



In the March 7, 2002 order, the Board found that Robke violated Section 24 of the Act (415 ILCS 5/24 (2002)) and Section 900.102(a) of the Board regulations (35 Ill. Adm. Code 900.102(a)). Specifically, the Board found that noise from the Mascoutah Car Wash unreasonably interfered with the complainants' lives. The complainants did not seek a civil penalty in the proceeding. Rather, they requested that the Board require Robke to take steps to eliminate the noise emissions from car wash. Complainants requested an order directing Robke to undertake control measures that they suggested, and were discussed by their witness Mr. Gregory Zak (Zak) in his testimony at the November 13, 2002 hearing. McDonough v. Robke, PCB 00-163, (Mar. 7, 2002).

The Board was not convinced that the record supported adoption of all of the control measures suggested by the complainants. For example, the Board questioned the economic reasonableness of shutting down the Mascoutah Car Wash between the hours of 10:00 p.m. and 7:00 a.m., and noted that the record also contains contradictory suggestions on an appropriate noise wall.

The Board found the record lacked sufficient evidence for the Board to determine what steps are reasonable to reduce the noise emissions. Accordingly, the Board directed Robke to file a report, within 120 days of March 7, 2002, that detailed a plan for reducing the noise emissions reaching the complainants' residence. Robke was directed to consult with a noise expert, and provide options to reduce the noise emissions, as well as information about the effectiveness of each offered option.

### **ROBKE'S LETTER**

On August 5, 2002, Robke's attorney sent a letter to Board Hearing Officer Stephen Langhoff. The letter indicated that Robke has retained an engineer to conduct a noise study. Letter at 1.<sup>1</sup> The letter asserts that Robke would agree to disable the warning beepers associated with the car washing equipment, and construct a 6-foot fence between the car wash and the complainants and along the rear of the property. *Id.* In the letter, Robke contends that the City of Mascoutah has indicated that it would not look favorably upon an application of variance for a 12-foot fence, but has not responded to a request to put this position in writing. *Id.*

### **ROBKE'S SOUND SURVEY**

On September 18, 2002, Robke filed an Environmental Sound Survey prepared by Engineering Dynamics International (EDI). The stated objectives of the survey were to quantify the sound level of the different components of the car wash, establish background sound levels for the area, evaluate compliance or violations and provide some practical recommendations for reducing the sound levels from the car wash. Survey at 1.

In preparing the survey, EDI monitored the sound continuously from August 7, 2002 to August 17, 2002, at two locations at the car wash. EDI also conducted one-third octave band

---

<sup>1</sup> The August 5, 2002 letter will be cited as "Letter at \_\_\_."; the Environmental Sound Survey will be cited as "Survey at \_\_\_."; the complainants' reply to the survey will be cited as "Reply at \_\_\_."

spectral measurements on August 19, 2002, at three separate locations. Survey at 2. The survey also makes conclusions as to whether or not the sound emitted from the car wash violates allowable levels set forth in the State of Illinois Noise Codes. As the Board previously found nuisance noise violations, this information is being considered solely to determine what remedial actions are necessary to reduce the noise emissions.

The survey indicates that the vacuum cleaners and beeping alarms are the main sources of identifiable sound from the car wash. Survey at 2. EDI recommends that a noise wall on top of the berm at the south property line would be the most efficient way to protect the complainants' house. Survey at 2. The survey recommends a 4-foot wall on top of the existing 6-foot berm, resulting in a structure 10 feet from ground level. *Id.* The survey finds that if that option is available, no other treatment is required.<sup>2</sup> *Id.*

EDI then addresses other options to reduce noise emissions to the south property. EDI recommends the application of acoustical noise attenuation material to the vacuum stations. Survey at 7. EDI asserts that the material can be mounted or form fitted to the cylindrical tanks of the vacuums by mechanical fasteners or clips. *Id.* In addition, EDI asserts that the vacuums on the south side of the car wash are the largest contributor to the sound levels along the south property line, and should be relocated to another area on the north side of the site. Survey at 2,7. EDI contends that the measures regarding the vacuums will result in a decrease in the total sound contribution to 45 dB(A) or less. Survey at 7.

EDI suggests that if the beeping alarms are volume-controlled, they should be adjusted by 6 dB on each component that employs an alarm. Survey at 7. However, EDI asserts that the best alternative to eliminate the beeping sound is to convert to a flashing light system to signal the completion of the operation. Survey at 2, 7.

### **COMPLAINANT'S REPLY TO SOUND SURVEY**

The complainants assert that two highly effective steps are available to reduce the noise pollution from Robke's car wash: the construction of an appropriate noise barrier and the closing of the car wash from 10:00 p.m. to 7:00 a.m. Reply at 2. The complainants note that the survey is silent on any economic issues, particularly on the option of closing the car wash at night. Reply at 3. The complainants assert that the survey does not mention how the suggested height or location for the noise wall was determined. *Id.*

The complainants' expert, Zak, reviewed Robke's survey and offered his assessment. First, Zak has serious reservations regarding the credibility of the measurements contained in the survey. Reply at 4. Zak does, however, concur that a noise wall on top of a berm would be an

---

<sup>2</sup> The survey is inconsistent in this regard. In the executive summary section, the survey states that no other remedial treatment is required if the 10-foot noise wall is acceptable. Under the recommendations portion of the survey, EDI characterizes the noise wall as the best option to attenuate sound, but then recommends additional remediation as well. In its conclusion, the survey recommends treating the vacuums and beeping alarms as outlined in the body of the survey.

effective means to reduce noise from the car wash. *Id.* Zak asserts that the wall should be at least 12 feet high and located as close to the car wash area as possible in order to provide line of sight protection to the ground floor of the complainants' residence. *Id.*

Zak specifies that the noise wall should be airtight from the ground to the top and constructed of a solid material with a minimum density of 1 pound (lb) per square foot. Reply at 3. Zak asserts that the barrier should be L-shaped, 12 feet high, and run east and west for 150 feet and north and south for 60 feet. *Id.* The complainants contend that, based on discussions with Mascoutah's city manager, a combination 6-foot berm and 6-foot fence noise barrier that was appropriately landscaped to soften the appearance of the 12-foot structure would be a workable variance and solution. *Id.*

The complainants obtained estimates from various contractors and assert that a 6-foot L-shaped berm 150 feet by 60 feet in length, with a base of 40 feet and a flat top of 8 feet would cost between \$2,000 and \$4,000 to build. Reply at 3. The complainants assert that an airtight 6-foot fence constructed of half-inch outdoor grade plywood over the entire length of the berm would cost approximately \$5,000. *Id.* The complainants contend that landscaping the berm with trees and groundcover would cost approximately \$2,500 to \$4,000. *Id.* The complainants conclude that a suitable noise barrier could be constructed for \$9,500 to \$13,000. Reply at 4.

The complainants next address the nighttime noise issue. The complainants assert that the most disturbing and stressful noises emanating from the car wash are those that wake them during the night or prevent them from falling asleep. Reply at 4. The complainants contend that the predominant noises in this regard include loud engines and mufflers, radios and people yelling, and that these are the specific types of sounds Zak classifies as low frequency noise that would be least attenuated by a noise barrier. *Id.* Accordingly, Zak recommends closing the car wash from 10:00 p.m. to 7:00 a.m. *Id.* The complainants assert that the car wash should have an electric timer cutting off the power at 10:00 p.m. and simultaneously turning on a small sign indicating the car wash is closed. Reply at 5.

The complainants agree with the survey's recommendation to wrap the vacuums and to use flashing lights in lieu of beepers to control noise. Reply at 4. However, Zak does not believe that moving the set of vacuums nearest the south property is advisable. *Id.*

## **DISCUSSION**

The Board previously found that Robke's facility unreasonably interfered with the enjoyment of the complainants' property in violation of Section 24 of the Act (415 ILCS 5/24 (2002)) and 35 Ill. Adm. Code 900.102. The only issue left was what remedy would be appropriate in this case. The complainants sought only to have the noise reduced; the complainants did not seek a civil penalty.

The Board next considers the noise abatement measures that the Board will order Robke to undertake.

### **Section 33(c) Factors**

In determining the appropriate remedy, the Board must consider the factors set forth in Section 33(c) of the Act. *See* 415 ILCS 5/33(c) (2002). The Board's findings on the Section 33(c) factors from the March 7, 2002 interim opinion are incorporated by reference and summarized below.

The Board found that the noise substantially and frequently interfered with the lives of the complainants. The Board accordingly found that the noise is of sufficient character and degree to be unreasonable, and weighed this factor against Robke. *See* 415 ILCS 5/33(c)(i) (2002). The Board found that Robke provided sufficient evidence to show that the Mascoutah Car Wash has some social and economic value. *See* 415 ILCS 5/33(c)(ii) (2002). The complainants have priority of location in that they bought their home in 1992, six years prior to when Robke built the Mascoutah Car Wash. When the complainants purchased their property, the surrounding farmland was zoned agricultural. The Board weighed this factor evenly between the parties. *See* 415 ILCS 5/33(c)(iii) (2002). The Board found that the parties presented several options that may be technically practicable and economically reasonable to effectively reduce or eliminate noise at the car wash. *See* 415 ILCS 5/33(c)(iv) (2002). The Board found that the respondent's good faith abatement efforts have not eliminated the interference. *See* 415 ILCS 5/33(c)(v) (2002).

In light of these findings, the Board will determine the appropriate remedy.

### **Noise Wall**

Both parties propose the construction of a noise wall. However, Robke recommends a structure totaling 10-feet from the ground and 200 feet in length along the south property line. The complainants advocate a structure totaling 12-feet from the ground and L-shaped in design along the south and west side of the car wash. The Board finds that a 12-foot structure with a minimum density of 1 lb per square foot is reasonable to reduce the noise. A 12-foot structure is necessary to provide line of sight protection from the car wash to the ground floor of complainants' property.

The Board will require Robke to build the structure in an L-shape along the west and south property line. The wall must run east and west for 150 feet and north and south for 60 feet, and be airtight from the ground to the top and constructed of a solid material with a minimum density of 1 lb per square foot. The length of the noise wall is only ten feet longer than that proposed by Robke. A combination 6-foot berm and 6-foot fence noise barrier will be required.

The Board finds that it would not be reasonable or necessary to place the structure near the existing car wash, especially in light of the testimony in the record regarding Robke's future plans for expansion. The construction of noise wall totaling 12-feet high from the ground level is sufficient to reduce the noise from the car wash.

The record is unclear as to whether a variance from City of Mascoutah will be necessary, or obtainable, prior to the construction of a noise wall. At hearing, Robke asserted that the

maximum height for a fence in the city of Mascoutah is six feet. The record contains a number of references to the need for a variance before construction can commence. Robke did not address this issue in the sound survey, but did assert in its August 5, 2002 letter that the city has indicated it would not look favorably upon an application of variance for a 12-foot fence. The complainants contend that a combination 6-foot berm and 6-foot fence noise barrier was discussed with Mascoutah's city manager and deemed a workable variance and solution.

The Board is requiring Robke to construct a noise wall. Should Robke run into insurmountable difficulties with the City of Mascoutah during the construction of the noise wall, Robke may attempt to modify this Board order as required.

### **Changes in Operations**

The Board finds that requiring Robke to cease operations from 10:00 p.m. to 7:00 a.m. is not reasonable. The Board will require that Robke wrap the vacuums with acoustical noise attenuation material and use flashing lights in lieu of beepers to control noise. The Board finds these measure coupled with the construction of the aforementioned noise wall will be sufficient to control the noise from the car wash during both the day and the night. Finally, as the complainants do not think it advisable, the Board will not require moving the set of vacuums nearest the south property to a different location.

The Board will order Robke to cease and desist from any further violations of the nuisance noise prohibitions of 415 ILCS 5/24 (2002) and 35 Ill. Adm. Code 900.102. This is consistent with Board orders in similar cases, in which the Board has ordered a respondent to implement specific abatement measures and to cease and desist from further violations. *See Thomas v. Carry Companies of Illinois*, PCB 91-195, slip op. at 3. (May 19, 1994); *Madoux v. B & M Steel Service Center, Inc.*, PCB 90-148, slip op. at 6-7 (Nov. 19, 1992).

The Board will not order Robke to comply with numeric sound limits or to record its sound emissions to determine if they exceed those limits. Robke is already subject to the Board's various numeric sound limits and complainants did not show that Robke has violated those limits.

### **CONCLUSION**

As discussed above, the Board will order Robke to cease and desist from further violations and to perform specific noise abatement measures. Based on the record, the Board finds these remedies to be technically feasible and economically reasonable methods of reducing the noise emissions from Robke's facility.

The Board incorporates by reference its findings of fact and conclusions of law from its interim opinion. This final opinion constitutes the Board's findings of fact and conclusions of law in this matter.

### **ORDER**

1. The Board finds that Gary Robke unreasonably interfered with the enjoyment of life in violation of the nuisance noise prohibitions of 415 ILCS 5/24 (1996) and 35 Ill. Adm. Code 900.102.
2. Robke must cease and desist from any further violations of 415 ILCS 5/24 (1996) and 35 Ill. Adm. Code 900.102.
3. Robke must construct an airtight barrier at its Mascoutah Car Wash in Mascoutah, St. Clair County. The barrier must run continuously on the southern and western property line of the car wash. The barrier must be completed within 180 days of the date of this order.
  - a. The barrier must be designed and installed in accordance with good engineering practices (including good noise control engineering practices) and under the supervision of a qualified noise control engineer.
  - b. The barrier must be airtight and of uniform elevation. The barrier must be 12 feet high and consist of a 6-foot high berm topped with an airtight 6-foot high fence constructed of a solid material with a minimum density of 1 lb per square foot.
  - c. The barrier must be a contiguous L-shape and be 150 feet in length running east to west and 60 feet in length running north to south.
  - d. Robke must maintain the barrier in good condition.
4. Robke must wrap all vacuums in a Hush Cover or equivalent acoustical attenuation material. The material must be mounted or form fitted to the cylindrical tanks of the vacuums by mechanical fasteners or clips.
  - a. All acoustically absorptive material must be installed in accordance with good engineering practices (including good noise control engineering practices) and under the supervision of a qualified noise control engineer.
  - b. Robke must maintain all acoustically absorptive material in good condition.
5. Robke must use flashing lights in lieu of beepers on all car wash equipment.

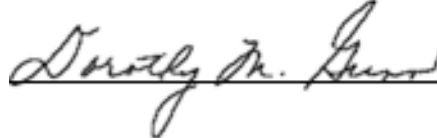
IT IS SO ORDERED.

Board Member M.E. Tristano dissented.

Section 41(a) of the Environmental Protection Act provides that final Board orders may be appealed directly to the Illinois Appellate Court within 35 days after the Board serves the

order. 415 ILCS 5/41(a) (2002); see also 35 Ill. Adm. Code 101.300(d)(2), 101.906, 102.706. Illinois Supreme Court Rule 335 establishes filing requirements that apply when the Illinois Appellate Court, by statute, directly reviews administrative orders. 172 Ill. 2d R. 335. The Board's procedural rules provide that motions for the Board to reconsider or modify its final orders may be filed with the Board within 35 days after the order is received. 35 Ill. Adm. Code 101.502; see also 35 Ill. Adm. Code 101.902, 102.700, 102.702.

I, Dorothy M. Gunn, Clerk of the Illinois Pollution Control Board, certify that the Board adopted the above opinion and order on February 6, 2003, by a vote of 6-1.

A handwritten signature in cursive script, reading "Dorothy M. Gunn", written over a horizontal line.

Dorothy M. Gunn, Clerk  
Illinois Pollution Control Board