle Emission Budgets outlined in the document provide adequate margin to allow the region to demonstrate transportation conformity as required by federal regulations. We believe the 15 percent increase in the 2015 and 2022 projections for the mobile emissions budget is adequate for these purposes. Finally, we support the procedures outlined in the Contingency Plan as reasonable measures to proactively address potential future PM_{2.5} levels above of the standard.

MORPC will continue to do its part to reduce PM_{2.5} emissions at the local level by promoting Travel Demand Management programs, such as transit, vanpooling and carpooling, and working with diesel fleets to install emission-control technology. We will also continue to fund and administer a regional Air Quality Awareness Program, including daily air quality forecasts for the public.

Sincerely,

Chester R. Jourdan, Jr.
Executive Director

Derrick R. Clay
Chair

Marlyn Brown
Vice Chair

Eric S. Phillips
Secretary

Chester R. Jourdan, Jr.
Executive Director

April 21, 2011

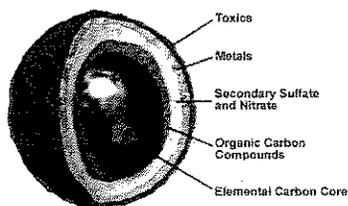
Ohio Environmental Council's Comments on Proposed redesignation of central Ohio in meeting the 1997 national fine particulate matter standard

The Ohio Environmental Council (OEC) is a statewide, nonprofit environmental organization whose mission is to secure healthy air, land, and water for all who call Ohio home. On behalf of our over 100 environmental and conservation member organizations and thousands of members throughout the state of Ohio, the Ohio Environmental Council respectfully submits the following comments on the proposed redesignation of central Ohio in meeting the 1997 PM 2.5 standard.

Particulate matter comes from a variety of sources: cars, diesel trucks, diesel buses, planes, trains, and heavy duty construction equipment. These emissions are from a variety of sectors. It is our understanding that the 2009 Statewide Annual Emission Inventory used the U.S. EPA's Mobile 6.2 model. More recently-2010-the U.S. EPA revamped the model to add more variables and has changed the model to MOVES.

In Franklin County estimates for 2015 from the non road contribution of PM 2.5 are 486.25 tons and the on road contributing 352.28 tons. Together, these two sectors contribute the majority of PM 2.5. One major source of PM 2.5 is diesel engines. Diesel exhaust contains formaldehyde, benzene, volatile organic compounds, particulate matter, nitrogen oxides, and more 40 known air toxins. Below is a simplified diesel particle.

Diesel Particle

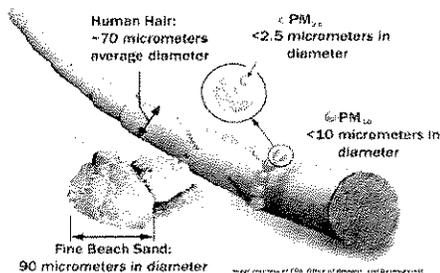


Diesel particles are carbon at their core with toxins and carcinogenic substances attached to their surfaces.

(Source: CATF)

This deadly stew is 3 times higher than the combined total cancer risk from all other air toxics.

PM 2.5 is a serious problem in Ohio. PM 2.5 is 1/30th the width of a human hair and when breathed, bypasses the body's natural defenses to get lodged in the lungs or go into the blood stream. Below is a graph demonstrating PM 2.5's small size:



The width of a human hair is 30 times larger than the smallest fine particle.

This pollutant can contribute to asthma attacks, heart and lung disease, respiratory-related hospital visits and preventable death.

The Clean Air Task Force, from an analysis by ABT Associates using U.S. EPA-based methodology, projects that 2010 saw the following health impacts (in the U.S.):

Adults

21,000 Premature Deaths
27,000 Non-Fatal Heart Attacks
410,000 Asthma Attacks
12,000 Chronic Bronchitis
2,400,000 Work Loss Days (WLD)
14,000,000 Minor Restricted Activity Days (MRAD)

Children

15,000 Asthma ER Visits
29,000 Acute Bronchitis
330,000 Lower Respiratory Symptoms
270,000 Upper Respiratory Symptoms

The annual number of deaths associated with diesel pollution is more than drunk driving, firearm homicide, HIV/AIDS and workplace deaths-see below.

2nd hand smoke: 38,000
Power Plant Emissions: 24,000
Diesel soot: 21,000
Drunk driving: 17,000
Firearm homicide: 11,000
HIV/AIDS: 9,000
Workplace: 5,000

(Source: Clean Air Task Force)

Additionally, fine particles from diesel engines impact central Ohioans' health:

84 Premature Deaths
118 Non-Fatal Heart Attacks
3,018 Asthma Attacks
57 Chronic Bronchitis
12,772 Work Loss Days (WLD)
74,055 Minor Restricted Activity Days (MRAD)

The lifetime cancer risk from diesel soot in Franklin County is 223 times greater than the EPA's acceptable cancer level of 1 in a million.

Furthermore, asthma, occurrences of which often are tied to poor air quality, is the most frequent admitting diagnosis at Nationwide Children's Hospital. Franklin County has 16.5% of children diagnosed with asthma- that is higher than the state average of 15.4% and the federal average of 14%.

Below are a few of the many studies that have looked at the deadly toll from diesel emissions:

- A 2009 OSU College of Public Health (Dr. Sun) study revealed exposure to diesel exhaust increases angiogenesis and vasculogenesis-one of the fundamental mechanisms for solid tumor growth.
- A 2004 study of highway patrol officers exposed over a shift, particulate matter was linked to irregular heartbeats and increases in blood inflammatory markers (source: Particulate matter exposure in cars is associated with cardiovascular effects in healthy young men; American Journal of Respiratory and Critical Care Medicine, v. 169, p. 934-940)
- A 2007 Harvard study of 54,000 workers in the trucking industry found a higher risk in heart disease in the trucking industry compared to the general U.S. population: a 49% higher risk in drivers, a 32% higher risk in dock workers, and a 34% higher risk in shop workers (source: Cause-specific mortality in the trucking industry. Environmental Health Perspectives, v. 115, no. 8. p. 1192-1196)
- A 2010 study correlates prenatal freeway traffic proximity in California and incidence of autism. The risk of autism is nearly double (86% increase) inside 1,000 feet. Diesel exhaust could be a risk factor. (source: Health effects of real-world exposure to diesel exhaust in persons with asthma. Res Rep Health Eff Inst. 2009 Feb; (138): 5-109; discussion 111-23).
- Case control study (pub. American Journal of Industrial Medicine) 2001, 50% excess risk of colon cancer in men related to exposure to diesel engine emissions.
- CARB School Bus Exposure Study (2003)-“self pollution” is a source of exposure; Increased child’s lifetime cancer risk due to diesel PM by 4%.
- Yale Study (Feb 2002)-Children’s exposure to PM on school buses is as much as 5-15 times higher than background levels [on buses not retrofitted with emission controls].

The monetized value of health impacts from diesel soot in Ohio are projected at \$5.1 billion a year.

Moreover, there are environmental damages particle polluting causes to our already impacted wetlands, streams, wildlife, and climate. Black carbon is a basis for particulate matter. Studies have revealed that black carbon is about 2,000 times more potent a greenhouse gas than carbon dioxide over a 20 year period. According to the U.S. EPA over 37% of land-based PM in the U.S. comes from construction equipment. Additionally, diesel emissions contribute to the deadening of our waterways, smog, and crop damage.

The Agency projects that PM 2.5 emissions from on-road mobile sources will drop from 968.60 tons in 2008 to 486.25 in 2015. The Agency incorporated a 15% margin of safety when coming up with the projected numbers. The agency states a 15% margin of safety is justified because the variation in VMT forecast; expected modifications to TDM and mobile emission models and total decrease in emissions from all sources.

Several questions remain: did the modeling take into account the economic recession when not as many new trucks may have been purchased/used on the road? Did it take into account the possibility that not as many construction projects occurred over the three year span? Did the modeling over emphasis the 2007 on road diesel emission rule and its impact? Did the model take into account the anti-module transportation option environment we now face? Did the model take into account the growing trend of using outdoor wood fired boilers (which contribute to PM 2.5 emission)?

The Ohio EPA and many groups in Ohio, including OEC, have made great strides in cleaning the air. But we should not rest on our laurels. No doubt the air is cleaner than it was before but the real question is has state

government done enough? We know that the full health benefits from the onroad and nonroad diesel clean up regulations won't be felt for another 20-30 years. In the meantime 11-12 million existing diesel engines continue to turn out the deadly pollutants. Maybe 1 million or 1.5 million have been cleaned up; but that still leaves a substantial number of dirty diesel engines out there.

If accepted, the redesignation took us more than 14 years to meet the standard. As we move forward we can't afford to wait another 14 years to meet any newer standard that may come out. We must do everything feasible to achieve maximum reductions in diesel pollution.

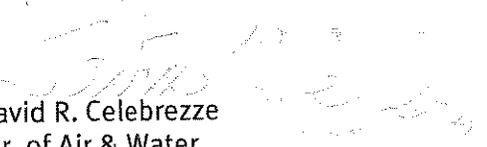
Additional steps the Ohio EPA and state government can take to reduce the death toll from diesel engines:

- *Fund the Diesel Emission Reduction Grant program in the amount of \$20 million a year;
- *Adopt clean construction requirements on all public works projects that require 85% or more reduction in pollution from the construction vehicles;
- *Adopt a no-idling law with no more than idling for 5 minutes in a 60 minute time frame with few exceptions;
- *Adopt an E-check-like program for on road diesel trucks;
- * (Re)invest in Truck Stop Electrification; and
- *Develop a low/no interest program that targets tier zero construction vehicles to be replaced with tier 3 or 4.

Additionally, adopt strong rules regulating the OWB menace.

In short, we need the Kasich Administration and the General Assembly to step up and make Ohio a leader in the Midwest instead of a laggard when it comes to cleaning up poor air quality. We know that every dollar invested in diesel cleanup yields anywhere from \$12 to \$20 in health care savings. The days of dirty, deadly, diesel emissions are numbered, let's put the final nail in the coffin by adopting strong measures that protect the public's health. Thank you again for this opportunity to comment on this important issue.

Sincerely,


David R. Celebrezze
Dir. of Air & Water
Special Projects

April 21, 2011

Verbal Testimony of David R. Celebrezze, OEC

Thank you for this opportunity to submit comments on the Ohio EPA's request to U.S. EPA that central Ohio be redesignated as meeting the 1997 national fine particulate matter standard. I will submit more detailed comments in my written testimony.

The Ohio Environmental Council (OEC) is a statewide, nonprofit environmental organization whose mission is to secure healthy air, land, and water for all who call Ohio home. We have thousands of individual members and more than 100 environmental and conservation member organizations.

Particulate matter comes from a variety of sources: cars, trucks, buses, planes, trains, and heavy duty construction equipment. These emissions are from a variety of sectors.

One major source of PM 2.5 is diesel engines. Diesel exhaust contains formaldehyde, benzene, volatile organic compounds, particulate matter, nitrogen oxides, and more 40 known air toxins.

This deadly stew is 3 times higher than the combined total cancer risk from all other air toxins.

PM 2.5 is a serious problem in Ohio. It is 1/30th the width of a human hair and when breathed, bypasses the body's natural defenses to get lodged in the lungs or go into the blood stream

This pollutant can contribute to asthma attacks, heart and lung disease, respiratory-related hospital visits and preventable death.

The Clean Air Task Force, using U.S. EPA-based methodology, projects that 2010 saw the following health impacts (in the U.S.):

Adults

21,000 Premature Deaths
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The annual number of deaths associated with diesel pollution is more than drunk driving, firearm homicide, HIV/AIDS and workplace deaths.

Additionally, fine particles from diesel engines impact central Ohioans' health:

84 Preventable Deaths
118 Non-Fatal Heart Attacks
3,018 Asthma Attacks

The lifetime cancer risk from diesel soot in Franklin County is 223 times greater than the EPA's acceptable cancer level of 1 in a million.

The monetized value of health impacts from diesel soot in Ohio is projected at \$5.1 billion a year.

Moreover, studies have revealed that black carbon is about 2,000 times more potent a greenhouse gas than CO₂ over a 20 year period. According to the U.S. EPA over 37% of land-based PM in the U.S. comes from construction equipment.

The OEPA estimates that PM 2.5 emissions from on-road mobile sources will drop from 968.60 tons in 2008 to 486.25 in 2015.

Several questions should be addressed if they have not already: did the modeling take into account the economic recession when not as many new trucks may have been purchased or used on the road? Did it take into account the possibility that not as many construction projects occurred over the three year span? Did the modeling over emphasize the 2007 on road diesel emission rule and its impact? Did the model take into account the anti-module transportation option environment we are now in? Did the model take into account the growing trend of using outdoor wood fired boilers which contributes to PM 2.5 emissions)?

The Ohio EPA and many groups in Ohio, including OEC, have made great strides in cleaning the air. But we should not rest on our laurels. No doubt the air is cleaner than it was before but the real question is has state government done enough? We know that the full health benefits from the U.S. EPA onroad and nonroad diesel clean up regulations won't be felt for another 20-30 years. In the meantime 11-12 million existing diesel engines continue to turn out the deadly pollutants. Maybe 1 million or 1.5 million have been cleaned up; but that still leaves a substantial number of dirty diesel engines out there.

If accepted, the redesignation took us more than 14 years to meet the standard. As we move forward we can't afford to wait another 14 years to meet any newer standard that may come out. We must do everything feasible to achieve maximum reductions in diesel pollution.

Additional steps the Ohio EPA and state government can take to reduce the death toll from diesel engines:

- *Fund the Diesel Emission Reduction Grant program in the amount of \$20 million a year;
- *Adopt clean construction requirements on all public works projects which would require 85% or more reduction in pollution from the construction vehicles;
- *Adopt a no-idling law with no more idling than 5 minutes in a 60 minute time frame with few exceptions;
- *Adopt an E-check-like program for on road diesel trucks;
- * (Re)invest in Truck Stop Electrification; and
- *Develop a low/no interest program that targets tier zero construction vehicles to be replaced with tier 3 or 4.

Additionally, adopt strong rules regulating the OWB menace.

In short, we need the Kasich Administration and the General Assembly to step up and make Ohio a leader in the Midwest instead of a laggard when it comes to cleaning up poor air quality. We know that every dollar invested in diesel cleanup yields anywhere from \$12 to \$20 in health care savings. The days of dirty, deadly, diesel emissions are numbered, let's put the final nail in the coffin by adopting strong measures that protect the public's health. Thank you again for this opportunity to comment on this important issue.

Sincerely,


David R. Celebrezze
Dir. of Air & Water Special Projects

BEFORE THE OHIO EPA

- - -

IN RE: :

:

Currently Air Quality Designation :

- - -

Public Hearing before Moderator

Kristopher Weiss, taken at the Ohio Environmental Protection Agency, 50 West Town Street, 6th Floor Conference Room A, Columbus, Ohio at 1:30 p.m. on April 21, 2011.

- - -

1 P-R-O-C-E-E-D-I-N-G-S

2 - - -

3 MODERATOR WEISS: My name is Kristopher
4 Weiss. I'm a public involvement coordinator in
5 the Ohio EPA's Public Interest Center, and I'll
6 moderate today's public hearing. Thank you for
7 taking the time to attend.

8 The purpose of the hearing today is to
9 get comments from any interested person regarding
10 Ohio EPA's request that the U.S. EPA revise the
11 current air quality designation for the Columbus
12 area, which includes Coshocton, Delaware,
13 Fairfield, Franklin, and Licking Counties, with
14 respect to the 1997 annual PM 2.5 national
15 ambient air quality standard, or NAAQS.

16 Air quality monitoring data collected
17 between 2008 and 2010 in the region demonstrate
18 attainment of the NAAQS, and there's evidence
19 that the improved air quality is due to permanent
20 enforceable emission reductions.

21 All interested persons are entitled to
22 attend or be represented and to present oral
23 and/or written comments concerning the standard.
24 All written and oral comments received as part of

1 the official record will be considered by the
2 director of Ohio EPA.

3 To be included in the official record,
4 written comments must be received by Ohio EPA by
5 the close of business today, which is April 21,
6 2011. Comments may be filed with me today, and
7 they may also be e-mailed to
8 carolina.prado@epa.state.oh.us. That's
9 C-A-R-O-L-I-N-A, dot, P-R-A-D-O, at EPA, dot,
10 state, dot, O-H, dot, U-S.

11 All written comments submitted for the
12 record receive the same consideration as oral
13 testimony given today. Written statements may be
14 submitted -- written statements submitted after
15 today may be considered as time and circumstances
16 allow but will not be part of the official record
17 for this hearing.

18 If you wish to present oral testimony
19 and have not already signed the registration
20 sheet, please do so now. People will be called
21 to testify in the order in which they have
22 registered.

23 There is no cross-examination of
24 speakers or of representatives of the Ohio EPA in

1 public hearings of this type. Ohio EPA hearings
2 such as this afford citizens the opportunity to
3 provide comments on the official record; and,
4 therefore, we will not be able to answer
5 questions during the hearing.

6 That said, members of the panel may ask
7 clarifying questions of the person testifying to
8 ensure the record is as complete and accurate as
9 possible.

10 I'll now read the names of those who
11 have registered at this hearing and give each
12 person an opportunity to testify.

13 That would be David Celebrezze of the
14 OEC.

15 MR. CELEBREZZE: Thank you for this
16 opportunity to submit comments on the Ohio EPA's
17 request to U.S. EPA that central Ohio be
18 designated as meeting the 1997 national fine
19 particulate matter standard. I will submit more
20 detailed comments in my written testimony.

21 The OEC is a statewide non-profit
22 organizations whose mission is to secure healthy
23 air, land, and water for all those who call Ohio
24 home. We have thousands of individual members

1 and more than 100 environmental and conservation
2 member organizations.

3 Particulate matter comes from a variety
4 of sources: cars, trucks, buses, planes, trains,
5 and heavy-duty construction equipment. These
6 emissions are from a variety of sectors.

7 One major source of PM 2.5 is diesel
8 engines. Diesel exhaust contains formaldehyde,
9 benzene, volatile organic compounds, particulate
10 matter, nitrogen oxides, and more than 40 known
11 air toxins. This deadly stew is three times
12 higher than the combined total cancer risk from
13 all other toxics.

14 PM 2.5 is a serious problem in Ohio.
15 It's 1/30th the width of a human hair and, when
16 breathed, bypasses the body's natural defenses to
17 get lodged in the lungs or go into the
18 bloodstream. This pollutant can contribute to
19 asthma attacks, heart and lung disease,
20 respiratory-related hospital visits, and
21 preventable death.

22 The Clean Air Task Force, using U.S
23 EPA-based methodology, projects that 2010 saw the
24 following health impacts in the U.S.:

1 21,000 premature deaths, 27,000
2 non-fatal heart attacks, 410,000 asthma attacks.
3 In children those numbers are 15,000 asthma ER
4 visits and 29,000 acute bronchitis instances.

5 The annual number of deaths associated
6 with diesel pollution is more than drunk driving,
7 firearm homicide, HIV/AIDS, and workplace deaths.
8 Additionally, fine particles from diesel engines
9 impact central Ohioans' health: 84 preventable
10 deaths, 118 non-fatal heart attacks, and 3,019
11 asthma attacks.

12 The lifetime cancer risk from diesel
13 soot in Franklin County is 223 times greater than
14 the EPA's acceptable cancer level of one in a
15 million.

16 The monetized value of health impacts
17 from diesel soot in Ohio is projected at \$5.1
18 billion a year.

19 Moreover, studies have revealed that
20 black carbon from diesel emissions is about 2,000
21 times more potent than greenhouse gas and CO2
22 over a 20-year period. According to the U.S EPA,
23 over 37 percent of land-based PM in the US comes
24 from construction equipment.

1 The Ohio EPA estimates that PM 2.5
2 emissions from on-road mobile sources will drop
3 from 968.6 tons in 2008 to 486.25 in 2015.

4 Several questions should be addressed if
5 they have not already. Did the modeling take
6 into account the economic recession when not as
7 many new trucks may have been purchased or used
8 on the road? Did it take into account the
9 possibility that not as many construction
10 projects occurred over the three-year span? Did
11 the modeling overemphasize the 2007 on-road
12 diesel emissions rule and its impact? Did the
13 modeling take into account the anti-module
14 transportation option environment we are now in?
15 Did the model take into account the growing trend
16 in using outdoor wood-fired boilers which
17 contributes to PM 2.5 emissions?

18 The Ohio EPA and many groups in Ohio,
19 including the OEC, have made great strides in
20 cleaning the air, but we should not rest on our
21 laurels. No doubt the air is cleaner than it was
22 before, but the real question is has state
23 government done enough?

24 We know that the full health impacts --

1 the full health benefits from the U.S. EPA
2 on-road and non-road diesel cleanup regulations
3 won't be felt for another 20 to 30 years. In the
4 meantime, 11 to 12 million existing diesel
5 engines continue to turn out the deadly
6 pollutants. Maybe 1 million or 1.5 million have
7 been cleaned up, but that still leaves a
8 substantial number of dirty diesel engines out
9 there.

10 If accepted, the redesignation took us
11 more than 14 years to meet the standard. As we
12 move forward, we can't afford to wait another 14
13 years to meet any newer standard that may come
14 out. We must do everything feasible to achieve
15 maximum reductions in diesel pollution.

16 Additional steps the Ohio EPA and state
17 government can take to reduce the death toll from
18 diesel engines: One, fund the Diesel Emission
19 Reduction Grant program in the amount of \$20
20 million a year; adopt clean construction
21 requirements on all public works projects, which
22 would require 85 percent or more reductions in
23 pollution from construction vehicles; adopt a
24 no-idling law with no more than five minutes of

1 idling in a sixty-minute time frame with few
2 exceptions; adopt an E-check-like program for
3 on-road diesel trucks; reinvest in truck stop
4 electrification; and develop a low/no interest
5 loan program that targets Tier 0 construction
6 vehicles to be replaced with Tier 3 or Tier 4.
7 Additionally, adopt strong rules regulating the
8 outdoor wood-fired menace.

9 Some entities say that regulations kill
10 jobs, but weak or no regulations kill people.
11 In short, we need the Kasich Administration to
12 step up and make Ohio a leader in the Midwest
13 instead of a laggard when it comes to cleaning up
14 poor air quality. We know that every dollar
15 invested in diesel cleanup yields anywhere from
16 \$12 to \$20 in health care savings. The days of
17 dirty, deadly diesel emissions are numbered.
18 Let's put the final nail in the coffin by
19 adopting strong measures that protect the
20 public's health.

21 Thank you again for the opportunity to
22 comment on this important issue.

23 MODERATOR WEISS: Thanks, very much.
24 Appreciate it.

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C E R T I F I C A T E

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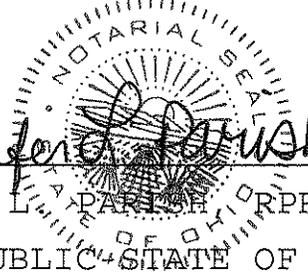
STATE OF OHIO :

SS:

COUNTY OF FRANKLIN :

I, Jennifer L. Parish, Registered Professional Reporter and Notary Public in the State of Ohio, do hereby certify that the foregoing is a true, correct, and complete transcript of the proceedings in the matter before the Ohio EPA as reported by me in stenotype and transcribed from my stenographic notes.

DATED this 12th day of May, 2011.


Jennifer L. Parish (smnt)
JENNIFER L. PARISH RPR
NOTARY PUBLIC STATE OF OHIO

My Commission Expires: November 23, 2014.