

Regular Workshop – November 13, 2013  
Agenda Item 9

- Agenda Item:** Discussion Regarding the Town's Noise Ordinance
- Presenter:** Interim Planning, Zoning & Building Director
- Summary:** The Town Commission has been presented with the assertion that sounds associated with lawn maintenance equipment and similarly operated internal-combustion engine-powered equipment is annoying, excessive, and constitutes significant risk to the health and welfare of residents of Longboat Key. In conjunction with these observations are claims that state-of-the-art muffling equipment is available on the market that can attenuate the sounds attributed to lawn maintenance equipment and similar devices. The Town Commission directed staff to analyze whether the Town could enforce utilization of these technologies under current ordinances and/or revise the Town's ordinances to reduce the ambient sound level on the island.
- Staff will present an analysis of the current ordinance and discuss objective criteria used by other municipalities for the Town Commission to consider.
- Attachments:** 11-01-13 Memo, Interim PZB Director to Manager;  
PowerPoint Presentation.
- Recommended Action:** Pending discussion, provide direction to Town Manager.

## MEMORANDUM

DATE: November 1, 2013

TO: David Bullock, Town Manager

THROUGH: Alaina Ray, AICP, Interim Director  
Planning, Zoning and Building Department

FROM: Jerry Murphy, AICP  
Planning, Zoning and Building Department

SUBJECT: Noise Ordinance Discussion item

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### Background

The Town Commission has been presented with the assertion that sounds associated with lawn maintenance equipment and similarly operated internal-combustion engine-powered equipment is annoying, excessive, and constitutes significant risk to the health and welfare of residents of Longboat Key. In conjunction with these observations are claims that state-of-the-art muffling equipment is available on the market that can attenuate the sounds attributed to lawn maintenance equipment and similar devices. The Town Commission has been asked to consider whether the Town could enforce utilization of these technologies under current ordinances and/or revise the Town's ordinances to reduce the ambient sound level on the island.

Sound control regulations and "noise ordinances" have evolved during the 40-plus years that have passed since the Town adopted its original noise ordinance, Ordinance 194, on April 21, 1971. This regulatory evolution has been particularly profound in terms of defensible metrics and standards during that time and in the eight (8) years that have passed since the Commission last amended Code of Ordinances Section 130.02, which provides the bulk of the Town's sound regulations.<sup>1</sup> A thorough reading and review of this regulation, investigating potential problems with enforcement as it applies to lawn and garden maintenance equipment, reveals a number of issues that potentially undermine the effective enforcement of Section 130.02.

The general policy of this section is to "*reduce* the ambient sound level in the Town" as an exercise of the Town's police powers, and that "every person is entitled to ambient sound levels that are not detrimental to . . . enjoyment of his or her property," per Subsection 130.02(A). This Subsection further declares the "*making, creation, or maintenance of excessive or unreasonable sound . . . is a menace*" and provides justification for invoking the Town's police powers.

Subsection (B) provides various definitions specific to Section 130.02, while Subsection (B)(1), and Subsection (B)(2) direct the reader to the Town's zoning code for additional definitions of other terms employed in Section 130.02. For the purpose of his discussion, the relevant defined terms are:

- *Construction,*

- *Motor vehicle,*
- *Sound,*
- *Sound source,*
- *Unreasonable sound,* and
- *Volume.*

Section 130.02(C)(1) prohibits any person from making, or permitting to be made, any *unreasonable sound* within the broad boundaries of the Town. Following from this broad prohibition, Subsection 130.02 (C)(2) then declares and enumerates certain acts and causes of such acts “*unreasonable sounds* in violation” of Chapter 13, and provides that the enumeration thereof is not exclusive.

Subsection 130.02(C)(2)(f) provides that *construction* is one of the enumerated *unreasonable sounds* and prohibits such “on Sunday, on any holiday, or between the hours of 5:00 p.m. and 8:00 a.m. Monday through Saturday. The section’s definition of *construction* includes “any activity incidental to . . . maintaining . . . property . . . including . . . landscaping.” However, this Subsection expressly exempts domestic power tools as specified in Subsection 130.02(C)(2)(i).

Subsection 130.02(C)(2)(i) addresses the use of domestic power tools, including “tree, lawn or garden tool, or similar tool” to prohibit their use between the hours of 5:00 p.m. and 8:00 a.m., “unless such equipment is operating inside a completely enclosed structure,” in which case, there appears to be no prohibition at any time. Based on this Subsection, lawn and garden equipment can operate seven (7) days per week, except between the prohibited hours specified.

Finally, Subsection 130.02(C)(2)(j) provides: “The discharge into the open air of the exhaust of any internal-combustion engine of any type . . . except through a muffler or other device which will effectively prevent *loud or explosive noises* therefrom.”

Subsection 130.02(C)(3) discusses the standards to be considered “in determining whether sound *annoys,*” including but not limited to:

- Volume,
- Intensity,
- Usual or unusual background sound,
- Proximity to residential sleeping facilities,
- Zoning of the area from which the sound emanates,
- Time of day,
- Duration, and
- Whether the sound is produced by a commercial or non-commercial activity.

Subsection 130.02(D) provides certain exemptions, among which are “air conditioners, pool and well equipment, *when functioning in accordance with the manufacturer’s specifications* and with all manufacturers’ *mufflers and sound-reducing equipment in use,* in proper operating conditions *when baffled or muffled by appropriate surrounding material.*” Also exempt are “motor vehicles and vessels *when functioning with all manufacturers’ mufflers and noise reducing equipment in use and in proper operating condition.*”

## **Conclusion**

As Jacksonville Police Sergeant Patrick Dooley observes in his treatise, *Enforcing Noise Ordinances in Florida*, "Enforcement of noise ordinances is a *science* that administrators should look at from a *training perspective* as well as *realistic prosecution*." The Town's existing Ordinance is lacking in all these regards. It is unscientific and lacks standards for which personnel may be trained, the result of which is unlikely prosecution of offenders willing to raise a challenge.

There are several approaches, both good and bad, to the regulation of noise. Most noise ordinances in Florida divide into two camps of regulatory approach: subjective or objective. Subjective regulations are based on the decisions of an enforcement officer and other officials as to the degree of noise intrusion, without reference to any sound level measurements. The Town's noise Ordinance hails from this camp.

Objective regulations are based on sound level measurements compared with maximum permitted sound level limits provided in an ordinance. They have the advantage of removing bias, and the decibel limitations are generally based on scientific studies of noise impact. They require the use of appropriate sound level meters. Obvious cases are measurement of motor vehicles and measurements of sound intrusion at property lines.

While the Town's noise ordinance could be revised to require muffling equipment, with certain stipulations, this requirement would likely be met with challenges which the current Ordinance is ill equipped to withstand. Should the Town Commission direct Staff to pursue revisions to the Town's Code to provide objective regulations based on quantifiable measurements, Staff will commence further research regarding available options that have successfully stood against challenge.

## **BIBLIOGRAPHY OF SOURCES:**

Bentley, Mark, Esq., AICP, *An Overview of Noise Regulation in Florida*, [http://www.floridaeminentdomain.com/images/An\\_Overview\\_of\\_Noise\\_Regulation\\_in\\_Florida.pdf](http://www.floridaeminentdomain.com/images/An_Overview_of_Noise_Regulation_in_Florida.pdf) (site visited last: Oct. 11, 2013).

Brooks, Bennett, *Proposed Standard - Guidance for Developing State Noise Regulations and Local Noise Ordinances*, Proceedings of Meeting on Acoustics, Acoustical Society of America through the American Institute of Physics (June 2013).

Chanaud, Robert C., Ph.D., *Noise Ordinances: Tools for Enactment, Modification, and Enforcement of a Community Noise Ordinance*, <http://www.noisefree.org/Noise-Ordinance-Manual.pdf> (site visited last: Oct. 10, 2013).

Department of Environmental Protection (Hong Kong), *A Concise Guide to the Noise Control Ordinance*, 9<sup>th</sup> ed., (web version, April 2006) [http://www.epd.gov.hk/epd/english/environmentinhk/noise/guide\\_ref/files/CG\\_E-06n.pdf](http://www.epd.gov.hk/epd/english/environmentinhk/noise/guide_ref/files/CG_E-06n.pdf) (site visited last: Oct. 11, 2013).

Dooley, Patrick, *Enforcing Noise Ordinances in Florida*, <http://www.fdle.state.fl.us/Content/getdoc/7062dbf7-f60b-4190-8666-72c5deeadcf1/Dooley-pat-paper-pdf.aspx> (site visited last: Oct. 11, 2013).

Maine State Planning Office, et al., *Noise*, Technical Assistance Bulletin (May 2000).

New Jersey Department of Environmental Protection, *Model Noise Ordinance* (June 2010).

Portland, OR, City Code & Charter, Title 18, *Noise Control*, <http://www.portlandonline.com/auditor/index.cfm?c=28705&a=18480> (site visited last: Oct. 10, 2013).

*State v. Catalano*, 104 So.3d 1069 (Fla. 2012).

U.S. Environmental Protection Agency, *Model Community Noise Control Ordinance* (April 2010).

Zwerling, Eric M., M.S., et al., *Local Noise Enforcement Options and Model Noise Ordinance*, Rutgers Cooperative Extension (Aug. 1997).

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<sup>1</sup> Additional provisions are found in Sections 33.18, *Violations*, procedure (referring to Section 130.02 as "Loud and unnecessary noise"); 73.04, *Bicycle regulations*; 93.09, *Disturbing the peace from vessels*; 94.45, *Automatic detection and alarm systems*; 101.01, *Definitions* (relating specifically to "burglar alarm system"); 113.12, *Motion picture filming requirements*; 116.006, *Loud noises and speaking devices* (relating specifically to peddlers); 158.102, *Performance standards for site and development plans*; 158.126, *Special exception uses*; 158.133, *Mobile home parks*; 158.135, *Home occupations*; 158.136, *Outdoor dining for restaurants*; and 158.157, *Mechanical equipment*. Whatever changes are directed for the *Sound regulations* provisions, it is advisable to address these related definitions and sections comprehensively to avoid any confusion in the future.



## Conclusion

- If the Town Commission desires to increase the regulation of noise, the following measures should be considered:
  - Establish specific decibel levels
  - Establish specific points where sounds would be measured
  - Acquire industry-regulated sound measuring equipment
  - Provide training to personnel utilizing the equipment

**TOWN OF LONGBOAT KEY**



# **Noise Ordinance Discussion**

**Town Commission Workshop  
November 13, 2013**

# TOWN OF LONGBOAT KEY



## QUESTION

Can the Town enforce utilization of state-of-the-art muffler technologies for lawn equipment under current ordinances and/or revise the Town's ordinances to reduce the ambient sound level on the island?

# TOWN OF LONGBOAT KEY



## Current Ordinance

- Lawn maintenance equipment powered by an internal combustion engine is only subject to the requirement that its exhausts be discharged “through a muffler or other device” that will “effectively prevent” it from emitting “loud or explosive noises.”

# TOWN OF LONGBOAT KEY



## Current Ordinance

- Section 130.02 does not prohibit, nor require, the attachment of state-of-the art muffling devices to lawn maintenance equipment.
- If muffler equipment were installed, the equipment could be considered in compliance with the ordinance if it was functioning according to manufacturer's specifications.
- Could be interpreted to require that any replacement parts be manufacturer-produced; thus, potential upgraded muffling equipment might be prohibited unless produced by the original manufacturer of the lawn equipment.



## Subjective vs. Objective Regulations

- **Subjective regulations:** Based on the decisions of an enforcement officer and other officials as to the degree of noise intrusion, without reference to any sound level measurements.
  - The Town's Noise Ordinance falls into this category
- **Objective regulations:** Based on sound level measurements compared with maximum permitted sound level limits provided in an ordinance.

# TOWN OF LONGBOAT KEY



## Objective Regulation Criteria

- Sound intensity and frequency should be measured in decibels.
- Any exceptions to the regulations should be narrowly crafted, including time, duration, and decibel levels.
- Equipment used to measure decibel levels should be digital, capable of recording and downloading data, and meet industry standards.
- Specified points of measurement should be used, such as a neighboring property line or right-of-way.

# TOWN OF LONGBOAT KEY



## Objective Regulation Criteria

- The ambient sound level measured in decibels and logged to determine its effect on the source sound level.
- All enforcement personnel should be trained to use the equipment and accurately interpret the resulting data in accordance with the specified standards and protocols.
- Provisions to employ outside experts in the event of litigation.



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# TOWN OF LONGBOAT KEY



**Questions  
and  
Discussion?**



**End of Agenda Item**