



December 18, 2006

David W. Garg, P.E., Permits Chief
Pennsylvania Department of Environmental Protection
Northcentral Regional Office
Waste Management Program
208 West Third Street, Suite 101
Williamsport, PA 17701-6448

RE: Resource Recovery, LLC Permit Application

Dear Mr. Garg:

People Protecting Communities (PPC) has identified numerous conflicts and harms with regards to the Resource Recovery, LLC (RRLC) permit application for a municipal waste landfill in addition to the three issues (i.e., Land Use Conflict, Exaggerated Benefits Claimed, and Request for a 25-Year Permit) which we identified in our first submission to DEP dated September 3, 2006 (copy enclosed).

First and foremost, we want to reiterate our position that immediately upon beginning review of the RRLF application that you refer the application to the DEP Policy Office per DEP Policy ID No. 012-0200-001 and request it be rejected due to the obvious conflict with land use. Second, we ask that the 25-term permit request be denied. As stated in our earlier document, an extended permit term should not be considered for a company that has never constructed, owned, or operated a landfill. Third, RRLC's greatly exaggerated benefits claim needs to be rejected and replaced with realistic, objective, and defensible numbers in order to start a meaningful Benefits-Harms Analysis. In the following attachment we reject their harms analysis as trivial and show in many ways that their proposed site is inappropriate for a landfill.

Please note the comments contained within this document and our September 3, 2006 letter will not be our only submission with regards to the review of the RRLC permit application. PPC reserves the right to submit further public comment, testimony, criticisms, responses, make requests, initiate actions, and otherwise participate in this permitting review process. We do not want this document to be considered our only or final response.

In the attachment we address the following issues:

- I. Act 101, Section 507, Relationship between Plans and Permits**
- II. Harms Generated by the Proposed Landfill**
- III. Environmental and Social Injustice**

The comments contained in this letter were authored by Michele L. Barbin, Terri Burbidge, Suzanne Bierley, JoAnn Gillette, Harry Pionke, Michael Savage, and Jenn Shufran and include the input and analysis from the other PPC Application Review Committee members.

We would appreciate your careful consideration of these issues during your review of the Harms-Benefits phase of the Resource Recovery Landfill (RRLF) permit application.

When the benefits of the proposed RRLF are reduced to sensible numbers and all harms are recognized and elevated to a realistic status, it is obvious the harms of the proposed RRLF far outweigh the true benefits. We urge denial of the RRLF application.

Sincerely,

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cc: Secretary Kathleen McGinty
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Kevin Kline, PennDOT District 2-0
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Nathan P. Havens, Pennsylvania Game Commission
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Robert Jacobs, Centre County Community Development and Planning Office
Ted Onufrak, Centre County Solid Waste Authority
Rodney Preslovich, Snow Shoe Township Supervisors
Cooper Township Supervisors

I. Act 101, Section 507, Relationship between Plans and Permits

The RRLF application does not meet the requirements of Act 101, the Municipal Waste Planning, Recycling and Waste Reduction Act, Section 507. The Applicant must meet one of the following tests (1 or 2) in order to be considered for a municipal waste permit per this regulation:

- (a) **LIMITATION ON PERMIT ISSUANCE.— After the date of submission to the department of all executed ordinances, contracts or other requirements under section 513, the department shall not issue any permit, or any permit that results in additional capacity, for a municipal waste landfill or resource recovery facility under the Solid Waste Management Act, in the county unless the Applicant demonstrates to the department’s satisfaction that the proposed facility:**

- (1) **is provided for in the plan for the county; or**

The RRLF is not provided for in the Centre County Solid Waste Management plan. A minor revision to the plan was approved this year (2006) which provides adequate capacity for Centre County until 2013 with an additional five-year option. The RRLF was not included in the original plan and is not included in the revision; therefore, the Applicant must satisfy the following four requirements of section 2.

- (2) **meets all of the following requirements:**

- (i) **The proposed facility will not interfere with implementation of the approved plan.**

This facility, if approved, will interfere with Centre County’s approved solid waste management plan. The Centre County Solid Waste Authority (CCSWA), the delegated authority to manage the plan for the County, has stated in their July 13, 2006, letter to DEP that, “This Authority believes the proposed landfill will significantly and adversely affect the economic position of our Authority and will jeopardize existing recycling programs, and potentially cause increased costs for implementing our waste management program in other parts of Centre County.”

- (ii) **The proposed facility will not interfere with municipal waste collection, storage, transportation, processing or disposal in the host county.**

The Rush Township Host Agreement and the Snow Shoe Township Cooperation Agreement (SSTCA) both state that RRLLC will provide: “Residential trash disposal in the landfill without charge by Resource for its portion of the tipping fees from bona fide Township (and Snow Shoe Borough per the SSTCA) residents.” Because it will be less expensive, local haulers will take trash collected from township and borough residents to the landfill instead of to CCSWA facilities. This will reduce revenue to the Authority, and, as noted in their July 13, 2006, letter will be detrimental to the Centre County recycling and other programs. Centre County currently enjoys a 57% recycling rate due primarily to the efforts of the CCSWA.

Haulers for the other Centre County municipalities may choose the RRLF instead of the designated Authority facilities if tipping fees are lower. In its July 13, 2006, letter the Authority notes:

The CCSWA does not believe there is a need for additional disposal capacity, as presented by Resource Recovery during the LMIP meeting. The CCSWA has guaranteed disposal capacity for all of Centre County until 2013 (under contract) with an option for guaranteed capacity until 2018. Furthermore, both the Wayne Township Landfill (also under contract with CCSWA) and the Lycoming County Landfill are considering expansions for their respective facilities.

The CCSWA Plan clearly discourages the use of alternate sites for disposal. The current system in which 90% of the municipal waste collected in Centre County goes to the CCSWA Transfer Station is crucial to the economy and efficiency of their operation. Competition from an additional site will dilute the importance of this centralized facility and inevitably be economically harmful to the Authority.

(iii) The proposed location of the facility is at least as suitable as alternative locations giving consideration to environmental and economic factors.

The proposed site IS NOT as suitable as alternative locations when you give consideration to environmental and economic factors. The site is a greenfield located in the midst of a fast growing outdoor recreation area. This area is at the gateway to the Pennsylvania Wilds, a major ecotourism initiative of the Rendell Administration. Any industrial development is contrary to the current and future planned land use of the area. The unique, popular Snow Shoe Rail Trail traverses the site; unique historic structures are located on the site; two large seasonal subdivisions are within close proximity; an outdoor archery range is nearby; the site lies between two Important Bird Areas (IBAs); there are significant amounts of wetlands located on the parcel; seven leased hunting camps are located on the parcel; the popular Black Moshannon Creek flows through the property; the site is adjacent to the Moshannon State Forest; and according to Centre County assessment records, 5,200 acres of the 5,800-acre site are forested.

There is already adequate capacity for central Pennsylvania and landfill expansions planned for nearby facilities such as the Wayne Township Landfill, approximately 40 miles east of the proposed RRLC site and Greentree Landfill (encompassing approximately 3,000 acres), 40 miles west of the proposed RRLF—both accessible by I-80.

The RRLF site is not located near any large cities. It would be more economical and environmentally defensible to expand the existing landfills already servicing the south, northeast, southeast, and larger population areas. Much less energy would be consumed in transporting waste if landfills are located closer to the waste source. Likewise, energy produced by a landfill located near large metropolitan areas would already have a market and be more profitable.

Please refer to **Section II. Harms Generated by the Proposed Landfill** for additional reasons why this site is not as suitable as alternative locations.

(iv) The governing body of the proposed host county has received written notice of the proposed facility from the Applicant pursuant to section 504 of the Solid Waste Management Act and, within 60 days from such notification, the governing body of the proposed host county has not provided the department with written objections to the proposed facility. Should the governing body of the proposed host county file timely objections to the department, the department shall not approve the permit application, unless the department determines the proposed facility complies with the appropriate environmental, public health and safety requirements and is in compliance with this paragraph.

Both the CCSWA (July 13, 2006) and the Centre County Community Planning and Development Office (June 30, 2006) have filed objections to the RRLF proposal.

(b) EXEMPTION—This section shall not impose any limitation on the department's authority to issue a permit in a county prior to the department's approval of a municipal waste management plan for the county under this act.

The Exemption does not apply. The Department has approved a municipal waste management plan for Centre County.

II. Harms Generated by the Proposed Landfill

A. Waste Hauling Trucks

1. Lack of Appropriate Access and the RRLLC I-80 Interchange Proposal

The proposed site is not an appropriate location for a landfill. There is no adequate access to support the large volume of trash truck traffic projected to import the proposed 5,000 tons of trash per day to this remote location (500 trucks per day). RRLLC's solution to this problem is to construct a new I-80 Interchange. Therefore, the proposed I-80 Interchange is key to the efficacy of the landfill proposal.

Approval of a new interchange to the federal highway system is a lengthy process. There is no guarantee that RRLLC will be able to secure this Interchange, particularly given the fact there is no other need for an additional Interchange in this rural, undeveloped area. Although RRLLC began the process of trying to obtain approval for the I-80 Interchange in August 2004, they still have not been able to satisfy the Federal Highway Administration requirements for adding a new Interchange to the federal highway system. Some of these problems regarding FHWA approval for the proposed Interchange were identified in our September 2006 comments and were also raised by DEP in its October 2, 2006, letter and cited as a basis for suspension of the application review.

RRLLC recently provided additional information to DEP with regards to the Point of Access study required for the proposed Interchange. Although RRLLC's agent, Rettew Associates, interprets the PennDOT District 2-0 letter of December 1, 2006, as approval for the I-80 Interchange, it merely states the proposed Interchange has met PennDOT design criteria. Rettew's estimate of 15–18 months for FHWA review and approval is very optimistic in view of that fact the proposed Interchange is not included as an approved project for the recently adopted Centre County Long Range Transportation 2030 (LRTP2030) and remains inconsistent with Centre County's Comprehensive Plan. Any request to change the current LRTP2030 would result in a lengthy process requiring public meetings, hearings, and an air quality conformity analysis, and the inconsistency with local land use is virtually irresolvable.

Even if approved, the I-80 Interchange access will not resolve all traffic harms. According to data in the application there will be 250 one-way trips per 24-hour day. This means there will be 500 round trips since the trucks will be deadheading back after dumping their load. This is a very large number of trucks concentrated on a very small section of I-80.

Adding the proposed Interchange will add to existing traffic congestion and create backups on this section of I-80. The proposed Interchange is midway between two existing exits, which are approximately 14 miles apart. In traffic engineering, it is a well-understood principle that the most dangerous parts of any highway system are ingress and egress. This will add such points at exactly the wrong places, where trucks are either decelerating to exit I-80, or accelerating to enter the roadway, which will seriously endanger the regular traffic flow. Mixing truck traffic and passenger cars in such a concentrated area will heighten the potential for accidents.

2. Access by Local Roads—General

The RRLF site is not an appropriate site for a landfill. Impacts to local road use will be forced upon a citizenry (Snow Shoe Township) that is adamantly opposed to the landfill proposal.

A review of Attachment D-1, section J, pages 18 through 21 of the Form D Narrative Discussion documents reference to "Approach Route 1" (Gorton Road from I-80) and "Approach Route 2" (Gorton Road from PA Route 144 in Snow Shoe Township) and states that Approach Route 2 (Gorton Road from PA Route 144 in Snow Shoe Township) will see an additional 175 daily weekday trips by passenger cars. RRLLC states that Approach Route 2 "will consist of passenger car trips of site employees, with all truck traffic using the proposed interchange (Exit 140). Therefore, the existing facilities will be capable of handling future site-generated traffic."

Gorton Road is the only access to the proposed landfill site. It starts as a very narrow, partially paved Snow Shoe Township road with two 90-degree dogleg turns, closely bordered on both sides of the paved section by residential homes. Once the paved section ends, the township road widens to a gravel/dirt road that leads to a wilderness area encompassing thousands of forested acres and miles of waterways providing opportunities for fishing, hunting, bird watching, boating, etc. The road is also the primary access for a locally owned archery range and over 100 privately owned seasonal dwellings. The first four miles of this gravel/dirt road is permitted for ATV use so that ATV enthusiasts can access the popular multi-use Snow Shoe Rail Trail.

During construction there will be an increase of traffic on Gorton Road, not only in the number of vehicles but the type of vehicles as well. It is an axiom of traffic engineering that mixing construction vehicles and passenger traffic will create serious problems, particularly on a gravel/dirt road that is primarily used for passive recreation and ATV traffic.

Not only does the RRLLC application designate the use of this local road (Gorton Road) but also outlines improvements to other roads in Snow Shoe Township and neighboring Cooper Township, whose citizens are also adamantly opposed to the landfill proposal.

RRLLC proposes:

- Signalization at the intersection of PA Route 144 and Cherry Run Road (a Snow Shoe Township road).
- Lengthening the approach and exit ramps at interchanges 133–Philipsburg/Kylertown (Cooper Township) and 147–Snow Shoe (Snow Shoe Township), which is necessary for the increased volume of traffic during the construction phase.

If RRLLC is proposing improvements to local roads, then it is fair to assume they will be impacting local roads. This was further confirmed by Herb Flodsdorf, Vice President of RRLLC, when he told Teresa and Robert Burbidge (Gorton Road residents) at the March 2006 Centre County Metropolitan Planning Organization meeting that, “You will see some harms as Gorton Road residents.”

The permit application does not address the harms that will be created by additional traffic on local roads during the construction period and I-80 closures.

3. Access by Local Roads for Construction and Backup Use

The RRLF site is not an appropriate location for a landfill. Even periodically for short periods of time, trash truck traffic at the projected rate of 500 trips per day would have a devastating impact.

The Applicant proposes to limit all waste hauling truck access to their dedicated I-80 Interchange and thus claims use of local roads, except for the construction phase, is not a pertinent issue. We disagree because whenever access from I-80 is blocked or impeded for any reason, these waste hauling trucks will use local roads if open. These local roads are open, used, and even officially permitted and permanently marked as approved I-80 alternate or detour routes. I-80 traffic has been blocked or impeded locally by construction, accidents, and weather (e.g., heavy rains, flooding, ice, fog, snow accumulation or “white-outs”). Within 15 miles of the proposed exit, this mountainous section of I-80 is shut down or heavily impeded (i.e., stop and go) at least once a week, more often when construction or major repairs are ongoing. The local route would be from I-80, to a state highway to a township road, mostly winding and mountainous. Trucks would pass through the small towns of Snow Shoe, Moshannon, several smaller villages, and several recreational subdivisions for about ten miles total, five miles on a dirt/gravel road.

The primary issue is truck safety with emphasis on pedestrian, school children, and school bus safety. There is also other slow (e.g., retired people, tourist), stop and go (e.g., school bus, rural mail, newspaper box deliveries) and recreational traffic (e.g., horses, ATVs, bicycles, hikers). According to 2002–2004 DEP Harms-Benefit Analyses (Dauphin Meadows, White Pines, and Pine Grove Landfill expansions proposals), tailgating, convoying, running resident traffic off

the roads, exceeding speed limits, excessive speed turns, and pedestrian, school bus/school children incidents were very common citizen complaints. None of these roads or towns/villages has a police force. The second common set of complaints was dust, blowing litter, liquid spills, noise, and especially odors.

This “secondary” route to the RRLF site and surrounding area are mostly residential or recreational, with most homes and cabins close to the roadways. Several thousand people live along this route or have recreational property and would be heavily and adversely impacted. Most of this road stretch is also a gateway road to the Pennsylvania Wilds and is part of the Elk Scenic Drive.

4. Air Quality

An increase in truck traffic of 500 trucks per day will increase particulate matter from truck exhaust which will reduce the air quality in the area. Trucks emit increased diesel exhaust when accelerating, decelerating, and idling, which will be the case in this confined corridor of travel. Recent studies have documented that particulate matter is a major contributor to lung cancer, increased asthma attacks, and other respiratory problems. Centre County is already a nonattainment area for air quality (i.e., ground level ozone) and the increase in truck traffic both during construction and, if approved, during operation will further cause reductions to the air quality. Diesel trucks produce twice the NO_x (contributing to ozone smog) and three times the fine particle soot (inhalable) when compared to passenger cars.

It is particularly important to prevent further degradation of air quality in this area, which has been newly designated as part of the Pennsylvania Wilds. For state law purposes, this area should be given the same protection as federal wilderness and National Park areas. At a minimum, RRLLC should be required to prepare a study demonstrating no degradation of air quality and to obtain 100% offsets for any increases of air pollution.

B. Operation Related Harms—Landfill

1. Noise

The proposed site is a particularly inappropriate location for a landfill when noise is considered. There is no doubt that on weekends, especially late Friday to Sunday mid-afternoon, the proposed landfill and additional waste truck traffic will be the dominating noise source in the area affecting most people.

RRLLC’s source of landfill noise combines a prediction of added truck traffic from I-80 and the proposed I-80 Interchange, backup alarms, landfill compactor, and landfill gas flares. This predicted landfill noise was compared by the Applicant to the existing average noise level measured at eight sites and found to be noncontributing at five sites, a small contributor at two sites (1.7–2.2 times louder), and a major contributor at one site (309 times louder). Using the Applicant’s average value comparison, there is some noise harm.

RRLLC identifies the average background noise from I-80 as the masking source for the combined landfill sound, and in doing so, misses the major point. The area surrounding the landfill site is primarily a recreational, not a residential or industrial area. Thousands recreate here, mostly on the weekends. They do so fishing and floating the creeks, hiking and biking the trails including the Snow Shoe Rails-to-Trails, and occupying camps in nearby large recreational subdivisions containing some very nice full-service homes most weekends. In addition, people visit Black Moshannon Park, State Game Lands 103, and the Moshannon and Sproul State Forests, which are all in close proximity to this proposed landfill. We know that the I-80 road noise on weekends and holidays is way below the average, and often not discernible. As a result, we have recomputed the landfill and I-80 garbage truck noise effects using the minimum ambient noise level measurement from RRLLC’s Form D, Attachment D–5, Table 2 (p. 5) and the other columns from Attachment D-5, Table 4 (p. 10) and Attachment D-5, Table 5 (p. 11).

<i>Sample Site Location</i>	<i>Direction from Landfill</i>	<i>I-80 Ambient Noise Minimum (a)</i>	<i>Total Landfill Noise (b) dBA</i>	<i>I-80 Waste Truck Traffic (b)</i>
A	East	49.2	69.7	69.7
B	East	48.9	54.0	53.8
C	East	39.9	53.9	53.6
E	South	39.9	49.9	49.7
F	West	44.7	56.7	56.8
G	West	40.8	48.4	48.0
H	North	39.9	40.5	35.5
I	North	39.9	62.8	43.4

Note: (a) = measured; (b) = predicted dBA

The difference between the ambient noise minimum (as a measure of the average weekend noise) and their predicted total landfill noise or I-80 trash truck noise was similar for all sites but the north direction. The difference for the landfill contribution ranged from 0.6 to 22.9 dBA louder, averaging about 12 dBA or 16 times louder. The trash truck road noise was similarly louder. The two loudest sites (A, I) were 112 to 195 times louder than the minimum ambient noise. A more useful comparison to evaluate loudness uses Form D, Attachment D-5, Table 1 (p. 1.0):

Activity	Sound level dBA
Quiet living room or whispered speech	40
Bird singing or moderate rainfall	50
Normal conversation or faucet	60-62
Vacuum cleaner	75

The noise contribution from the landfill and/or waste hauling trucks will mask or overwhelm the ambient I-80 noise during regular and holiday weekends throughout most of this area. The noise from heavy construction and heavy landfill equipment is inconsistent with the wilderness experience that is promised by the Pennsylvania Wilds.

2. Odors and Vectors

a. Odors and Landfill Gas Emissions

Odors are the most common source of citizen complaints (per RRLLC's application and 2002-2004 DEP reviews of Harms-Benefit analysis for the proposed Dauphin Meadows, White Pines, and Pine Grove landfill expansions). Landfill gas emission issues rank closely behind. RRLLC's treatments proposed for controlling both, basically follow those used and proposed by these three existing landfills who achieved poor control according to citizen complaint records and DEP assessment. A major RRLLC odor control strategy is to install a dual tier misting system which does not remove odor, but masks it with another scent. This does not mitigate the odor harm, but increases it because people downwind no longer know if they are breathing landfill emissions that contain noxious and harmful chemicals (G. Fred Lee and Ann Jones Lee, 1993) including non-methane organic compounds (NMOC). Once generated, these odors and landfill gas emissions may not disperse nor dilute readily over time or travel distance because of where this landfill is sited. The mountainous terrain containing it is characterized by a transected deep valley landscape and is subject to extended periods of fog over large areas, especially during spring and fall. Fog, typically associated with stagnant airflow, is likely to allow build up of emission concentrations as well as create smog, both of which increase environmental and human

health harms. In contrast, during clear nights, the greatest radiational cooling will occur at the highest elevations which would be this landfill. This densest air will move preferentially and rapidly down into the valleys with little dispersion and mixing, thus reaching and harming distant streams and stream bottom areas where most people recreate. RRLLC's heavy reliance on setback distances in their odor and landfill gas mitigation system requires air dispersion, mixing, and generalized transport to be more controlling as for sites located in the larger valleys, plateaus, and plains.

Even under the Applicant's best self-serving assumptions, the prevailing westerly and southwesterly winds will deliver odors, gaseous emissions, and the resulting volatile chemicals downwind to many occupants of recreational dwellings and several thousand Snow Shoe Township (Clarence, Moshannon) and Snow Shoe Borough residents located one to five miles east and northeast of the proposed landfill.

The odors that necessarily accompany landfill operations are also inconsistent with the wilderness experience that is promised by the Pennsylvania Wilds. Odors at this location, at the gateway to the wilds, are inconsistent with the Commonwealth's strategy of promoting wilderness related tourism in the area. The odor of a landfill at a gateway location is hardly going to *encourage* tourism and represents a clearly inconsistent land use, as contemplated by the Centre County Comprehensive Plan.

b. Vectors

Landfills attract birds, especially crows, seagulls, and vultures (Dauphin Meadows, White Pines, and Pine Grove landfills, see Odors and Landfill Gas Emissions for reference). They can introduce and spread diseases to humans. West Nile Virus is well-documented in crows. Of greater concern and the subject of three recent articles in National Geographic (2006) is the entry of the Bird Flu virus to the United States through migratory waterfowl such as seagulls via Canada and Alaska. Infected migratory sea birds have been found in Northeast Asia and Scandinavia which are migration entry points to Alaska and Canada.

Rats and insects, including flies and roaches can carry human disease and are commonly delivered in garbage to landfills. This is to a site and area with low populations of both. Some of the introduced new vermin species will become indigenous.

Vectors of economic and ecological importance include tree insects and diseases, not now in Pennsylvania, or subject to quarantine and treatment to limit further spread. These include the Emerald Ash Borer (White Ash) and Oak Wilt (Oaks). Both can kill their host and cause epidemics. Oaks are very important economically and ecologically in central Pennsylvania and this landfill vicinity.

3. Dust

The greatest impact of dust will be on site, closest to the landfill source with primary impact on truckers and employees working on site. The issue will be the increased respiratory affects and ailments which have been documented for landfill workers. Dust, no matter how well controlled, will be a problem. Furthermore, its impact is enhanced and aggravated by diesel emissions, landfill gas and NMOX emissions, and possibly microbial vectors, which also will be found in aerosols and at highest concentrations on site. Diesel emission, as dust, is a source for inhaled fine particles and colloids. This landfill site, subject to fogs, and smog formation as well as preferential and concentrated airflow pathways downslope due to radiant cooling among other factors, can further aggravate respiratory problems onsite but also deliver them offsite to creek and creek bottom areas.

A major and unaddressed dust source offsite will be Gorton Road. This mostly dirt/gravel road has been identified by the Applicant for ingress and egress of all vehicles during the landfill construction phase. This road services many recreational homes and cabins located alongside and provides a walkway and recreational vehicle route for many who visit, tour, or own property subjecting these people to this nuisance, damage, and health harm. These particulate emissions will interfere with views and vistas in the Pennsylvania Wilds.

4. Litter from Landfill

Litter, from landfills is a very common complaint (Dauphin Meadows, White Pines, Pine Grove Landfills). Their proposed litter containment program is standard, but the problem with this particular landfill site is:

- The proposed landfill will occupy an elevated, highly-exposed site that will be subject to very high velocity and sustained winds.
- This site will become several hundred feet higher and more exposed as filled in.
- Because the surrounding area is recreational, substantial littering will be seen not just as a problem, but unacceptable due to large income losses by recreational service providers or the departure of recreational users.

The following comment was emailed to PPC, from Larry Merritt, Snow Shoe Rail Trail user, June 20, 2005:

Here in Erie, what used to be a valley is now the highest peak in the area. On the East side of the land fill there is a very high fence that is there to catch the wind blown debris. They do not work all that well as behind the fence as far as you can see into the woods are plastic bags, thousands of plastic bags hanging from the trees. The bags that are not caught in the trees fly to the neighbor's fields and yards. In the summer, from the top of the landfill there is a beautiful view of Lake Erie. Thousands of sea gulls are there to greet you. In the summer heat, the air is full with the smell of rotting garbage. This is NOT the place you want to show your out-of-town friends. They do as best they can to keep the dust down by spraying water onto the road ways. I can only hope the water is contained AND treated on site.

5. Fire Potential

This site is not suitable for a landfill because the potential for fire and its major consequences are great. This landfill is positioned in a mountainous, forested area. These forests typically have excess fuel (e.g., downed trees, brush, leaves) and frequently very dry conditions in early spring, and summer through early fall. The area also has very few roads and extremely poor access for fire fighters once a forest fire starts. Considering the air-wind movement in this transected, deep-valley terrain, fire can move rapidly, especially along preferential airflow pathways (see Odors and Landfill Gas Emissions). The greatest risk here is a forest fire out of control—the destruction can be extensive and complete as occurred in the 1980's Sproul Forest fire. Add to this inappropriateness of RRLLC's site choice, that the landfill provides more fuel (e.g., landfill gases, combustible litter) and many ignition opportunities (e.g., landfill gases, venting-flare off system, truck traffic, human activity).

6. Leachate and Waste Releases

All liners leak including redundant liner systems.

The claimed benefits for leachate recycling to the waste mass is exaggerated, especially for reducing leachate quality and quantity over the long term. In central Pennsylvania, precipitation (~38 inches per year) exceeds actual evapotranspiration (~26 inches per year) by about 12 inches which becomes groundwater recharge or surface runoff. Over the long term, this water cannot be "stacked up" on site but becomes drainage which must be treated. Similarly, inorganic and persistent pollutants in drainage waters will still be leached from the site in quantity even when recirculated. The site is neither a water nor chemical "sink," even though much of the organic "garbage" will be anaerobically degraded.

The groundwater monitoring program is insufficient for ground water systems dominated by fracture, crack, and macropore flow which is characteristic of mountain hydrology. There is no guarantee that the downgradient wells are representative or intercept the major flow pathways from the landfill site to the streams. The position as well as frequency of sampling is at issue.

7. Coal Mine Preconditions

This landfill site is not appropriate. The proposed landfill site and borrow pit includes past strip and drift mined areas. Excavation and development can be expected to expose fresh pyrite materials to oxygen and water, thereby accelerating and increasing pyrite oxidation and the transport of the acid products off site. Tunnels and shafts resulting from drift mining can capture and route drainage outflows. This can bypass the normal and expected outflow patterns and thus compromise the installed drainage collection or ground water monitoring systems.

The risk of fire is greater. Landfills generate heat and combustible gas. Coal and coal-related debris are combustible and have been the source of subsurface and break out fires without landfills being onsite or close by. It seems to us a coal-based site should be avoided, not preferred as indicated by RRLLC's application.

C. Visibility & Aesthetics

The site is not an appropriate location for a landfill. The Applicant suggests the remoteness and proposed buffers will limit the view of the landfill operation to residences; however, the area surrounding the landfill is a well-known outdoor recreation area. Although there will be visual and aesthetic harms to residences primarily in neighboring Cooper Township, the more serious impact will be to the recreation economy, the seasonal property values, the historical assets, and wildlife.

By definition, aesthetics is a branch of philosophy dealing with the nature of beauty, art, taste and with the creation and appreciation of beauty; a pleasing appearance; of or relating to, or dealing with aesthetics or the beautiful. Thus aesthetics, although primarily treated here as visual, would also include the dust, noise, and odors associated with the proposed landfill. Please refer to the sections on noise, odor, dust and other environmental impacts that humans can perceive as further evidence of aesthetic harms.

1. Harms to Public Viewsheds

This site is not an appropriate spot for a landfill. The removal of hundreds of acres of forested land, construction of artificial berms, installation of litter control fences, and 24/7 activity will detract from the restful, scenic, natural beauty that currently exists in this location. Scenery is strongly correlated with positive recreation experiences, and the proposed landfill site is visible from several recreational viewsheds. Viewshed is a term that means "as far as the eye can see, and the adjacent area." Hikers on the Allegheny Front Trail, located in the Black Moshannon State Forest and less than one mile from the proposed landfill site; visitors to the adjacent State Forest and to the Black Moshannon Creek and Moshannon Creek watersheds (a Class A forested viewshed); travelers on I-80; users of the Snow Shoe Rail-Trail; and nearby property owners will be negatively impacted either visually, aurally, by smell, or all three. The natural beauty and remoteness affiliated with this undeveloped wilderness, which includes the Moshannon gorge, will be scarred by the loss of the forested hillsides to the east of the I-80 bridges and thus, will detract from the visual appeal of this natural, picturesque panorama. The area is historically documented for its scenic value by the Western Pennsylvania Conservancy in the Centre County Natural Heritage Inventory. Any industrial development in the midst of this wilderness region will severely alter the landscape and negatively impact its impressive vistas, thereby making this area less appealing to outdoor enthusiasts.

2. Light Pollution, Light Trespass, and Glow

Darkness is a valued, promoted asset in wild areas. The Pennsylvania Wilds, an initiative of the Rendell Administration to promote outdoor tourism in northcentral Pennsylvania, notes and brands this quality as WildsDarkSkies (Fermata, 2005).

The Applicant's solution of "properly installed" cut-off lights will not prevent the spillover, glare, light trespass, or horizon glow associated with these types of lighting fixtures. For example, the Snow Shoe FedEx Depot uses "properly installed" cut off lights. These "properly installed" light fixtures cause enough spillover, glare, and pink haze on the horizon and beyond that one can no longer view the stars and constellations from Snow Shoe Borough

well beyond 10° into the night sky. In addition, this light set up is distracting to drivers due to the glare and spillover.

The desirable darkness of the night sky, which adds to the sense of remoteness and isolation seasonal property owners and recreationists seek, will be lost. Those interested in star gazing will choose not to return here. Area residents who star gaze from their backyards on clear nights will no longer be able to enjoy this activity.

Reflection of light from the ground and secondary glare make it impossible for astronomers/stargazers to determine a star's color. Neither can one see the stars, star clusters and nebulae of lesser magnitudes with this kind of light interference.

Siting this landfill on a ridge top will send light into the night sky for many, many miles affecting stargazing and causing a distracting glare for drivers on I-80 which can contribute to increased accidents.

D. Tourism Industry Impacts

The area targeted for the RRLF sits in the midst of a fast growing, popular, recreational wilderness region and is not a suitable site for a landfill. Industrial development of any type directly conflicts with the current use of the parcel and use of adjacent properties. Snow Shoe Township's portion (over half of the 5,800-acre site) is zoned for Forest/Open Space, which is the property's highest and best use. If the Western Pennsylvania Conservancy had been able to get adequate funding several years ago this entire parcel would have become state forest land.

Tourism is Pennsylvania's second largest industry. The primary form of growth in the vicinity of the Applicant's proposed landfill site, and within this region in general, is outdoor recreation tourism and most recently (within the past 10 years) seasonal property development. Within the surrounding area, recreation and tourism attractions include: the historic Snow Shoe Rail-Trail (an ATV-friendly, multiuse linear park) featuring the Viaduct Bridge, Peale Tunnel, and other feats of Victorian era engineering; the Moshannon Creek water trail for floater and nonmotorized boaters; the lucrative seasonal property subdivisions; the abundant, contiguous interior forest habitat and diverse wildlife; and Primitive to Semi-Primitive locations for camping, hunting, hiking, and fishing; and close proximity to Black Moshannon State Park and Forest, its central location to other northcentral Pennsylvania parks and forest, and the Elk Scenic Drive. The numerous recreation attractions add to the value and attractiveness of this area for a wide variety of outdoor recreation adventures.

1. Pennsylvania Wilds Initiative

This proposed landfill site is located at the gateway to the **Pennsylvania Wilds**, a major ecotourism initiative of the Rendell Administration. The Pennsylvania Wilds tourism destination(s) are noted and promoted for dark skies (WildsDarkSkies; e.g., astronomy, sky watching), water-dependent recreation (WildsWaters; e.g., fishing, kayaking/canoeing, swimming), wildlife (WildsLife; e.g., hunting, photography, watching), scenic transportation (WildsWays 1; e.g., bicycling, sightseeing, driving off-road), historical and cultural assets (WildsWays 2; e.g., nature centers, archeological/historical sites), and its forests (WildsWoods; e.g., backpacking, camping, picnicking). (Fermata, 2005, prepared for DCNR)

The Elk Scenic Drive, a scenic rural roads experience beginning at I-80 exit 147 (Snow Shoe) is expected to be traveled by approximately 75,000 visitors annually in their quest to view Pennsylvania's Elk herd. "Pennsylvania's wild elk herd, the largest in the Northeast, brings more than 75,000 visitors to the Pennsylvania Wilds each fall," said Governor Rendell. "Our new guide and signs will steer people to these unique destinations safely, and they might learn a thing or two about the culture, beauty and history of our state as well." (Commonwealth of Pennsylvania, September 13, 2005)

A landfill sited in this location will detract from the "culture, beauty, and the history of our state." This proposed industrial development is contrary to current and future planned economic development not only at a local level but also at the state level. The existing, diverse

local outdoor recreation tourism economy has fueled the growth of gas stations, restaurants, and other small businesses that cater to visitors and outdoor recreation enthusiasts in the small surrounding boroughs, villages and townships.

Outdoor recreation is a solid, sustainable, healthy growth industry. The proposed project will harm the region by stunting or reducing the growth of outdoor recreation dollars which currently benefit all surrounding communities.

2. Snow Shoe Rail-Trail

In Spring 2006, the Snow Shoe Rails-to-Trails Association (SSRTA) and the North Central Chapter of Central Pennsylvania ATV Association sent out a survey to the SSRTA membership. According to this survey of 700 member responders,

The average member:

- owns 1.8 ATVs
- lives 74 miles away
- rides the SSRT 10.6 times per year
- spends, on average, \$116 per trip
- brings in over \$800,000 of revenue annually to the local economy

The average SSRT member would like:

- more legal riding opportunity
- a Bloody Skillet connection to Orviston
- more food and fuel opportunity

99% of SSRT members would increase their usage of the SSRT if these needs are addressed. (Snow Shoe Rail Trail Association newsletter, November 2006, p. 3)

The appeal of this trail, its historic structures and scenic vistas, and potential for connectivity to other trails will be severely impacted by the proposed landfill, and completely destroyed if the Applicant reactivates the rail line for waste transportation.

3. Known Recreation Areas Not Addressed by the Applicant

- a. The Moshannon Creek falls within one mile of the proposed landfill site. Recreational use of the Moshannon Creek is recognized on PennDOT maps as a water trail (PennDOT Geographical Information, n.d.), the boat put-ins along the Moshannon Creek are inventoried by the Pennsylvania Fish and Boat Commission (PFBC), and over one thousand canoeists and kayakers float and boat on the “RedMo” annually. It is host to the 40-year-old tradition know as the RedMo Down River Race which attracts people from all over the United States and beyond.

One of the most attractive features of floating/boating on the RedMo is the remoteness and wildness of the creek. Subjecting this section of the RedMo to the sight, sounds, and odors of a nearby landfill will seriously detract from one of its most striking features.

- b. There are seven leased hunting camps located on the property, many of which have been established for over 40 years. Adjacent lands are commonly used for hunting, fishing and other outdoor recreation. The potential loss of these cabins and degraded hunting grounds is a harm that deserves consideration.
- c. The Allegheny Front Trail, located less than one mile from the proposed RRLF site, in the Black Moshannon State Forest, is a popular hiking trail area that will suffer aesthetic impacts to its I-80 vista and other northern segments of the trail.

Odor, dust, 24/7 industrial noise, and fly-off litter from trash haulers on I-80 and the proposed interchange will detract from the quality of these public recreation attractions.

4. Psychological Impacts to Outdoor Recreation Visitors

Siting a landfill in the middle of prime recreational wildlands is not a prudent use of our environmental resources. These two land uses are diametrically opposed. “Isolated” may have been considered an advantage in siting this landfill but it is also a highly valued and sought after outdoor recreation asset. It allows individuals to find opportunities for solitude, challenge/self-reliance, risk-taking, testing outdoor skills, experiencing/observing undisturbed nature, self-direction, and distances to overcome. Isolated, but conveniently located near small rural communities that can provide goods and services, is what attracts visitors to this area.

Word-of-mouth has been the primary form of attracting visitors to this region. The “power of ten” rule in marketing observes that people who have an unsatisfactory experience are more likely to share it than a person who has an expected or an exceptional experience. In essence, if you change the dynamics of the region by industrializing a well-used popular wilderness area, the outdoor recreation economy of this area will be negatively impacted.

5. Harms to Outdoor Recreation Experiences

Recreation opportunities and experiences are very personal—if the needs of the visitor and the benefits they seek are not met, this visitor will not return. It all boils down to the experience the visitor seeks and the quality of that experience. The entire tourism industry is based on experiences—those offered by an area, site or business; and those sought by visitors/customers.

The area surrounding the proposed landfill is a popular destination for Primitive to Semi-Primitive outdoor recreation activities.

Areas classified as Semi-Primitive Non-Motorized must be within one half-mile of lightly used primitive roads (e.g., may be accessible by ATVs) but not closer than one-half mile from roads heavily used by all types of motor vehicles. The Snow Shoe Rail-Trail and Peale Road in Rush Township are prime examples of the Semi-Primitive Nonmotorized classification. Gorton Road would be Semi-Primitive Motorized due to the condition of the road itself (i.e., unpaved, passable by car, ATVs permitted).

One can easily determine that operational noise, traffic, odors, dust, litter from the landfill and its vehicles, and increased large truck traffic would be unacceptable for those who seek the peace and serenity of remoteness, birdsong, the rustling of wind through the leaves, and the naturalness of the experience. This proposed project poses an inmitigable impact on the Primitive and Semi-Primitive outdoor recreation and tourism experience for which this area is recognized.

The removal of hundreds of acres of forest; destruction of wetlands; industrialization of the Moshannon Creek and natural wildlife corridors; the advent of air, water, noise, sight and light pollution; increased truck traffic and everything else that comes with this proposed landfill will irreparably decrease the attractiveness of, and appreciation for, what is now one of the best recreational assets of Central Pennsylvania.

Commonwealth of Pennsylvania, DCNR (2005, September 13), *News release: Governor Rendell announces new guide for wildlife along Elk Scenic Drive in PA Wilds*. Harrisburg, PA. Retrieved December 14, 2006, from <http://www.dcnr.state.pa.us/news/newsreleases/2005/0905-elkscenicguide.htm>

Fermata, Inc. (2005, September). *Outdoor recreation in the 21st century: The Pennsylvania Wilds*. Austin, TX: prepared for the Pennsylvania Department of Conservation and Natural Resources.

PennDOT Geographical Information. (n.d.) *Northcentral Mountains Pennsylvania Outdoors Discovery Map*. Harrisburg, PA: Author.

Snow Shoe Rails-to-Trails Association. (2006, November). Newsletter. Clarence, PA: author.

E. Property Devaluation

The proposed site is not an appropriate location for a landfill. Development of a landfill in this area is counter to the vision and track record of the unique recreational forest subdivisions that are increasing property values in the area at amazing rates. When citizens of the area were forward thinking enough to develop hundreds of forested acres into recreational parcels so that people from everywhere could share in the love of nature cherished by the locals, they were truly ahead of their time. The decision to subdivide large parcels of wooded ground into affordable 5–10 acre plots and market them to outdoor enthusiasts has been wildly successful and truly beneficial to the local townships, Centre County, and the Commonwealth. One needs only to examine the Centre County property transfer records to see the stunning results:

- For the 15-year period since the development of the Snow Shoe Wildlife Preserve subdivision, property values have appreciated 18% per year—far above a state or national average appreciation rate over this time period.
- In the Moshannon Forest Property Owners recreational subdivision, the average price per acre has nearly doubled in the past seven years. This represents a 10% per year appreciation rate which is far superior to Centre County's property appreciation rate for the same time period.

To consider locating a massive landfill project anywhere near this kind of unique and successful development is economically and environmentally foolish. The purchasers of these recreational parcels are motivated by their desire to enjoy and preserve the outdoor wilderness. If the outdoors is suddenly made undesirable, as it would be with the odors, vermin, litter and other pollutants from a landfill, these purchasers no longer have an interest. Once potential buyers no longer desire land in the vicinity, the entire basis of land values in the area is undermined. Properties in this area do not fit the typical studies that have been conducted on property values near landfills because none of the other study sites have had the successful recreational forest subdivision track record that this area has. The property values will not just be reduced by locating a landfill in this area—they will be decimated. Given a choice of purchasing property where there is not a landfill nearby versus purchasing property where you can see, smell, and hear a landfill is a “no brainer” for people that purchase this type of property. They will look elsewhere, and by doing so shrink the market and values for these properties.

The surrounding communities and local jurisdictions benefit greatly from the taxes paid by these owners because owners pay equivalent to resident taxes, but use none of the services. They own and maintain their own roads, do not have children in local schools, or otherwise benefit from the property taxes. No other “industry” is nearly as profitable to local schools and jurisdictions.

Undermining the forward-thinking, environmentally friendly development that embraces the best characteristics of the area for a landfill is ludicrous and the numbers prove it. The amazing increases in property tax base and transfer taxes that these recreational subdivisions are generating; the dollars spent during construction, visits, and upkeep; and benefits the townships, county, and state far more and for a far longer time than the short-term temporary financial gains from a landfill—without the harms.

F. Surface Water Impacts

Over the long term, the landfill site will increase surface runoff and decrease groundwater recharge in North Side Run, Moshannon Creek, and Laurel Run Watersheds. This shifts the source areas of surface runoff from near stream and other wet areas to the landfill itself. It also changes the quality of the surface runoff, now much more controlled by the landfill than its near stream and wet area origins. The worst case is Laurel Run Watershed where the extent of the hydrologic variable source area (VSA), controlled by the dynamics of saturated zone intersections with the land surface, is probably not more than 5% of this watershed area. The landfill will occupy 10% of this watershed, and furthermore will areally diminish the VSA because it reduces the groundwater recharge that supports it. In contrast to the Applicant's position that the landfill is only an areally small part of this watershed and hydrologically insignificant, it is hydrologically dominant because

of the nature of this forested mountain watershed. Moreover, this landfill adversely affects wetland extent and quality, because the VSA expresses the connection, stability, and spatial continuity of the hydrologically integrated wetland system in hill land or mountainous watersheds. Thus, wetland must be treated, constructed, or modified as an integrated system, not by the piece as this Applicant proposes.

G. Wetlands

The RRLF site is not an appropriate location for a landfill. The proposed RRLF will destroy almost 11 acres of wetlands. The Applicant has only surveyed approximately 10% of the total 5,800 acres, primarily in the vicinity of the proposed landfill footprint area, yet suggests two wetland mitigation areas on the Snow Shoe portion of the parcel where their importance and need may not be significant. The Applicant also suggests sacrificing interior forest habitat acreage to build mitigation wetlands. Forest fragmentation and increased edge habitat (which will be caused by the landfill itself) are known harms to interior forest species, specifically but not limited to forest interior, neotropical migratory bird populations. The increase in edge habitat and reduced forest block size will enhance access for common nest predators and habitat generalists such as crows, grackles, blue jays, house sparrows, raccoons, striped skunks, and opossums, which prey upon the eggs and young of forest interior breeding birds. They will displace the more diverse assemblage of habitat species that currently exist in the larger forest tracts. This parcel also borders two Important Bird Areas (IBA) noted for avian species of concern and vital interior forest breeding habitat. The proposed landfill and wetland mitigation alternatives will impact this rare habitat.

Landfills are not water-dependent facilities. Rather than destroying such a significant amount of wetlands, several of which are two- to three-acres in size, an alternative landfill site should be considered.

Landfill and industrial park development are not water-dependent activities, and RRLLC has not adequately justified destroying aquatic resources for developing the landfill and related facilities. RRLLC should explore alternatives that are less environmentally damaging, such as alternative site plan configurations that minimize wetland fills and alternative site locations with lower habitat quality.

According to the Pennsylvania Department of Environmental Protection, since 1988, the State has authorized only one landfill having impacts to aquatic resources greater than six acres (the Alliance Sanitary Landfill in Lackawanna County; 6.18 acres). Other new landfills and expansions have affected no more than 2.9 acres for any single project (12 landfills affecting a total of 13.69 acres of wetlands). This can be attributed largely to proper site selection and impact minimization through project reconfiguration. (file review; U.S. Fish and Wildlife Service (USFWS) letter, November, 5 2005)

Exceptional value wetlands are indicated by a Pennsylvania Game Commission (PGC) letter:

It is apparent in the application and through discussions held during the field review that the construction of the landfill and its related infrastructure are intended, at least in part, to facilitate the future construction of an industrial park. It is our understanding that the industrial park will be sited within the Black Moshannon Creek watershed at a point upstream of the T-325 bridge. As you are aware, Black Moshannon Creek upstream of the T-325 bridge is listed by the PA Fish & Boat Commission as a stream section that supports wild trout production. As a result, wetlands located in the area of the proposed industrial park may be considered Exceptional Value Wetlands according to Chapter 105.17(1)(iii). (file review; PGC letter, November 15, 2006)

The Applicant's wetlands replacement ratio of 1:1 is insufficient for the types of wetlands they will be impacting.

The proposed wetland mitigation sites sacrifice forest cover for the construction of PEM (palustrine emergent) wetlands, may be subject to sedimentation and erosion, and rely on questionable hydrology. Therefore, we recommend that the Applicant explore alternative areas to site their compensatory wetland mitigation. Furthermore, we usually recommend such mitigation at greater than a 1:1 ratio for PFO (palustrine

forested) and PSS (palustrine scrub-shrub) wetlands, since these wetland types are harder to establish and maintain. In general, we recommend the following replacement ratios: 1:1 for PEM wetlands, 1.5:1 for PSS wetlands, and 2:1 for PFO wetlands. The Applicant should design and plan their compensatory mitigation needs accordingly. (file review; USFWS letter, October 23, 2006)

Based on comments from these agencies (USFWS and PGC), the Applicant's wetland survey is inadequate and their replacement plan is unacceptable.

H. Threatened and Endangered Species

This location is not an appropriate site for a landfill or any type of industrial development. The project site provides rare, contiguous interior forest for wildlife.

The Applicant's consultants failed to conduct *complete* studies for the threatened, endangered, and candidate species they were asked to survey by failing to follow the directives of the USFWS and other agencies to *survey the entire 5,800-acre parcel*:

With plans for a future industrial park, rail spur, landfill expansion, and a possible highway interchange, all resources existing on the entire 6,000-acre tract should be identified to allow a complete evaluation of site plan configurations that could minimize environmental impacts.... Consistent with the Department and Corps of Engineers regulations, the various development phases of this project should be presented as a single and complete project for agency review. (file review, USFWS letter, November 5, 2005)

A full survey of the entire parcel is needed. The Applicant cannot promote future industrial development as a selling point for one agency (FHWA for the I-80 Interchange) and then ignore it for others (DEP, USFWS, PFBC, PCG). Thus, is it difficult for the public to have confidence in the results of these studies. Upon review, two questions arise:

(1) The **small whorled pogonia** (*Isotria medeoloides*) survey seems incomplete. This plant is known to go dormant for several years at a time if conditions are not suitable for emergence and flowering. The weather patterns in this area have been odd in recent years (extraordinarily damp and cold in 2004 and extremely dry in 2005). Because individuals of *Isotria medeoloides* within an occurrence may not appear above ground each year, a five-year average is needed to assess the size of a population (Amoroso, 2005). To accurately assess the existence of this plant, data should be collected for more than one year.

(2) **Timber rattlesnakes** do live at the proposed site. The conclusion reached by the Applicant that "the population of timber rattlesnakes will not likely be significantly impacted" is not valid. Den sites are used for multiple generations. Loss of these den sites and/or the forage area around them will have notable impacts on the rattlesnakes. Upon reviewing the study's findings, it would seem that an excellent rookery, good/excellent den habitat will be "pinned" between the proposed landfill project and I-80 in such a way that an inadequate amount of forage and range will be available to the population and/or the proposed landfill will completely block access to good quality foraging areas to the north. Reptiles and roads don't mix; and rattlesnakes (or any snake for that matter) are unlikely to survive an attempt to cross I-80 to escape the proposed development. Lack of forage area, as mentioned in this same study, can result in lower reproductive levels as can overcrowding. Removing habitat for the proposed project will result in both lack of forage and overcrowding. This is prime timber rattlesnake country and the rattlesnake habitat and forage sites (such as wetlands with berry bushes that attract rodents) should be kept intact to preserve this species.

In addition, suitable habitat for Allegheny woodrats exists. It can be concluded that loss of this potential habitat will permanently displace both of these species of concern as their potential territory for re-habitation and recovery will be permanently altered. Suitable habitat areas for both the rattlesnake and the woodrat should remain undisturbed.

I. Habitat and Wildlife Impacts

This is not a suitable site for a landfill. It is not a brownfield in need of remediation but rather a greenfield in need of preservation. The landfill site is surrounded by wilderness. It provides rare,

contiguous interior forest for habitat species and those who wish to view them. Nesting, migration, denning, and foraging for wildlife is vital for the survival of interior forest species. All Commonwealth citizens and visitors are fortunate to have this interior forest habitat—one of the largest, wildest tracts remaining on the east coast.

Portions of the project area have been strip-mined and logged in the past. However, both mature and early successional forests appear to cover much of the site. Dominant tree species included red maple, aspen, birch, white oak, pin oak, apple, ash, dogwood, and several pines. Forest understories are well-developed, and support species such as sumac, northern spicebush, sweet fern, blueberry, multiflora rose, strawberry, and fire cherry. Finally, we noted abundant evidence of wildlife use in this site, including signs of black bear and white-tail deer. Forest interior bird species such as indigo bunting, red-eyed vireo, and several warblers were observed or heard. (file review, USFWS, June 9, 2004)

The fact that RRLLC's consultants suggested that evidence of logging suggested that the wetlands were degraded casts doubt upon their competence, credibility or both. Logging is not an activity that causes degradation of a site and often improves the quality of the habitat. If a site being logged constituted degradation, all but a few thousand acres of the Commonwealth and virtually all of its wetlands would be considered "degraded." This cannot be the case.

1. Forest Fragmentation

Forest fragmentation can never be truly mitigated:

When the project is fully implemented, the mature and recovering forests on the site will be permanently opened. The expanse of developed land will prevent wildlife from moving to adjacent habitats; reduce the value of adjacent habitat for species having specialized habitat requirements; facilitate the movement of invasive, exotic and parasitic species into the area; shift species diversity and composition to a smaller number of habitat generalists; increase competition for food, cover, and breeding sites in adjacent habitats that are already at optimum carrying capacity; and increase predation.

These effects are particularly acute for migratory birds. Forest fragmentation has been shown to cause significant declines in forest interior, neotropical migratory bird populations. The proposed landfill would increase edge habitat and reduce forest block size, thereby enhancing access for common nest predators and habitat generalists such as crows, grackles, blue jays, house sparrows, raccoons, striped skunks and opossums, which prey upon eggs and young of forest interior breeding birds, and displace the more diverse assemblages of habitat specialists that previously existed in larger forest tracts. In addition, the landfill development would impede the daily and seasonal movements of animals between various habitat types and promote decline of species that are less tolerant of disturbance. A development of this size would present a formidable barrier for less mobile wildlife, especially smaller and slower moving animals such as reptiles, amphibians and small mammals.

Moreover, there are likely secondary or indirect adverse environmental effects beyond those associated with habitat loss or degradation, including increased runoff; stream erosion and sedimentation; nonpoint source pollution; and groundwater contamination. Overall the proposed project would contribute to the continuing loss of forest interior habitat in this region of Pennsylvania, and spur development in an otherwise undeveloped area. In addition to forest losses, we would expect some added "growth-inducing" effects to facilitate the piecemeal loss and degradation of steams and wetlands surrounding the site over time.

In summary, a project of the scale envisioned for this site has the potential to severely alter the biota, habitats, and aquatic resources over a large area, and cause substantial direct, indirect, and cumulative losses of aquatic and terrestrial habitats. The effects of the landfill proposal and all interrelated actions should be fully evaluated and considered in project impact assessments, design, and permitting. (file review, USFWS letter, June 9, 2004, pp. 4–5)

2. Wildlife

The proposed landfill will have a permanent, detrimental effect on the region's wildlife, its habitat, and migration patterns. The waterways and land surrounding the site provide a natural greenway and geneway for wildlife from Black Moshannon to the Pennsylvania Wilds regions in the northcentral mountains of Pennsylvania (i.e., the contiguous Sproul, Elk, Susquehannock, and Tioga State Forests and the state parks within them). The Moshannon Creek ravine underneath the I-80 bridges offers safe north-south passage for migrating terrestrial species. Operation of a 24/7 landfill operation will fragment the forest and isolate the Black Moshannon Park and Forest area and its wildlife from the larger northcentral forests, parks, and wild areas—it is a natural wildlife corridor. The landfill will isolate and weaken the wildlife gene pool by cutting off this wildlife corridor, fragmenting continuous forest, tainting the wildlife's air, food, and water, and causing undue stress from 24/7 industrial noise.

3. Fish and Other Aquatic Life

This proposed project has the potential to degrade water quality, affect flow rates of streams, and potentially affect aquatic life and riparian zones within the vicinity of the landfill.

It poses a high-risk of introducing aquatic diseases to streams, ponds, lakes, and wetlands in this region. Landfills are notorious for attracting birds, including seagulls. Birds are vectors of disease for fish and carriers of invasive aquatic species.

This carries heavy significance in light of the viral hemorrhagic septicemia (VHS; Whelan, 2006) documented in the Great Lakes, including Lake Erie, and surrounding fresh water habitat. There is no cure or treatment for VHS, which causes massive fish kills. Even if some fish survive the symptoms of this infection, they remain carriers of this disease. Local streams will be placed at risk for infection as well, including the Black Moshannon Creek (HQ-CWF) which contains native, wild trout populations.

Whelan, G.E. (2006, Nov 9). Viral Hemorrhagic Septicemia (VHS) Briefing Paper. MI DNR

J. Historic Structures & Archaeological

The proposed site is not an appropriate location for a landfill. The site itself, as well as the surrounding area, has historical significance that is of growing interest to a widespread and diverse group of people. In fact, the Centre County Historical Society has recommended that two of the historical structures on the site, the Viaduct Bridge (circa 1884) and the Peale Tunnel (circa 1883) be added to the historical inventory of Centre County. The history and structures on site and the surrounding area will be altered or destroyed if the landfill is approved.

Following are excerpts from two of the individuals/groups that are documenting the history of the area:

I established a group (2001) dedicated to the research and rediscovery of Peale, Pennsylvania. The Peale Research Foundation (PRF) has spent many years researching the history of this town. We have people from all over the United States flocking to our website, looking for information about where their grandparents and great grandparents grew up at or were born. Some of these people use vacation days to come to Pennsylvania and visit the area, trying to see what the town may have looked like in its glory days. For this reason, PRF leads tours through the area, pointing out many historical facts, such as the Viaduct Bridge, the Peale Tunnel, the barn that sits where the Peale Town Hall once sat, the lone headstone of Martha Renfrew at the Oakwood Cemetery, etc.

From recent comments submitted by Mrs. Jamie M. Wagner, Founder, Peale Research Foundation

I have long been interested in this area's history, particularly the railroad line that once traversed this immediate area, the coal and fireclay mines that supported the railroad (and vice-versa) and the towns that rose as a result of the railroad and mines.

I have written various articles on these subjects for historical societies, including the Clearfield County Historical Society and the New York Central System Historical Society, Inc. as well as the two websites devoted to the history of the one-time town of Peale, which was located immediately adjacent to the proposed landfill. In addition I am currently coauthoring a book sponsored by the Centre County Historical Society on the county's railroad history.

From recent comments submitted by Jeffrey L. Feldmeier, Michigan

K. Airports

The proposed site is not an appropriate location for a landfill. It is in close proximity to several small airports and in fact, since August 2004 there have been six airplane crashes in close proximity to the proposed RRLF site. The proposed landfill's impact on air travel has been grossly understated.

General aviation still uses the dead-reckoning system of flying landmarks such as I-80, which is used for the east/west routes through mid-Pennsylvania. That puts airplanes over the proposed landfill that will stand at 300 feet above ground level (AGL) or 2,100 feet above mean sea level (AMSL). Although Mid-State Airport is the only airport within the Federal Aviation Regulations (FAR) six-mile limit that was mentioned in any paperwork submitted for FAA approval, there are other airports and a high concentration of air traffic just outside that limit.

The Ford Act, Pub. L. 106-181 (49 U.S.C. 44718 note), Section 503 prohibits the construction or establishment of new municipal solid waste landfills after April 5, 2000 within six (6) miles of certain smaller public airports. The maps submitted with the application to the FAA from ARM Group, Inc., were blown up in size and did not show the closeness to the other airports. The scales used with the application maps also avoided showing the metropolitan areas.

There are other airports in the area (see Attachment A) which include: Albert Field, elevation 1,784 feet with J-3 Cubs flying in and out; Ridge Soaring Gliderport, elevation 815 feet with gliders and tow planes; Bellefonte Airport, field elevation 1,071 feet and a reverse landing pattern just across the ridge from the gliderport (Bellefonte airport hosts fly-ins and is home to twin-engines, corporate planes, emergency medical transports as well as various general aviation facilities); University Park Airport, field elevation 1,239 feet, less than 12 miles away from this proposed landfill. University Park Airport is one of the highest traffic non-towered airports in the state—flying several commercial companies' schedules, a high volume of general aviation, and many high event fly-in traffic times with Penn State games, Penn State University graduations, Arts Festival visitors— all bringing in hundreds of thousands of visitors per year. There is also Garbrick Field flying banners over the Penn State Stadium, blimps that cover the Penn State games, Life-Flights, and State Police helicopters. There is much more air traffic that should be considered.

Aside from the known hazards of birds, the methane gas emitted by a landfill could affect air travel, as well, as it could come at a time when the preciseness of instruments is essential because of the descending angle to land in the ridges and valleys of this central Pennsylvania mountainous terrain.

L. Sprawl

The proposed site is not an appropriate location for a landfill. According to Penn Environment (www.pennenvironment.org), out-of-control development is rapidly transforming the landscape of Pennsylvania. Between 1992 and 1997, the Commonwealth lost a half million acres of farmland, forest and other open spaces. That's ten acres per hour. Along with the loss of open space, over-development leads to more pollution of our waterways, more traffic and air pollution, and greater threats to wildlife as their habitat is destroyed.

The Applicant often refers to the proposed landfill and Interchange as the key elements of a future industrial park necessary to the economic development of Rush Township. No economic justification is presented for such a development. The Rush Township Comprehensive plan states that the analysis is contained in the Point of Access Study (POA) prepared for PennDOT.

However the POA table simply lists the number and types and of businesses which *might* operate in the Industrial Park, and the average employment which *might* result. There is no documentation of the commitment of businesses to invest in the area or any other indication of market feasibility. Other impediments to development include the lack of sewer service, on site water, electricity or road infrastructure. The plan indicates that there are a number of brownfields within the area which adds to the serious questions regarding the marketability of the site. Given all the competing potential (and more attractive) industrial development sites already existing along I-80 this is a very unlikely candidate for economic development.

Whatever the number of jobs which might be created, Rush Residents would have no direct access to the proposed interchange and would have to travel ten miles or more to get to the site. If any citizens at the far reaches of the Township (or outside of Rush) decide to move closer to the site, this would add to the diffusion of population and, hence, sprawl.

M. Capacity

The CCSWA has developed a plan which guarantees capacity for the future for the garbage which is generated in Centre County. There is a contract to use the landfill in Somerset County through 2013, with an option through 2018. In addition, there are several backup agreements with other landfill or waste disposal operations in Pennsylvania.

Pennsylvania has over 12 years of disposal capacity. This calculation does not include incinerators, whose capacity will not be exhausted. In many cases, existing landfills may be expanded and their owners will submit expansion applications as capacity is needed, such as the Conestoga Landfill in Berks County (Southcentral Region) which currently has a 12-year, 5,000 ton per day expansion pending which has cleared the Harms-Benefit review and Tullytown (Southeast Region) which currently has a Major Facility Operating Permit renewal and Municipal Landfill Permit modification pending. It would be more appropriate to continue to use existing sites closer to the origin of waste than a new greenfield remote from population centers. The Applicant's argument for capacity need is exaggerated.

N. Health Effects

Those affected include landfill workers, waste haul truckers, and residents and visitors to the surrounding communities. The sources of health problems include emissions from the landfill (e.g., vectors, outflow water quality, landfill gas, NMOC, other volatile organics), waste hauling trucks (e.g., exhaust emissions, spills) or both (e.g., odors, dust, smog). The causes can be a single source, such as disease spread by birds or rodents, or the more complex and insidious caused by a combination of factors (e.g., dust, diesel soot) that operate synergistically (see B.2.).

This issue will be specifically addressed in future submissions.

O. Economic Harm

1. Additional Cost to Snow Shoe and Rush Townships

These additional costs will be substantial and fall in three categories:

- providing and maintaining needed infrastructure
- providing needed basic and specialty services
- monitoring, auditing, and enforcement of the host agreements

These costs will definitely be much higher in both townships than in the heavier, populated, more industrialized, less remote, richer townships of Pennsylvania. While these other townships are already equipped and can add landfill responsibility to systems already in place, Snow Shoe and Rush Townships need to create and fund these systems. Also, the proposed landfill site and surrounding area is more hostile—remote, isolated, mountainous, transected by major streams, subject to severe winters and fog, and serviced primarily by one gravel/dirt road that follows the course of least construction resistance.

Neither Snow Shoe nor Rush Township has a police force. They depend on the State Police. Their volunteer fire departments and Emergency Medical Technician (EMT) services, although good, provide only the most basic services. They have neither the permanent staff nor the specialty and hazmat training, nor all the equipment, to fully treat a landfill fire or spill. The closest hospital (Philipsburg) is closed and the closest medical clinic (Snow Shoe) was closed recently for several months, and currently has only Monday through Friday daytime hours, and offers only basic family medical care.

Both Rush and Snow Shoe Townships have practically no supporting or monitoring staff. Legal and accounting expertise is externally purchased on a per need basis. Their need for these staff will greatly increase.

It will cost both townships substantially to properly manage, monitor, audit, and enforce their host agreement with RRLLC. For example, to prohibit trash trucks from using the gravel access road (Gorton Road) through Snow Shoe Township, RRLLC allows Snow Shoe to fine them for each incident. However, the burden of proof is on Snow Shoe Township which has neither a constabulary nor a police force. Do you establish a police force to patrol this remote road or install a continuously operated, and sophisticated integrated cameras/flash system, then hire the maintenance and technical support to provide legally defensible proof? Note that at \$30 per ton for 2,000 tons per day (TPD), Snow Shoe Township's Cooperation Agreement fee is only \$204,000 per year. This single enforcement alone could consume much of this income.

The Rush Township host fee similarly computed is about \$1.1 million per year, but their need for additional administrative, police, hazards, legal, technical, and monitoring capability to deal with the landfill and host agreement may consume much of this as well.

2. Direct Impact on Local Industry/Business

a. Zett's Fish Farm & Hatcheries Inc. (Drifting)

Viral Hemorrhagic Septicemia (VHS) is of special concern for fish hatcheries—exposed fish cannot be transported or introduced into other areas. Although Form D requests an inventory of national and state fish hatcheries, it fails to ask about commercial ones. As such, the Applicant was not required to identify a native game fish hatchery within four miles of the proposed site. Zett's Fish Farm and Hatchery Inc. (est. 1900) is a 200-acre, family owned and run business that specializes in breeding game fish (e.g., bass, pike, trout). Landfill birds and gulls seeking water or feasting on young hatchery fish are a potential nuisance, but the introduction of bird-carried VHS to these spring-fed hatchery lakes in Drifting has the potential to destroy a 107-year-old sustainable business establishment that supports more families than this landfill may employ.

Resources: Whelan, G.E. (2006, Nov 9). Viral Hemorrhagic Septicemia (VHS) Briefing Paper. MI DNR

III. Environmental and Social Injustice

“All across America, a burgeoning multi-million dollar waste management industry targets small rural communities that lack protective zoning. They descend upon the local citizenry armed with a mixed bag of weapons— manipulation of environmental laws through political influence, enormous financial resources, an intimidating phalanx of lawyers, and the promise of big bucks. They buy, coerce, threaten and bully, seduce and entice, and eventually force their will on the local population.” From C.L.E.A.N. (Columbia-Lycoming Environmental Action Network)

A. Snow Shoe Township Cooperation Agreement

The above statement could have been written about the Snow Shoe Township Cooperation Agreement. One of the most difficult obstacles for RRLLC to overcome has been waste hauling access. The Applicant stated at both their May 2004 (Rush Township) and their June 2006 (Snow Shoe Township) 2004 initial presentations that the landfill project would not move forward without

a “dedicated I-80 Interchange” and the participation of both Townships. However, when RRLLC encountered difficulty in securing the necessary local approvals to move the Interchange project forward they threatened to use Snow Shoe Township roads for their trash hauling as a way to force support from the Snow Shoe Township Supervisors for the I-80 Interchange. The following sequence of events is a classic example of a waste management developer forcing his will upon the local population:

- 06/03/04 The Snow Shoe Township Supervisors deny RRLLC’s request for a zoning change.
- 05/09/05 Snow Shoe Township Supervisors send a letter (signed by all three supervisors) to Federal Highway Administration objecting to the I-80 Interchange.
- 09/19/05 The CCMPO denies RRLLC’s request to include the I-80 Interchange in their long range transportation plans.
- 10/13/05 Rush Township amends their Host Agreement to allow the use of local roads.
- 12/20/05 RRLLC sends a request to Snow Shoe Township for a favorable zoning determination to construct a “driveway” from SR53 to the landfill site in Snow Shoe Township, that is, using local roads for waste hauling.
- 01/30/06 Snow Shoe Township denies their request.
- 02/07/06 RRLLC appeals the denial.
- 02/07/06 Two of the three Snow Shoe Township Supervisors sign an agreement with RRLLC. Snow Shoe Township agreed to support the I-80 Interchange and RRLLC agreed hold the appeal in abeyance and restrict waste truck hauling to I-80. The supervisors were pressured into signing the agreement the same evening they read it for the first time.

As we pointed out in Section O-1, it will be very difficult for Snow Shoe Township to enforce this agreement.

Not only did RRLLC use this agreement in trying to secure the I-80 Interchange, when they submitted their application in May 2006 they claim this as a evidence of support by Snow Shoe Township, and as a benefit in Section N, page 24 of the Form D Narrative Discussion. This could not be further from the truth. The ONLY reason the Supervisors signed this agreement was to keep waste hauling traffic off of township roads and avoid a costly lawsuit. Until this agreement was signed, the Supervisors supported their residents and consistently and publicly voiced their opposition to the landfill. DEP should not reward developers who force their will upon local populations by giving consideration to “benefits” they gained through threats and coercion.

B. Social Injustice— Why should this area be a receptor site for other areas’ waste?

The proposed site is not an appropriate location for a landfill. It is not close to any major cities or waste generators. The landfill will perpetuate environmental and health harms than have been inflicted for decades on our residents and our small, rural communities.

Residents of this area have been subjected to the environmental harms from the coal industry for decades. Our streams have been degraded and our forest stripped and scarred. The proposed site, although mined in the past, is well-recovered and useful for much more than a landfill, which would only degrade our forest and streams again.

Not only has our environment suffered from the past coal mining, but our ancestors have suffered as well— from black lung and mine explosions. There are studies that document increased health problems associated with landfills, both physiologically and psychologically. We don’t want our

descendents to suffer from the physiological, psychological, and environmental harms from a mega landfill. By allowing the cheap option of burying waste in formerly coal mined areas to jeopardize the same population, we continue this destructive cycle. It is time to break this cycle here and now.

Our Commonwealth, already the largest importer of waste, should not continue to sacrifice our environment and its citizens' long-term health for short-term financial gain. We should focus our efforts on reducing, reusing, and recycling our resources rather than burying them in landfills. It is past time to implement a solution other than dumping in our coal-mined areas and on our descendants.