

# **The health effects of electrical pollution**

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# The health effects of electrical pollution

Americans are surrounded by electrical devices – computers, VCRs and a plethora of household gadgets and consumer appliances. There is also the assumption that the electricity (and associated electrical phenomena) are safely confined to the wires carrying electricity and to the electrical devices themselves.

For a variety of reasons, including the very design of the electrical distribution system, this assumption is no longer valid.

Electricity is a trusted component of contemporary civilization. Few notice the poles, wires, substations and transformers that deliver electricity. Fewer still pay any attention to the hidden lattice of wires in the walls of homes, offices, churches, factories and schools.

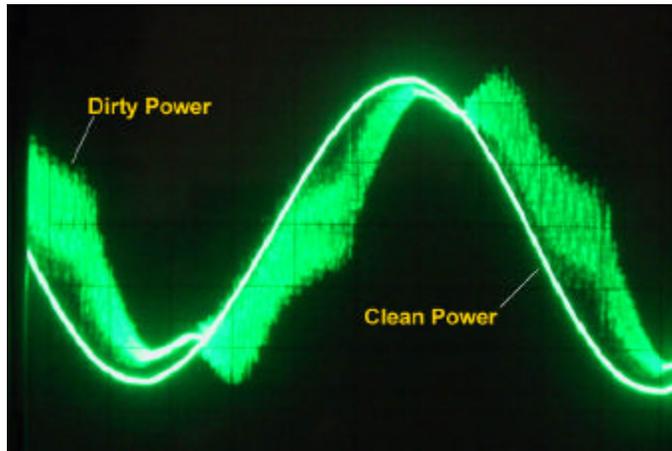
Yet all contribute to an increasingly dangerous electrical environment that has largely escaped systematic monitoring. The increased demand for electricity, and the proliferation of computers and other electronic devices have markedly increased our exposure to electrical phenomena. These phenomena are a ubiquitous presence in our lives, albeit invisible and odorless.

There is the widespread (and mistaken) assumption that our electrical environment has been carefully studied and monitored and, save for a few exceptions, found to be harmless.

The truth is that the millions of Americans live and work in environments that subject them to a variety of harmful electric phenomena.

One of the most potent contaminants is radio-frequency radiation.

antennae for the current, silently and insidiously assaulting those who play and work nearby.



**The green area in the oscilloscope display shown above represents 'dirty' power that contaminates normal (60 Hertz) electricity.**

In other words, the wires that deliver electricity have also become conduits for deadly high-frequency radiation, a form of electrical pollution that has largely escaped attention by the medical community.

The increased prevalence of this radio-frequency current has coincided with an alarming increase in the prevalence of ailments such as fibromyalgia, chronic fatigue syndrome, attention deficit disorder, diabetes and asthma.

*Innumerable studies have shown there is no "safe" level of exposure to radio-frequency current, which now routinely flows through the wiring of homes, schools and offices. It is a deadly "byproduct" of our electronic age.*

## Pervasive and deadly

Electrical pollution is indiscriminate. It affects young and old, women and men, mothers and infants, the rich and poor, secretaries and farmers, doctors and lawyers, factory workers and scientists.

Until its unsuspecting victims take action to reduce their exposure, symptoms worsen. There is no relief, no cure, no hope. Lives become a numbing maelstrom of despair and a desperate attempt to alleviate symptoms.

The harmful biological effects of exposure to electrical pollution have been established in numerous studies conducted during the past 50 years. Several countries have established

**'I have no doubt in my mind that at the present time that the greatest polluting element in the earth's environment is the proliferation of electromagnetic fields. I consider that to be far greater on a global scale than warming..'**

*Robert O. Becker, M. D., Author of Cross Currents and The Body Electric:*

## Radio-frequency radiation

Of particular concern is the high-frequency current created by computers and other electronic devices, which is often called "dirty current." This current is created by numerous devices and is conducted nearly everywhere. The wiring in buildings then acts as

standards limiting exposure to EMF, “dirty” current and other sources, systematically investigate their concerns.

In the United States, however, environments are seldom monitored for electrical pollution. The limited standards governing “dirty” current, for example, are applied only in industrial settings, and then only when levels are high enough to affect computers, motors and other equipment.

Until recently, people had no way of monitoring levels of dirty current in the environment. The introduction of a relatively inexpensive meter that could be plugged into a conventional outlet to monitor levels of this current led to some startling revelations.

Hundreds of people found that their health problems worsened during exposure to dirty current, and that they were exposed to this current in a variety of locations. The invention of a convenient filter that removes radio-frequency radiation provided noticeable and immediate relief to thousands of people. Some have managed to create or find environments where the levels are lower. However, most have found it impossible to find environments where levels are uniformly safe.

The following selected accounts are just a few of hundreds of similar stories that dedicated investigators have encountered during the past four years. It should be remembered that these investigations occurred outside the framework of institutional support that usually funds studies of this type.

The integrity of these investigators is beyond reproach. They conducted these studies at considerable personal and financial sacrifice. They were conducted by investigators who have desperately sought to have the scientific and medical community thoroughly and

Their requests have been ignored. Instead, they have often been subjected to scathing criticism and ridicule.

Most of those who have learned that their health has been adversely affected by electrical pollution had previously engaged in a lengthy, fruitless and costly search to ascertain the source of their ailments, and to seek relief.

They were increasingly debilitated by their ailments, though they sought the best medical advice they could afford. They became discouraged and desperate as they lost the ability to function as productive members of society. Many face impoverishment. They were caught in a vortex of despair, whose causes seemed beyond the reach of science. Some of these conditions acquired labels. Others didn't.

There was no relief beyond palliative care. A cure seemed beyond hope.

*All experienced remarkable improvements in their conditions after*

*removing radio-frequency current from their household wiring.*

### **A public health crisis**

**A** basic precept of science developed in the 14th century is known as Ockham's razor, which can be paraphrased as accepting the theory that results in the most accurate predictions.

The symptoms associated with overexposure to radio-frequency radiation (also known as radio wave sickness) clearly describe the symptoms associated with many of the supposedly inexplicable ailments that have become more common in recent decades.

### **Symptoms of exposure to radio-frequency radiation (radio wave sickness)**

**Neurological:** headaches, dizziness, nausea, difficulty concentrating, memory loss, irritability, depression, anxiety, insomnia, fatigue, weakness, tremors, muscle spasms, numbness, tingling, altered reflexes, muscle and joint pain, leg/foot pain, "Flu-like" symptoms, fever. More severe reactions can include seizures, paralysis, psychosis and stroke.

**Cardiac:** palpitations, arrhythmias, pain or pressure in the chest, low or high blood pressure, slow or fast heart rate, shortness of breath.

**Respiratory:** sinusitis, bronchitis, pneumonia, asthma.

**Dermatological:** skin rash, itching, burning, facial flushing.

**Ophthalmologic:** pain or burning in the eyes, pressure in/behind the eyes, deteriorating vision, floaters, cataracts.

**Others:** digestive problems; abdominal pain; enlarged thyroid, testicular/ovarian pain; dryness of lips, tongue, mouth, eyes; great thirst; dehydration; nosebleeds; internal bleeding; altered sugar metabolism; immune abnormalities; redistribution of metals within the body; hair loss; pain in the teeth; deteriorating fillings; impaired sense of smell; ringing in the ears.

(excerpted from *No Place To Hide* by Arthur Firstenberg, April 2001)



**Dr. Martin Graham, emeritus professor of computer science and electrical engineering, University of California, Berkeley, and inventor of a filter that removes radio-frequency radiation from household wiring.**

The relationship between exposure to radio-frequency radiation and these ailments clearly warrants additional independent investigation.

Investigations of human health concerns and electrical pollution are now left solely to the discretion of electrical utilities. This is unacceptable and is unlikely to change. In Wisconsin, for example, state health officials have not undertaken a single investigation of the health complaints of farm families with concerns about electrical pollution, even though these families have requested such an investigation for almost 30 years.

Any discussion of electrical phenomena involves terms that are unfamiliar to most people. This is true in any detailed discussion of a scientific topic. However, it poses a particularly formidable obstacle to the public's understanding of the problem because the issue is often framed exclusively in technical language. This has proven to be a formidable barrier in attempts to draw public attention to the issue, especially as the objectivity of many investigators is in doubt.

It need not be this way. Electrical pollution is analogous to water pollution. "Clean" water enters our households and it leaves via a separate route after it becomes "dirty." The same is true of electricity, only the contaminated current doesn't leave via a separate route. Instead, it has been allowed to intermingle with clean current – and has been allowed to enter the environment by a variety of paths.

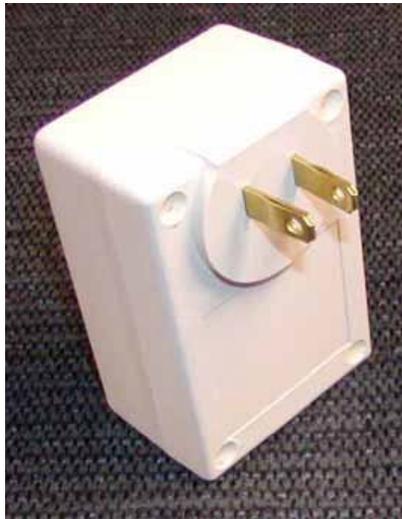
As with polluted water, there are several electrical pollutants. They have synergistic effects. Examining each in isolation fails to accurately assess their harmful biological effects.

While there are legitimate concerns over what levels and types of electrical pollution are acceptable, there is no uncertainty over the fact that electrical pollution is present in our environment – and no uncertainty whatsoever that there is no safe exposure level for radio-frequency radiation.

The most immediate concern is to develop methods to eliminate or prevent exposure to harmful levels. Also, health officials should be encouraged to utilize the instruments that accurately measure electrical pollution and develop the appropriate protocols for their use. This should not be left to the electric utilities.

### Time to begin

This is an auspicious time to begin such an effort because investigators with the academic credentials and technical competence have already created much of the foundation for this work. Such investigations would be prohibitively expensive if these resources were not available. Moreover, even if the resources were available to fund these investigations



**The "Stetzerizer," the Graham/Stetzer original filter that can be plugged into household electric receptacles to remove radio-frequency radiation.**

(which would initially require hundreds of thousands of dollars), the objectivity of the results would be subject to question unless (as is now possible) the complete independence of the investigators could be assured.

The following general factors should be considered when considering the experiences of victims of electrical pollution:

- They involve a wide variety of health concerns. In medicine, this often detracts from credibility as researchers increasingly seek to link specific disease agents or factors with specific ailments. However, the accounts are consistent with the pervasive assault on the immune system characteristic of electrical pollution, and with the heterogeneous nature of electrical phenomena, and the wide divergence in routes and duration of exposure.

- Seldom is there a complete reversal of symptoms or a "cure." This appears to reflect the inability to achieve an environment free of electrical pollution.

- Electrical pollution exacerbates many health conditions, although there appears to be a cluster of symptoms common to all forms of overexposure.

- There appears to be a "threshold" of exposure, after which recovery becomes more problematic and sensitivity increases.

- The medical community seldom, if ever, considers electrical pollution in the etiology of ailments.

- "Stray voltage" research, which involves the short-term exposure of cows to low levels of "clean" electricity is not germane to the human health concerns addressed here, even though it has often been cited as "proof" that electrical pollution has no adverse effects on human health.

- Many of those affected by electrical pollution require immediate relief. The most relevant test of whether electrical pollution is a human health concern is to provide an environment that is free of all sources of electrical pollution. The particular levels and routes of exposure that are of most concern in each environment can be addressed later.

- Providing an environment that is free of electrical pollution would be the simplest, least expensive (and most powerful) test of the hypotheses concerning the relationship between electrical pollution and the adverse effects on human health.

## Dan Hager

Dan Hager, 50, is a large man, whose joviality belies the health problems that doctors said were supposed to have killed him by now.

He's had a variety of occupations, including stints as a welder, machinist and driving trucks and buses. He had no history of serious health problems when, eight years ago, he was nearly crippled by aching joints and pain in the lower back. There were times when his feet were so sensitive he could barely walk. He would often inexplicably lose his balance and fall.

Numerous doctors were unable to ascertain the cause of his health problems, although all agreed that his health was deteriorating. Hager eventually was prescribed 12 medications for pain, swelling, seizures and depression in an increasingly futile attempt to stay healthy enough so he could maintain the campground he and his wife, Marge, operated in central Wisconsin.

Two years ago, a neighbor recounted how her health improved after she installed filters to lower levels of electrical pollution. After studying the information she provided, Hager realized his symptoms mimicked those of radio wave sickness, right down to the pain in his teeth. Hager decided to try it himself, and made several filters.

"Right away, I felt more energetic. The headaches went away and my sleep was more restful," he said. He was no longer plagued by sleep apnea and no longer prone to losing his balance. He subsequently reduced the number of prescriptions to four.

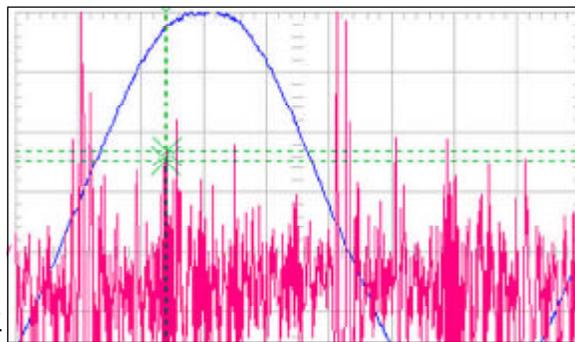
Doctors were never able to identify the cause of his ailments, although some predicted he would never recover the mobility and strength he lost and

predicted that the deterioration would progress. One ascribed his ailments to

### Relief after receiving medical treatment for electrocution.

nerve damage. Hager concurs with the diagnosis.

Hager believes his nerves were damaged by the flow of current through his body. He links the start of his health problems to a change in the electrical distribution system in the area to accommodate the increased demand for electricity. Then, too, the campground is next to a lake in a low-lying region, conditions that favor the flow of electricity through the ground. Hager has employed several methods



**The illustration above, which shows the high frequency current riding on the 60-cycle waveform, was measured in a classroom occupied by a teacher who recently died of a brain tumor. The teacher in the adjoining room had recently died from leukemia. Dr. Vitaly Reznik, professor of hygiene and epidemiology in the Republic of Kazakhstan and an expert on the effects of radio-frequency radiation, said the energy contained in the waveform was twice that considered safe by that nation's standards, which are based on 'high-frequency components that known to cause an array of health problems in humans,' including cancer and leukemia.**

to reduce ground currents, but none are completely effective.

His pain was alleviated after a doctor treated him for injuries usually associated with electrocution. Hager has purchased several oscilloscopes

and tries to help neighbors understand the risks posed by electrical pollution.

He had back surgery in 1998 and was very slow to recover. "It took two months to be able to walk out the front door and go about 30 feet," he says. He attributes the slow healing to electrical pollution.

His sister has been diagnosed with rheumatoid arthritis and struggled for almost a year while doctors tried to find the right medications for her. Many were ineffective and had undesirable side effects. Dan measured the radio frequencies in her home and installed filters a year ago. Her mobility has improved, there's less swelling in her hands and she sleeps much better. "Her doctors "can't believe how well she's doing," Dan says. She attributes her improved health to the filters.

## Catherine Kleiber

Catherine Kleiber's serious health problems began in 1996, six months after moving to a farm she and her husband, Dan, operated in southern Wisconsin. She was 23 and until then, hadn't experienced any serious health problems. Both were recent graduates of the University of Wisconsin-Madison.

The symptoms initially included a sore, dry throat, fatigue, and a low-grade fever and chills. She was unable to concentrate. Doctors couldn't identify a cause. Tests for throat infections were negative. Three years later, she was diagnosed with chronic fatigue syndrome.

Catherine noticed unusual patterns in her symptoms. They were worse at certain times (on Saturday night and Sundays, for example) and during certain weather conditions (worse when it rained, better during droughty conditions). There

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## One school's experience

When filters were installed in an elementary school in Wisconsin recently, staff members quickly noticed a remarkable difference in how they felt and an improvement in the behavior of the students.

The guidance counselor at the school said the migraine headaches she had experienced six months after starting to work at the school disappeared. She also discontinued her allergy medication.

"I feel more motivated and refreshed to do my job in the best manner I can. Overall, I feel our students and staff have greatly benefited from these filters. I hope that someday all school districts in Wisconsin will be required to have their schools tested and filters installed if the need is there," she wrote.

"Ever since the filters were installed in the building I have been feeling much better. I do not get headaches and I do not feel tired all the time. Also, I have more energy than before the filters," wrote Ruth Pfaff, the school secretary.

Lisa Gunderson, a teacher at the school for five years, said she had experienced numerous health problems since she started working at the school, including "extreme fatigue, headaches, forgetfulness, and increased anxiety over minor happenings." A doctor prescribed anxiety medication, which did not relieve the symptoms.

"I had considerable doubts about electrical pollution being the reason for these symptoms but was pleasantly surprised and extremely pleased to find relief a short time after filters were installed in our building. I am not currently taking any medications and am feeling great. My symptoms are no longer present and I have not had any changes in my work habits or lifestyle," Ms Gunderson wrote.

Shanon Rodenberg, also a teacher, wrote that she did "not have the same asthma symptoms" after the filters were installed.

"The other thing I have noticed is my memory is better," she wrote.

Constance M. Alvin, The reading specialist at the school for 10 years said she had experienced "fatigue, headaches, stress, and general feelings of malaise throughout the school year, with the end of the year being the most unpleasant. These changes were pronounced enough to prompt my husband to comment each year that when June came around he would get his 'real wife' back."

Soon after filters were installed, she noticed she was not as fatigued after parent-teacher conferences in January and March, and her concentration improved.

"I have not changed my work habits or anything in my personal life that would contribute to these changes I have noticed," she wrote

*Mindoro Elementary School, N181 State Rd. 108, Melrose, WI 54642; (608) 857-3410*

### A nurse's perspective

Char Sbraggia, the nurse for the school district, wrote that there has been a remarkable decline in the severity and incidence of asthma among students after filters were installed.

Many students previously required nebulizer treatments once or twice a day while at school, she wrote. During the year after filters were installed, she didn't administer one nebulizer treatment and "of the 37 students with inhalers, only three of them use the inhaler for their exercise-induced asthma before Phy Ed," she wrote.

"Teachers are stating they are less fatigued and tired," she wrote. "The sense of smell came back for me. I lost it for three years and the doctors said it was my allergies."

She also reported that students "seem to have more energy and seem less tired." Members of the staff also report a reduction in their use of allergy medications and in the incidence of migraines.

## One teacher's experience

*November 30, 2003*

My life changed one year ago.

The past 3.5 years of my life are filled with sad memories of serious health problems. The list of my symptoms includes fatigue, memory loss, facial flushing, headaches, numbness, loss of taste and smell, eye irritation, sleep disturbances, double vision, sinus infections, and bronchitis.

These health conditions began when school started and gradually went away throughout the summer months. I missed more school in one year than I had in the previous 10 years of teaching. I went from doctor to doctor searching for answers. I had two MRI's of my brain, blood tests, neurological examines and yet no answers. I went to my optometrist, chiropractor, allergist, general practitioner, and neurologist. Everyone was concerned, but no one had any answers. So my life went for the next three years. I was finally diagnosed with benign MS.

My students suffered. It was a 50-50 chance I would call them their correct names. The days and weeks blended into a time in my life I barely remember except for the pain of being me. I was so busy trying not to fall when I went for a walk while I had double vision I missed the sights of spring. For years I would go to bed by 6 p.m. so I could get up for school the next day. I was always exhausted. Last year my headaches were so severe I didn't make it a complete week for the first three months of school. I was miserable. I had decided at that point I would give up teaching in hopes of getting my good health back.

The only people I let into my sad little world were my parents and brothers. Everyone felt helpless. When I went to bed at night I would often cry in my pillow to hide the true fear I felt. I was trapped in a horrible world with no hope in sight.

One year ago everything changed.

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My school brought in Mr. Dave Stetzer, a power quality expert. He identified problems in our electrical environment. Mr. Stetzer filtered our school to eliminate the dirty electricity riding on the line. My headaches stopped immediately and so did the exhaustion that was my life. My health from that point has been wonderful. People who know me best see me as a new person. A person they use to know, but hadn't seen for years. All signs and symptoms of benign MS are gone. The health concerns that once consumed my life are no longer an issue. I once again enjoy life.

I attribute this change in my life to the filters that surround my world. The filters that eliminated the electrical pollution we are all exposed to every day, everywhere. I have found filters to be a simple solution that changed my life and a countless number of people I know.

I am forever thankful to have my life back!

*Angela Olstad*  
Teacher/Principal  
Olstad@mel-min.k12.wi.us

The state health department had attributed the problems at the school to mold and undertook two projects, costing more than \$100,000, to correct the problem, with no discernible decrease in the health problems at the school. The cost of the filters — \$18,000 for three buildings, Olstad says.

People tend to take her account seriously, she says, because they remember how sick she was just a year ago when her face always had a purplish-red tint.

She has asked officials with the state to investigate her concerns and to consider taking similar action in other schools around the state. She has not received a reply.

Utility representatives have criticized the school's actions as a waste of money.

**Continued from page 4**

seemed no logical reasons for those patterns until she realized that they coincided with periods of peak electrical demand and changes in soil conductivity.

Catherine learned about the relationship between her condition and electrical pollution after reading an article in an agricultural publication about farmers' attempts to deal with so-called "stray voltage."

She contacted the industrial electrician who was helping farmers and immediately turned off the power in the house. She says there was a "definite improvement" in her health and that of her husband. Both immediately experienced more restful sleep, for example.

**Sicker when the soil is  
more conductive**

They also installed several types of filters and have employed a variety of measures to limit their exposure to electrical pollution. All have had beneficial health effects. It has been impossible to completely eliminate electrical pollution from their environment, however. She is adversely affected by the high-frequency bursts of current create by strobe lights on nearby cellular towers, for example.

Since learning about electrical pollution, Catherine has been tireless in her efforts to warn others of the danger. She established a web site about the topic ([www.electricalpollution.com](http://www.electricalpollution.com)) and frequently addresses agricultural and other groups, encouraging them to seek legislative remedies for the problems.

"People whose health has been most affected are most interested (in electrical pollution) because they have the most to gain," she says.

**Shivani Arjuna**

Shivani Arjuna, 59, doesn't think she would be alive today if she hadn't learned about electrical pollution.

Two years ago, she began to experience incidents in which her blood pressure and heart rate would suddenly skyrocket, accompanied by extreme heart arrhythmias even though she had no history of heart problems and her blood pressure had always been low. She was conveyed to the emergency room of the local hospital twice; doctors couldn't find anything wrong. After \$18,000 in tests, including an MRI of her brain, doctors couldn't arrive at a diagnosis and eventually said she was experiencing "panic attacks."

Her life was characterized by months of poor sleep. She usually required two hours to get to sleep, due to tension and severe intestinal spasms that began as

**'I was nearly  
an invalid.'**

soon as she laid down. She would awaken every couple of hours. She thought her problems might somehow be related to her bed, but conditions didn't improve when at other locations in her home. (All those areas later proved to have high levels of radio-frequency radiation.)

"I was so weak I felt as if I was made of paper," she says. "I was nearly an invalid. My husband cared for me." Homeopathic remedies alleviated some of the symptoms, but she obtained real relief only after reducing radio-frequency levels around the house.

Most homes require 20 filters. It took 37 filters to reduce levels of dirty current in her home. Industrial electrician Dave Stetzer said levels of radio-frequency current in her home were among the highest he had measured. (Her utility said its measurements, which were made at the same time, revealed nothing of concern.)

Arjuna is now so electrically sensitive that even the arcing in a car's electrical system affects her and prevents her from driving. She is essentially homebound as the electrical pollution in most public places affects her severely.

She and her husband have taken several measures to reduce her exposure to harmful electrical phenomena, including the installation of shielded phone lines and modifying the hot water heating system, which conducts ground current, to reduce her exposure in the kitchen to "bearable" levels. They have also stopped using several electrical heating baseboards that were broadcasting radio-frequency radiation.

She now gives workshops on the effects of electrical pollution and methods to reduce exposure. She has learned that many people are bothered by electrical pollution, even though they aren't as electrically sensitive as she is.

Once people have experienced an uncontaminated environment, they realize how bad they feel in contaminated environments, she says. Those who experience only polluted environments have no idea how they are affected.

## The Jansky Family

The health problems of the Jansky family became worse about a year ago. Everyone in the family began experiencing bouts of unexplained illnesses, including stomach cramps and headaches. One son was hospitalized with severe headaches, although doctors didn't provide a diagnosis. Tom, 45, was not as severely affected as his six children and wife, Brenda, 42, which he attributes to the fact that he worked away from the house. Their children are home-schooled and remained at home all day.

The most worrisome development was the diagnosis of diabetes in their son, Daniel, 11. Their daughter was diagnosed with diabetes at 10 months

of age; doctors said it was unusual for the disease to afflict two children in the same family in this manner.

Tom read an article about electrical pollution. "When I read it, I thought, 'Wow. That sounded just like us,'" said Tom. He had measurements made in their home and installed 20 filters immediately after learning there were high levels of radio-frequency current in the home's wiring.

"The family's health problems pretty much disappeared," says Tom. Most surprising to them was a dramatic reduction in the insulin requirements of their two diabetic children.

They have confirmed the relationship between electrical pollution and insulin levels several times. For three weeks during the summer, they vacationed in a remote area of Montana, which was free of electrical pollution. The blood sugar levels

**A remarkable  
improvement in their  
children's diabetes**

of both children dropped and remained "very stable," says Tom. Brenda notes that blood sugar levels remained stable, regardless of the children's level of activity.

In April, the children's blood sugar levels began climbing and became difficult to manage. When the family visited a friend who lived more than 30 miles away, their children's blood sugar levels decreased markedly, (and are still declining), which they subsequently attributed to the fact that their friend's house was located in a sandy region where the soil was less conductive. They remained at the house for several days to confirm their initial observation.

"I'm convinced this (electrical pollution) is an issue," says Tom. They have shared their observations with their children's doctors, who have attributed their experiences to "coincidence."

## Nancy H.

Nancy H., who wants to remain anonymous., 42, often chokes up as she recites the health problems that have plagued her family, a litany of grief and sorrow that is disproportionately large for a family of five. She is divorced with four children.

The harrowing chronicle began more than 15 years ago when she moved with her family to a small town in north central Wisconsin. At the time, she instinctively knew something was "wrong."

It was a presentment that she has since learned to trust although at the time, she couldn't identify what in the environment had led to the feeling.

The health problems worsened when she moved to a house in a rural area.

Immediately after the move, her infant son, who had placidly slept through the night for several months, began doubling up in pain and screaming, for reasons that doctors weren't able to ascertain.

Her children always seemed sick with colds, fevers, congestion and slight temperatures. Her boys were shorter than normal. One son experienced severe growth pains and aching legs. Her daughter had crippling migraines.

Her two older children developed severe ear infections. One son suffered a 50 percent hearing loss, the other son's loss of hearing was even more extensive.

During one harrowing year, her sons in first, third and fifth grade were lethargic and suffered from severe bowel problems characterized by food passing through nearly undigested. They had dark circles under their eyes, slept excessively, with poor growth and learning difficulties.

"The boys would be playing, and suddenly they would get headaches and stomach aches," says Nancy. A team of doctors at a major metropolitan hospital confirmed that the children were sick,

but could not diagnose either the ailment or the cause. One doctor suspected cancer.

In the search for answers, Nancy had the water and air tested, stopped eating homegrown vegetables in case there was something in the soil, and eliminated any foods (such as Alar-treated apples) that had been implicated in any type of ailment. She sought medical help so frequently that some doctors questioned whether she was fabricating the ailments to get attention. It was one more sickening obstacle for a heartsick mother trying to alleviate the suffering of her children.

Nothing helped but exactly one year and one day after the boys became sick, the intestinal ailments inexplicably vanished.

Nancy's health had also declined. After suffering from severe fatigue, weakness and inability to concentrate, she was diagnosed with multiple sclerosis. And although her daughter didn't suffer as much as the boys, her fingernails would slough off and her hair would fall out by the handful. Nancy now thinks that the conductive metal grid in the suspended ceiling of her sons' bedroom may explain why

**Feeling worse  
when neighbors use  
more electricity**

they were often affected more than her daughter.

Electrical appliances in the house often failed. Nancy kept boxes of telephones that had gone bad because she somehow felt that they might be related to what her family had experienced. Light bulbs frequently burned out. Other major electrical appliances required frequent repairs.

On April 2, 2001, she installed filters in her house. Nancy says the family's health improved noticeably within a week. She began thinking clearly and was no longer fatigued. Others commented that she no longer stuttered and stammered.

She uses a meter to monitor electrical conditions and notices that her condition worsens when levels of electrical pollution increase.

"It's a world of difference," Nancy says. Her children took longer to improve but they, too, have more energy. "For the first time in their lives, I don't have to take them to the doctor anymore," Nancy said.

## Marcy Fry

Marcy Fry can trace the downward trajectory in her health to the birth of her second child 16 years ago. A subsequent temporary diagnosis of an underactive thyroid, which went away without medication in a few months, explained some of the symptoms, but not the panic attacks, the exhaustion, the lack of restful sleep and jolting awake in a total panicked state at the same time in the middle of the night.

Her condition worsened and she could no longer work after her office was moved to a former school whose electrical system hadn't been updated to accommodate computers and other electronic equipment.

She has been off work since June 4, 1999, when, she was finally diagnosed with chronic fatigue syndrome, fibromyalgia, panic disorder and irritable bowel syndrome. She linked these ailments to electrical pollution when she participated in a preliminary study of filters. During the study, the filters would be turned on and off at intervals. Participants in the study weren't told when the filters were on, but Marcy says she knew immediately.

The study was conducted over the holiday season, a period of peak electrical demand. "It was a double whammy when they turned them off," she says.

She's had the filters in her house ever since. She is still exhausted and very

thirsty most of her waking hours, but she is no longer as badly afflicted with irritable bowel syndrome, nor as prone to the bouts of anger, panic and mood swings that characterized her behavior before she was forced to quit her job as a recreation director.

She believes her health is still strongly affected by electrical pollution. The filters removed radio-frequency current from her home's electrical distribution system but not from the rest of the environment. Measurements have shown that her home environment is in a sea of electrical pollution, including ground currents.

She worries about her children, who often have trouble focusing, a condition that she also attributes to electrical pollution.

## Kurt Gutknecht

Kurt Gutknecht, 56, is a journalist who has written extensively about electrical pollution.

More than four years ago, he asked why dairy farmers in Wisconsin were still complaining about so-called "stray

**'The nation's  
largest public  
health problem'**

voltage" almost three decades after the issue was first publicized.

He found more than he anticipated – what he now calls "the nation's largest public health problem." He discovered that humans were as sick from electrical pollution as livestock, and that the problem wasn't confined to rural areas.

After his articles appeared, he was inundated with calls from farm families who had lost their farms due to the problem, with no hope of restitution. He visited dozens of farms in three states. Most families at locations where levels were high also had severe health problems.

He says the problem persists in large part because the government has ceded oversight to utility interests. “The utilities’ ability to control access to the technology used to measure electrical pollution lets them bury the issue under a cloud of technical jargon and half-truths,” he says.

But he says the most disturbing aspect of the problem is the fact that the government, with the complicity of selected researchers, has abandoned all pretense of independent oversight and objectivity. “I was sickened at what farm families experienced when they lost their farms due to electrical pollution. Unfortunately, anyone who tries to get help for the problem receives the same treatment.”



**This inexpensive meter developed by Dr. Martin Graham detects levels of radio-frequency radiation on household wiring.**

Gutknecht realized his home was polluted three years ago during Christmas when his family became extremely tired and depressed. Both conditions vanished after filters were installed. His office was so badly polluted that he was unable to think or write after spending a few hours in it. He complained to the local utility, who claimed there was no problem, although levels of pollution decreased after their “investigation.”

“The full extent of the problem won’t be apparent until journalists actually spend time in the field with independent, competent investigators,” he says. Until then, he says the media will continue to report the opinions of “experts” who are either poorly trained

or whose objectivity has been compromised.

Gutknecht was fired after continuing to write about the issue.

## Jerry Daniels

Dairy farmer Jerry Daniels has dealt with so-called “stray voltage” on his Wisconsin farm for more than a decade. He says it’s only when he took readings with equipment developed by Dr. Martin Graham that he was able to monitor the source and extent of the problem.

He discovered the levels of electrical pollution on a neighboring farm, where average milk production was much

**The ‘proof’ comes in helping people recover**

higher, were much lower than on his farm.

On Daniels’ behest, filters were installed in a local elementary school, reducing the incidence of severe headaches experienced by students and teachers. He has installed filters in the homes of friends, relatives and neighbors, who all report improvements in their health. A diabetic’s insulin requirements declined by 50 percent. An 18-year-old, who had a brain operation to remove a tumor, was finally free of headaches after suffering for more than a year. His 84-year-old parents spent days at the fair with their grandchildren. They used to be tired after just three hours.

Another neighbor, who was retired and largely bedridden, said he was prepared to die after spending \$100,000 at a regional medical clinic, where doctors couldn’t diagnose his condition. He’s now leading an active life after filters were installed in his home – and after removing his hearing aid. Daniels knows the hearing aid contributed to the man’s problems, perhaps because it magnified pollution in the environment.

A woman recovering from a knee operation found exercise was too painful – until Daniels found her treadmill, which had a variable frequency drive motor, was producing high levels of radio-frequency radiation. His brother-in-law experienced severe heart arrhythmia after working around equipment with variable speed drives.

“I felt 10 years younger after installing the filters,” he says.

Daniels realizes that these accounts don’t constitute “proof” of the link between electrical pollution and health problems, but they have convinced him that it’s a legitimate concern.

“Recovery (after installing filters) sometimes takes a while. After a month or so, people realize they no longer feel as bad,” he says.

The electronics industry and the utilities should share responsibility for correcting the problem, he says.

“I know the problem is real.”