ILLINOIS POLLUTION CONTROL BOARD July 19, 1985

VILLAGE OF ADDISON,)
Complainant,)
v .) PCB 84-160
TEDIO PRINTING COMPANY,)
Respondent.)

LOFTUS, DUFF & GARRITY, LTD. (MR. HUBERT J. LOFTUS AND PATRICK M. LOFTUS, OF COUNSEL) APPEARED ON BEHALF OF THE COMPLAINANT.

ERBACCI, SYRACUSE & CERONE, LTD. (MR. ANTHONY G. ERBACCI, OF COUNSEL) APPEARED ON BEHALF OF THE RESPONDENT.

OPINION AND ORDER OF THE BOARD (by J.D. Dumelle):

This matter comes before the Board on an October 31, 1984 Complaint filed by the Village of Addison (Village) which alleged that Tedio Printing Company (Company) operated its two heatset web offset presses so as to cause air pollution in violation of Section 9(a) of the Illinois Environmental Protection Act (Act) and noise pollution in violation of Section 24 of the Act. The Village alleges that air pollution was caused by smoke and odor coming from the ink and enamel coated paper as it ran through Tedio's drying ovens, while noise pollution came from the cutting blades on each press sheeter. The Village requests the Board to direct Tedio to "cease and desist" from the alleged violations of the Act. A hearing was held on April 1, 1985 at which members of the public were present. The Village filed a memorandum in support of its position on May 28, 1985, and Tedio filed its post-hearing brief on June 3, 1985.

On July 12, 1985, the Village filed a motion to amend the record to include a permit denial letter sent to Tedio by the Agency on June 11, 1985, regarding the construction and operation of the afterburner/stack heater for Tedio's two Web Offset Presses. Tedio responded to that motion on July 5, 1985 (problems with the mail apparently explain the unusual timing of the filing of these documents). Upon review of that document the Board has concluded that it contains insufficient material evidence to justify its admission at such late date. Therefore, the motion to amend is hereby denied.

Tedio Printing Company is located in a leased building at 930 National Avenue in Addison, Illinois. (R. 189). The plant is located in an industrially zoned area known as the Addison Industrial Park and its rear yard abuts a residential neighborhood known as the Heritage Subdivision that is zoned for

single-family and duplex dwellings. Various industrial properties in the Addison Industrial Park are located directly to the east and west of Tedio's lot. The lot also lies directly south of the backyards of some houses on Heritage Drive, which were built long before Tedio began its printing operations in 1982. (See Village's Exhibit #6). There is a ten-foot high fence covered with a plastic-type material which is set approximately 30 feet inside Tedio's property line separating its printing plant from the residences and serving as a buffer between the industrial and residential areas. The fence potentially cuts down noises to some minor extent and helps to shield the residential dwellers from the possible aesthetic unsightliness of the industrial space. (R. 190-195).

In addition to its main printing plant, Tedio also has a warehouse located about 30 feet west of the main plant which is used to store paper prior to printing. Because of the nature of Tedio's printing business, it is sometimes necessary to bring paper from the storage warehouse to the main plant in the middle of a shift to begin a new printing job. Forklift trucks are used to bring the needed paper from the warehouse to the plant. This retrieval process sometimes occurs during the night and necessitates the opening of the plant doors. Tedio has indicated that most of the paper is moved from the warehouse to the main plant during daylight hours and that schedules are designed to minimize any nighttime movements between buildings. (R. 206-208).

The plant presently includes two American Type Foundry (ATF) heatset web offset lithography presses and one non-heatset Color King web offset press (Press #3) which was recently installed. (R. 163). The first heatset web offset press (Press #1) was installed about three years ago when the plant opened in April, 1982. The second heatset web offset press (Press #2) was installed in July, 1984, at which time complaints from neighboring residents pertaining to excessive smoke and odor first began. (R. 163; R. 189-190). Printing is customarily done until all jobs are finished, even if this means operating the presses up to 24 hours a day, 7 days a week during peak seasons (See Village Group Exhibit #10; Tedio's Exhibit #1).

The printing process of lithography involves printing from a plain surface (such as a metal plate) on which the image to be printed is ink-receptive and the blank area is ink-repellant. Heatset lithography involves the application of heat to the printing paper in order to drive the solvents out of the ink. The paper is then "passed over a set of chill rollers which actually sets the ink for drying". (R. 163). In this process there are visible smoke emissions when the ink dryer brings the temperature of the liquid ink solvent "above its gas point, where it changes from a liquid to a gas". (R. 164). However, there are no emissions whatsoever from Press #3 because non-heatset lithography does not require the application of heat to the printing substrate (i.e., paper) since the ink dries by the

process of oxidation. (R. 163-164).

Before Tedio installed Press #2 in the latter part of July, 1984, the complaints by neighboring residents generally related to loud, constant noises emanating from the operations of Press #1 which resulted in sleep loss, annoyance, physical discomfort, and the inability to enjoy the use of property especially during warmer weather when the doors and windows of Tedio's facility were open. Neighbors also were disturbed at night when paper from the warehouse was moved by forklift trucks to the main printing plant. After Press #2 was installed, additional complaints related to smoke and odor which also interfered with enjoyment of homes and property. (R. 19-22; 108-111; 116; 126; 128-133).

Shortly after Press #2 was installed, the fence serving as a partial noise barrier separating the residents who live adjacent to the printing plant on Heritage Drive was blown down during a (R. 190). Some residents of the Heritage severe windstorm. Subdivision contacted Tedio and complained about excessive noise from Tedio's facility and subsequently complained to various local, state, and federal officials about excessive noise, smoke, and odor from the printing plant. As a result of these complaints, a meeting of the Village of Addison's land use committee was held on August 7, 1984 with Tedio's representatives in attendance. (R. 134; 190; 219-220). An agreement was reached between the parties in which Tedio agreed to re-erect as quickly as possible the fence in the rear yard and to lower the overhead doors of Tedio's facility halfway during nighttime hours to control the noise in exchange for a promise from the residents to cease their numerous telephone calls and complaints to Tedio, the Village, and the Illinois Environmental Protection Agency (Agency). (R. 190-191).

This agreement was short-lived. Tedio stated that, although measures to ensure that its doors were kept halfway closed began the day after the August 7, 1984 meeting, some communication problems between shifts led to some noncompliance when employees opened the doors to obtain ventilation while they were working in the hot weather. (R. 192). Further, the Village indicated that even with the doors half-closed, there were no noticeable reductions in noise levels. (R. 144; 229). On the other hand Tedio believes that the residents jumped the gun and prematurely began complaining. (R. 192-195). However, Tedio did take over two months to get the fence replaced due to negotiations with the insurance company and haggling with contractors.

Subsequently on November 14, 1984, Tedio's representatives attended a pre-enforcement compliance conference held at the Maywood offices of the Agency pursuant to Section 31(d) of the Illinois Environmental Protection Act (Act). At this conference, Tedio agreed to install an afterburner; forego some heavy ink coverage jobs even after the air pollution control equipment was installed; and schedule certain jobs when they would not

interfere with the activities of local residents. (R. 48-51).

Noise Pollution

The Village alleges that Tedio violated Section 24 of the Act which prohibits any person from emitting "beyond the boundaries of his property any noise that unreasonably interferes with the enjoyment of life ..., so as to violate any regulation or standard adopted by the Board. In support of the alleged noise pollution violations, the Village produced and entered into evidence three noise survey tests which were conducted on the perimeter of Tedio's property. The Village further presented testimony by several witnesses who live in the vicinity of Tedio's plant.

The first noise test, which was made at the south property line of the residences on Heritage Drive on September 10, 1984, was conducted by Alexis Risk Management Services. (Village's Exhibit #3). This test shows that Tedio exceeded both the applicable daytime and nighttime noise standards. Daytime exceedances are 5-10 db and nighttime exceedances are 10-15 db in the 1000-8000 Hertz range.

The second noise test was conducted on August 20, 1984 by Mr. Donald Rudny, a mechanical engineer. This test was made at 865 Heritage Drive, the residence of Mr. Rudny's sister and (R. 74-75). Mr. Rudny's sister asked him to perform these tests because "some preliminary EPA measurements made prior to that date indicated that the noise level was marginally in violation of the Village ordinance and she felt that the noise was very significant and that it should have been much more in violation than the EPA measurements indicated". (R. 75-76). Rudny, who had prior experience with International Harvester Company involving noise testing work on construction equipment and diesel engines, conducted noise tests with rented equipment and found that the noise emitted from Tedio's facility significantly exceeded the requisite nighttime standards and marginally exceeded the applicable daytime standards. Daytime measurements showed exceedances of the state standards of approximately 5 db at 1000, 2000 and 4000 Hertz. Nighttime measurements showed exceedances of approximately 15 db in those same ranges. (R. 76-85; Village's Exhibit #5.) Thus, the noise test results of Mr. Rudny's noise survey were similar to the conclusions reached in the noise test conducted by Alexis Risk Management Services in that it showed Tedio to have exceeded both the permissible daytime and nighttime noise levels. Village's Exhibit #5).

The third noise test was conducted on March 19, 1985 by Mr. Mark Tucker, an in-house inspector in the Village's building department. The Village leased a precision sound level meter, octave filter set, and other appropriate noise measurement equipment from the Agency An experienced Agency employee, a neighborhood resident, and the Village building and housing

administrator accompanied Mr. Tucker during the testing. (R. 146-151). The results indicate that Tedio was in violation of the nighttime noise standards even with the plant's overhead doors fully closed, but did not reveal any daytime violations of applicable standards. (R. 150-151; and Village's Exhibit #2). Instead, during the daytime hours, some decibel readings were "exactly on" the appropriate limits. (R. 153). On cross-examination, Mr. Tucker admitted that his noise readings did not show the same degree of noise violations that were demonstrated by Mr. Rudny's tests and indicated that Tedio's nighttime violations were less than the other tests had shown. (R. 152-156).

At the hearing, various residents of the Heritage Subdivision testified that their lives had been disrupted by Mrs. Betty Burrows excessive noise from Tedio's facility. testified that she had often been awakened by late night noises from Tedio's printing plant. (R. 110-111; and Village's Exhibit Mr. James Burrows testified that he complained about the excessive noise from Tedio at Village Board meetings and complained to the Agency and the Governor. (R. 117-122). Another neighbor, Mr. Hugo Liepins, testified that he was bothered by loud noises from Tedio's operations during the summer months when the plant's doors were open. (R. 126-127). Mrs. Pat Rataj testified that when Tedio's doors and windows are open, she is disturbed by noises from the presses and cutters and also is disturbed by the nighttime movements of forklift trucks bring paper from the warehouse into the main building. (R. 129-133; and Village's Exhibit #3). She stated that, during the summer, the overhead doors are open after midnight "on many occasions". (R. 134-135). The noises, according to Mrs. Rataj, are "irritating all the year around, not only in summer". Mr. Anthony LaRocca, the acting Village Manager, testified that he had received many complaints from neighborhood residents pertaining to Tedio's operations and stated that, during the summer of 1984, he had personally heard noises from "machinery operating" at Tedio's site while he was in the Rataj's backyard. (R. 157-161).

Tedio has acknowledged that a noise problem exists at its plant and has attempted to develop a noise abatement program to eliminate the problems. Mr. Ben Williams, the President and part-owner of Tedio, testified that Industrial Noise Control, Inc. was asked to provide noise abatement equipment that will bring Tedio into compliance with applicable nighttime noise standards. (R. 209-211; and Tedio's Exhibit #4). Mr. Williams stated that he forwarded a purchase order to buy a flexible curtain absorber to surround various parts of the printing press and to cover a wall adjacent to the press, and a portable sound absorption curtain screen which will be installed to the rear of the printing presses in front of the doors near the entrance to the plant. (R. 209-214; R. 223; and Tedio's Exhibit #4-4A). Although these sound absorption devices were scheduled to be delivered to Tedio within four to six weeks from the date of the

order, they had not yet arrived at the time of the April 1, 1985 hearing. (R. 211; 221-223).

The Board concludes that Tedio has violated Section 24 of All three noise surveys show violations of 35 Ill. Adm. Code 901.102(b) which establishes nightime noise limitations and two of the three surveys show violations of 35 Ill. Adm. Code 901.102(a) which establishes daytime noise limitations. points out that Mr. Rudny used rented equipment, was asked by his sister to perform the tests, and that he is not a qualified environmental expert. However, his testimony shows knowledge of the equipment, he calibrated the meter to insure its accuracy, and his results are quite similar to those of Alexis Risk Management. While there are differences with the Village's tests which show no daytime violations; the record contains no evidence to show that both surveys could not be accurate. Several factors such as wind speed and direction, placement of the meters, and Tedio's operating conditions at the time of the tests could explain the discrepancies. For these reasons, the Board finds that Mr. Rudny's noise survey has probative value. results, as well as the substantial citizen testimony as to interference with the enjoyment of their lives and property of residents in the vicinity of Tedio are largely unrebutted and show violations of Section 24 of the Act. Further, the factors which the Board must consider under Section 33(c) of the Act bearing on the reasonableness of the emissions (discussed under the penalty section below), demonstrate that Tedio has caused an unreasonable interference with the area residents' enjoyment of life and property.

AIR POLLUTION

The Village also alleges a violation of Section 9(a) of the Act which proscribes air pollution, which in turn is defined in Section 3(b) of the Act, in relevant part, as "the presence in the atmosphere of one or more contaminants in sufficient quantites and of such characteristics and duration as to unreasonably interfere with the enjoyment of life or property." The Village alleges that such unreasonable interference resulted from smoke and odor emissions from Tedio's property.

There are visible smoke and odor emissions during the heatset process which occur in Press #1 and Press #2 due to the volatilization of the liquid ink solvent. (R. 164). To control smoke and odor emissions, Tedio installed an emission control device on the print line dryer exhausts in January, 1985, pursuant to its informal agreement at the pre-enforcement conference.

On March 11, 1985, the Village of Addison retained Dr. Sander Sundberg, as its environmental consultant to conduct tests relating to alleged smoke and odor emissions from Tedio's printing plant. (R. 33-34). Dr. Sundberg visited the vicinity of Tedio on six occasions on four different days. (R. 34 and

39). On two of these days (March 19 and March 20, 1985), his visits were unannounced. On three of these visits he was accompanied by Mr. Mark Tucker of the Village. Ms. Jean Damlos of the Agency once went with Dr. Sundberg during his smoke and odor testing. (R. 34-40).

On March 26, 1985, Dr. Sundberg performed a stack test on Tedio's emission control device in order to ascertain if it was functioning properly. Dr. Sundberg subsequently testified at the hearing that he believed the device that was installed on Tedio's equipment was a "stack heater" rather than a "catalytic afterburner" and indicated that he believed that a catalytic afterburner is a more effective apparatus. (R. 39; R. 44). Sundberg testified that, under normal operating conditions, an afterburner should heat up the contaminant gas stream at 1100 to 1400 degrees Fahrenheit or higher and maintain the temperature for a period of 0.3 to 0.5 seconds. (R. 36). Dr. Sundberg stated that, while the temperature in the middle of the flame in the burner was 1400 degrees Fahrenheit, the temperature at the top of the stack approximately six feet down from the flame averaged about 400 degrees Fahrenheit. (R. 37-39). This sharp drop off in temperature indicates that the gas stream might not be heated the requisite 0.3 to 0.5 seconds and, therefore, is "relatively ineffective in removing (combusting) odorous (Village's Exhibit #1, page 13). However, his off-site observations of ambient odor and his odor survey did not indicate any untoward odors. Thus, Dr. Sundberg's environmental evaluation indicated that Tedio's emission control device is less than completely effective in controlling smoke and odor, but that it "will reduce the visual opacity by increasing the exhaust temperature and reducing condensation of solvent, and it will also facilitate the dispersion of odorous material by increasing the effective stack height." (Village's Exhibit #1, page 13.)

Ms. Jean Damlos, an environmental specialist on air pollution who is employed by the Agency, testified that Tedio promised, inter alia, to install a catalytic afterburner to control emissions and smoke. (R. 151). However, after the installation of the afterburner, Ms. Damlos' March 26, 1985 inspection found that it was not a catalytic or thermal afterburner as she had seen on similar printing presses at other Instead, the equipment was a "stack heater" which facilities. "warmed the gases up to a higher temperature than they would have been without the heater" and was, in her opinion, less efficient. (R. 54; R. 60). She also stated that Tedio had not yet received an Agency permit for its afterburner. (R. 52-53).On the other hand, Mr. Ben Williams testified that Tedio had placed an order for an afterburner before he was told that such equipment was required and stated that the word "catalytic" was brought up at the pre-enforcement conference and he "didn't know what the word meant." (R. 226-227). He indicated that he was trying in good faith to comply with applicable regulations and to eliminate any problems at the plant. (R. 227-233). Mr. Williams testified that he didn't file any application for a permit prior

to the installation of the afterburner because he was unaware that a permit was required until Ms. Damlos visited the plant and told him that a permit was necessary. (R. 199). After Ms. Damlos mailed him the forms, Tedio "expedited it as quickly as possible" and had Tri-Heating Company prepare the documents. (R. 199-200; and Company Exhibit #1). After the application form was filled out, he "hand carried them to the Maywood office of the EPA for them to review, and it was filed." (R. 200). Tedio subsequently received a Certificate of Incompleteness from the Agency which notified Tedio that additional information was required. (R. 200-201; see: Company Exhibit #2). Tedio has prepared the additional requested information, but had not yet transmitted it to the Agency as of the date of the hearing. (R. 200-203).

On March 27, 1985, the Tri-Heating Company inspected the Their service report indicates that the afterburner afterburner. is operating efficiently and that the digital temperature read-out indicated that a temperature of 1408 degrees was reached (R. 203-204; and Tedio's Exhibit #3). during operations. Fred Valentine, a partner of Tri-Heating, Inc., testified that the incinerator afterburner that was installed has a chamber on top of the roof where a flame at 1400 degrees covers the entire opening and all the emissions have to pass through this flame before they are exhausted, thereby eliminating the smoke and the (R. 166-167). Mr. Valentine stated that "the thermal coupler (sic) is located just above the flame, approximately 6 to 12 inches above the flame, and the read-out is located downstairs by the presses" so that the temperature is taken at the thermal coupler location and then is transmitted to the digital read-out device (sic) in the plant. (R. 167-168). Although the incinerator afterburner is designed to burn the gases off at the flame, the temperature varies in the flue or the stack at various distances away from the actual flame. (R. 170-171). The system is designed so that the flame sometimes becomes visible through the top of the flue depending on the amount of ink that is used in the printing and if alcohol is being run in the fountain solution. (R. 170). Although Mr. Valentine stated that his firm's "experience" in installing these afterburners indicated the afterburner, s effectiveness, on cross-examination he admitted that he had not done any actual air quality tests to see if Tedio's afterburner was effective in removing odorous materials from the contaminant air stream. (R. 184-188).

At the hearing, some of the residents of the Heritage Subdivision testified that their lives had been disrupted and adversely affected by excessive smoke, odors, and fumes from Tedio's printing plant. Mrs. Barbara Maziarz testified that she has lived at 851 Heritage Drive for 13 years (R. 19). She first detected odors from Tedio in the summer of 1984 which were "very strong, burning, burning in a way that it burns your skin, it burns your eyes, and it burns your throat when you smell it. (R. 19-20). She has detected the same odors since January, 1985, but they are somewhat less than the odors in the summer.

(R. 20-21). She further testified that the smoke makes it "impossible" to be outside "for any period of time" (R. 21) and that she can distinguish the odors coming from Tedio Printing from the odors from L & S Company by observing the "chimney on Tedio and ventilators on L & S." (R. 21-22).

Mrs. Betty Burrows, who lives at 859 Heritage Drive, testified that her family was disturbed by "really heavy odor" which smelled like printing oil burning which came right into their apartment and family room from Tedio and indicated that at night the odors are "real heavy," while during the day it is not (R. 108.109; see: Village's Exhibit #8). Her husband testified that he kept a log which accurately indicated emissions of smoke and odor from Tedio's printing plant. (R. 114). He indicated that the smoke is not always the same color and is sometimes "dark blue" or "a brownish color" (R. 116) and that sometimes there is an odor connected with the smoke, but not all the time and that it depends on the direction of the wind (R. He described the periodic odor as smelling like "rotten eggs or burning sulfur". (R. 116). Mr. Burrows stated that the "odor is the same," but that Tedio does not emit as much smoke now because flames come from the chimney (R. 117). Mr. Burrows said it was easy to distinguish the emissions from Tedio Printing and L & S Company, because "there is a different smell in the smoke." (R. 119).

Two other local residents also complained about the odors coming from Tedio. Mr. Hugo Liepins, who has lived at 870 Heritage Drive for the last 12 years, testified that he was bothered by "noxious" odors which smelled like "burning oil" last summer when he went outside. (R. 126). In the colder weather, when his house windows were normally closed, he did not detect the odors. He also complained about a decline in property values and stated that if he wanted to sell his house, a buyer would be unavailable, "with such filth coming in" from Tedio. (R. 127). Mrs. Pat Rataj, who has lived at 865 Heritage Drive for over 13 years, testified that the odors started in July or August of 1984 and that there is a "strange" gassy smell that "burns your eyes" (R. 129) and that she sometimes has to close all the doors and windows to avoid the smells. (R. 129-130). She can't use their swimming pool or have guests over, thereby affecting the use and enjoyment of her home. (R. 130, and see Village's Exhibit #9).

The Board concludes that Tedio has violated Section 9(a) of the Act by emitting odors which unreasonably interfered with the enjoyment of life and property of residents in the surrounding area. However, this violation has not been as well established as the noise violation. The non-resident testimony appears to contradict that of the residents. In this regard, however, the Board notes that the residents are at the site all of the time, day after day, during the day and at night. The non-residents, however, have been at the site on a handful of days during normal working hours. This could explain some of the inconsistencies. There is also a question as to whether the residents could

determine specifically the origin of the odors. The record discloses that there are other facilities in the vicinity which cause odors. Finally, monitoring and modeling done by Dr. Sundberg indicates that an unreasonable interference with life and property appears unlikely.

In attempting to reconcile this evidence, the Board first finds that for the period of time up to Tedio's installation of its stack heater, Tedio emitted odors which unreasonably interfered with the enjoyment of the life and property of surrounding residents. Testimony regarding that period of time is nearly unrebutted. Residents testified at length regarding such interference and testitied that they could determine that Tedio was the source of the odors.

The installation of the stack heater, however, may in large part have cured the problem. Certainly, Dr. Sundberg's study indicates that to be the case. On the other hand, the residents indicate that unreasonable odors continued, though to a somewhat lesser degree. In reviewing Mr. Burrows' log (Village Exhibit 8), which is the most complete record emissions from Tedio's facility, most of the entries after the installation of the stack heater relate to flames and smoke rather than odors, whereas the bulk of the citizens' complaints rests on odors.

Tedio points out that while residents maintained that a sulfur-smelling, bluish-gray smoke was emanating from Tedio's plant, none of the three environmental specialists employed by the Village and the Agency who made unannounced inspections of the plant and surrounding areas detected any such emissions or odors. Ms. Damlos testified that when she visited the Tedio plant in August and September, 1984, she detected a faint odor and smoke on only one occasion. (R. 57-58) She also testified that in her inspections in February and March, 1985, she could detect no visible emissions and only a faint odor near the Tedio warehouse; she could not detect any odor in the residential area. (R. 62). Dr. Sundberg also testified that on his visits he detected no significant odors (R. 40).

In light of this conflicting testimony, Tedio submits that the testimony of the environmental specialists must be given greater weight than that of the residents and that their inspections make it clear that if the residents have had a problem with smoke and odor since January, 1985, Tedio's operations are not responsible for them. Tedio submits that Dr. Sundberg's March 1985 report must be dispositive of the question of whether or not Tedio is responsible for the odors, and cites the following Section:

Under the conditions that the Tedio plant was operating at on March 26, 1985, dispersion modeling indicates that there is minimal impact on the ambient environment. Under conditions projected for the operations of two print lines

simultaneously at normal and heavy loadings, it is possible that extremely sensitive observers may perceive an odor.

(Village Exhibit No. 1, p. 13).

However, this conclusion is specifically limited to March 26, 1985, and certainly does not stand for the proposition that Tedio has not, and is not, causing air pollution. What it does show is that under some operating conditions, the stack heater operates effectively. On the other hand, the citizen testimony indicates that it does not always operate effectively. The Board concludes that the preponderance of the evidence supports the finding of a violation of Section 9(a) of the Act both before and after Tedio's installation of its stack heater, although the extent of violation has diminished since its installation.

PENALTY

Under Section 33(c) of the Act the Board is required to take into consideration factors relating to the reasonableness of the emissions. First, the Board is to consider the character and degree of injury. As the testimony shows, the noise and odor emanating from Tedio has caused significant interference with the The interference, however, general welfare of area residents. has apparently lessened to some extent, especially as regards odors, but some remains. Second, Tedio does have social and economic value. However, Tedio's method of operation is such that its social value is reduced by the pollution it causes. Third, while the suitability of the site location is indicated by the fact that Tedio's property is zoned for its current use, there is no question that the residents of the Heritage Subdivision have clear priority of location, as almost all of the complaining residents have lived in the area for many years while Tedio has only been in business since April, 1982. One of the inherent problems involved here is that there exists a proximity between the industrial and residential zones which exacerbates any noise, odor, or smoke problems that occur. Fourth, there is no question that it is technically practicable and economically reasonable to reduce emissions to meet Board standards.

Although Tedio has claimed a willingness to correct the noise and air pollution problems and has taken various steps to rectify the situation, the fact remains that the problems have persisted since at least the latter part of July, 1984 when Tedio installed Press #2 and did not expeditiously replace the fence which was blown down in a severe windstorm. Tedio has asserted that it has made good faith efforts to come into compliance and cites its replacement of the fence; its installation of an afterburner; its purchase of various sound absorption barriers; and its efforts to meet the concerns of area residents. On the other hand, the complaining neighbors have basically argued that Tedio has done "too little, too late" and that Tedio's efforts, even if well-intentioned have not resulted in a resolution of the

problems of noise and air pollution. Expert testimony, while differing in its interpretation of the effects of Tedio's control measures, has indicated that a problem does, in fact, exist. In evaluating all the facts and circumstances of the instant case, and analyzing all testimony and exhibits presented at the hearing, the Board finds that a \$1,000 penalty is appropriate.

The Board will order Tedio to: (1) cease and desist from all further violations; (2) retain a professional engineer or other qualified environmental consultant in consultation with the Agency to conduct all necessary tests on the afterburner to see that all improper smoke, odors, and emissions are eliminated and insure that Wedio is in compliance with all applicable air pollution standards, including appropriate permits; (3) if necessary, expeditiously install a catalytic afterburner or other similar device which will, in fact, eliminate the smoke, odor, and other emission violations; (4) retain a professional engineer or other qualified environmental consultant in consultation with the Agency we conduct all necessary tests on the sound barriers installed to insure that the applicable nighttime and daytime noise standards are met; (5) if necessary, additional appropriate noise absorption barriers shall be expeditiously installed to bring Tedio's operation into full compliance with all applicable noise standarss; and (6) pay a penalty of \$1,000 to aid in the enforcement of the Act.

This Openion constitutes the Board's findings of fact and conclusions of law in this matter.

ORDER

It is the Order of the Illinois Pollution Control Board that:

- 1. Tedio Printing Company, has violated Sections 9(a) and 24 of the Illinois Environmental Protection Act.
 - 2. Tedio shall cease and desist from further violations.
- 3. Within 30 days of the date of this Order, Tedio shall, by certified check or money order payable to the State of Illinois, pay a penalty of \$1,000 which is to be sent to:

Illinois Environmental Protection Agency Fiscal Services Division 2200 Churchill Road Springfield, IL 62706

4. Within 45 days of the date of this Order, Tedio shall retain a professional engineer or other qualified consultant in consultation with the Agency to conduct all necessary tests on the afterburner to see that all improper smoke, odors, and emissions are aliminated and to insure that Tedio is in

compliance with all applicable air pollution standards. If necessary, Tedio shall expeditiously install a catalytic afterburner or other similar device which will, in fact, eliminate the smoke, odor, and other emission violations to bring Tedio's operations into full compliance with all applicable air pollution standards. Appropriate permits for any pollution control equipment shall be obtained from the Illinois Environmental Protection Agency.

5. Within 45 days of the date of this Order, Tedio shall retain a professional engineer or other qualified consultant in consultation with the Agency to conduct all necessary tests on the sound barriers installed to insure that the applicable nighttime and daytime noise standards are met. If necessary, additional appropriate noise absorption barriers shall be expeditiously installed to bring Tedio's operations into full compliance with all applicable noise standards.

IT IS SO ORDERED.

Dorothy M. Gunn, Clerk
Illinois Pollution Control Board