

October 22, 2019

**TO: Mayor Bill Widmer
and Atherton City Council Members**

From: Larry Will



Reference: Leaf Blower Restrictions

<https://www.almanacnews.com/news/2019/09/11/atherton-to-begin-exploring-gas-powered-leaf-blower-restrictions>

I see that you are being asked to restrict gasoline powered leaf blowers per the above Internet article.

I am a former [Vice President of Engineering](#) for a leading manufacturer of lawn care products. I am not a stake holder in the above proposed restriction, nor am I trying to interfere with any decision you deem necessary for your city, but I am a source of facts that you should consider before you make up your mind on this issue. As a leaf blower expert in design, manufacture, and application, I am in a unique position to supply up-to-date and accurate data and facts. The information I have included in this commentary is based partly on my own personal experience of 26 years within the industry and partly on reputable sources of information to which I provide Internet links.

Of all the possible restrictions one could place on people in your community, addressing leaf blower use will be your most controversial action. The reason is because eliminating this tool will impact a lot of people, residents as well as professionals doing business in your city that need leaf blowers. You may not hear many ban opposing arguments at your council meetings because these people are not as well organized as those asking for a ban, but you will surely hear from them once the ordinance is implemented. To the contractor, the gasoline powered leaf blower is indispensable. In some cases, even [law suits](#) have ensued. If you want to know firsthand why a complete ban is such a headache, just talk to the enforcement agency in neighboring [Palo Alto](#).

I look at it this way. Try asking your housekeeper to keep the house clean without her vacuum cleaner. If you are married to your housekeeper, you may have an even bigger problem. Some tools are just indispensable.

We both know that the issue with the leaf blower is its sound level. Clearly many blowers are excessively noisy, and in some cases, they are used inappropriately, early in the morning, later

in the evening, even on Sundays and holidays. The solution to the problem of when they are used is an education issue. I can help with that.

But in dealing with the sound level of the actual leaf blower, things can be done to mitigate sound without trying to ban them. People do not like more rules, especially if the rule costs them money or infringes on their personal lifestyle. Banning the gasoline powered leaf blower, to many, seems like a subjugation to someone else's lifestyle. It's best, therefore, to keep any regulation you decide on very simple, reasonable, fair and as painless as possible. Also, implementation should be imposed at some later date, perhaps one to three years in the future, to give people time to adjust and amortize the conversion cost. So, here are three suggestions:

1. Require that gasoline powered leaf blowers be limited to 65 dB(A) in residential areas as measured per ANSI Standard B175.2. Enforcement is easier than you might think because testing in the field would not be required. A sound label is attached to the housing by the manufacturer.

<https://www.leafblowernoise.com/Sound%20label%20mounted.jpg>

In other words, ban the noisy leaf blower, not all gasoline powered leaf blowers.

How quiet is 65 dB(A)? At this level, it will be the quietest power tool on a landscaper's trailer. An actual comparative demonstration would be best, but here is a [video to give you a feel](#). Note that, unlike the popular concept, the electric leaf blower is noisier than the quiet gasoline powered blower.

The problem with corded leaf blowers for professionals is obvious. The cordless electric blower, from a performance standpoint, is just not there yet for the professional. Also, outfitting a contractor's workers with battery powered blowers is very expensive. One battery, for example, will cost them around \$1000, and that will only give him one hour of use. Rakes and brooms are too inefficient to even be considered. I suggest you talk to some lawn care contractors that serve your community in order to find out how such an ordinance will impact them. Increasing their cost will reflect back directly to his customers and your constituents, whom are not going to like paying more for a lesser quality of work.

The industry has created several leaf blowers that are 75% quieter than the conventional blower, which may not be well known to the average person. Manufacturers of leaf blowers, in response to complaints from the field, have spent millions of dollars to provide a solution to the leaf blower noise problem.

2. Develop printed materials for the purpose of educating and informing the private user, as well as the professional, on how to safely and properly use a leaf blower, including acceptable hours of use. It can be made available via your website and through your enforcement agency.

Here are some examples:

[https://www.leafblowernoise.com/Pointers Operating Leaf Blower flier.pdf](https://www.leafblowernoise.com/Pointers%20Operating%20Leaf%20Blower%20flier.pdf)

<https://www.leafblowernoise.com/LeafBlowerTraining.pdf>

3. Limit hours, such as not allowing leaf blower use on Sundays and holidays, and not before 8:00 am or after 7:00 pm on days when they are allowed.

In the referenced article, issue is taken regarding greenhouse gas generated by two stroke engines. I'm sure you know that we are talking about carbon dioxide (CO₂). Aspen Colorado, a non-industrial city, wanted to know what was causing greenhouse gasses in their community. Where is the CO₂ coming from? They found that 555,660 tons of CO₂ were emitted from the transportation sector. That represents 66% of all the greenhouse emissions in Aspen in 2004. The other major contributor is the power generation sector. The data is outdated, but the proportions have changed little over the past 15 years. Lawn care equipment was not even measurable. https://www.leafblownoise.com/Emissions%20Inv%202004_ExecSumm.pdf

Consider the following:

Gasoline is a hydrocarbon, which when completely burned turns into water vapor (H₂O) and Carbon Dioxide (CO₂). Carbon dioxide generation is directly proportional to the amount of fuel burned. How many cars in your household are used to drive to work? How many gallons of gasoline do you burn in a week, one tank full (18 gallons)? How much do you burn in a leaf blower in a week? Most likely not more than 10 ounces. A gallon, by the way, is 128 ounces. The average automobile is 230 times worse than a leaf blower when it comes to the emission of greenhouse gasses. None of the emission controls imposed on the car engine will reduce the amount of CO₂ generated. Computers and catalytic converters minimize the emission of unburned hydrocarbons, not CO₂.

With respect to hydrocarbon exhaust emission, I would first like to point out that banning a product for the sake of this type emission is illegal. Only the EPA has the authority to regulate exhaust emissions from small engines in the United States. In California, under sanction from the EPA, CARB is the controlling entity. Per [Section 209](#) of the Federal Clean Air Act, all other States or subdivisions thereof are preempted from controlling emissions, including through the means of banning. A copy of a letter from the Outdoor Power Equipment Institute (OPEI), Alexandria, Virginia, to Solana Beach, California, at the following website explains it more precisely: [OPEI letter to Solana Beach](#)

There is the statement in the article that leaf blowers release much higher levels of hydrocarbons into the atmosphere than do automobiles. This is truly overstated. For one thing, they are comparing leaf blower engines that have not been treated for exhaust emission, built prior to compliance with the Federal Clean Air Act. Those who use EPA limits to justify that leaf blowers are much worse for the environment than automobiles are just plain wrong. Automobiles **cannot** be compared directly to leaf blowers using published emission limits without first converting to like units.

The EPA measures emissions as "hydrocarbons per mile" for the automobile and "hydrocarbons per horsepower-hour" for small off-road engines. Comparisons must be calculated after taking 'time of use' into account. Convert hydrocarbon emissions from an automobile to "total kilograms per week", for example. To put this in perspective, think in terms of households.

The most common use for a leaf blower is to remove debris from a sidewalk and driveway after mowing the lawn and trimming the hedges. A week's worth of **automobile driving** for a typical homeowner vs. a week's worth of leaf blower use **is 30 times worse for the environment**. An

SUV is 45 times worse. You can easily calculate what happens if two people in the household drive to work separately. To compare automobiles to all handheld lawn care equipment, not just leaf blowers, click the following link:

<https://www.leafblowernoise.com/carchart%20comparison.htm>

Don't believe that diatribe about the leaf blower versus the Ford Raptor. Learn why at [this site](#).

If exhaust emission is truly an issue in your city, it is possible for a local government to require leaf blowers to meet the lowest applicable level of the phase-in period for exhaust emissions (built after January 2005). The label on the units will tell you when it was manufactured.

<https://www.leafblowernoise.com/Mounted%20emission%20Label.jpg>

See [EPA Exhaust Requirements](#) for phase in levels and the year it was effective. Note that hydrocarbon emission has been reduced by 85 to 90%, depending on engine type and size.

Please take advantage of what the industry has provided as a solution to the sound issue. Your regulation will be simple, reasonable, and fair to all involved if you would take advantage of the feature that blowers be limited to 65 dB(A), the quietest design available.

At your leisure, please take a half hour or so to go over my website. You will find a wealth of information specifically dealing with the issue of leaf blower sound as well as many other claims made about the blower. If you should need information that is not clearly addressed on my website, please contact me and I will do whatever I can to help, including further research on your behalf.

Best regards,



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<https://www.leafblowernoise.com/Santa%20Monica%20Problems.pdf>