



# NOISE MONITOR — UPDATE —

*September 17, 2025*

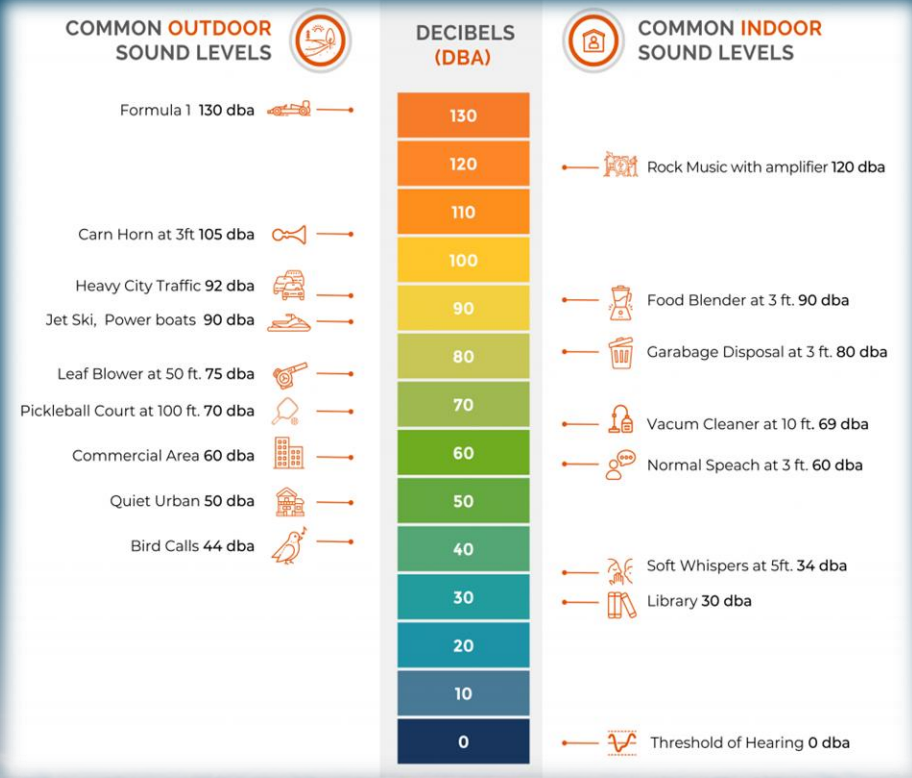
# NOISE MONITORS

- HVN purchased 2 portable noise monitors.
- Monitors are currently deployed on airport property to collect baseline data.
- The objective is to deploy portable monitors to nearby public or private properties (with property owner's consent) to collect further data.
- Data is helpful in determining actual community impacts and is intended to be used for the eventual formation of an FAA Community Roundtable.
- FAA Community Roundtables facilitate understanding of noise-related issues and can potentially be used to update flight paths.

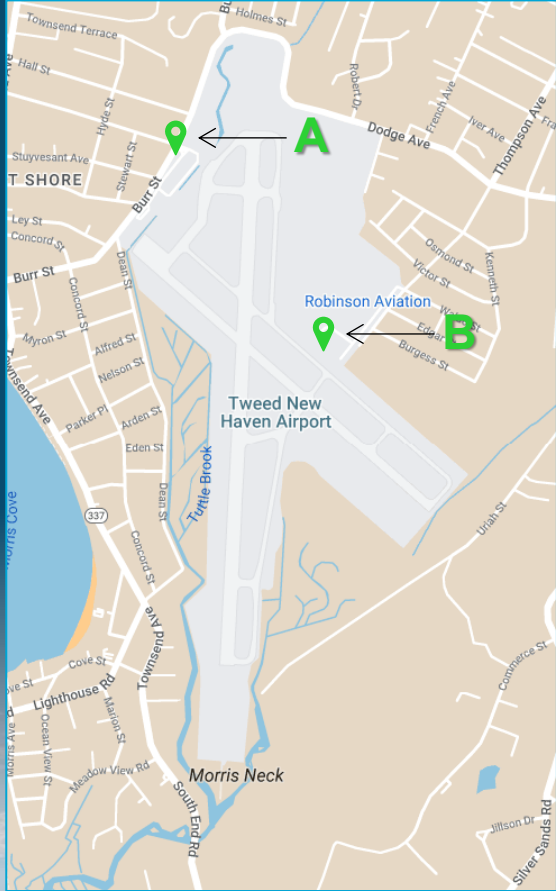


# ✈️ COMMON SOUND LEVELS

- Noise events are recorded when the industry standard of 65 dB for greater than 3 seconds is met or exceeded
- Monitors differentiate between aircraft noise (both APF and non-APF) and community noise
- Community noise may include, but is not limited to, the types described in the chart



# ✈️ NOISE MONITOR DEPLOYMENT



Phase	Location	Location Name	Date Range
III	A	Main Entrance	5/1-8/20
	B	Robinson Aviation/Ops	

# RESULTS

✈ All data captured from 5/1/2025-8/20/2025

Location	Location Name	Aircraft Noise Events					Community Noise Events
		Time on Site	Average # of Daily Events	Average Event Duration	Cum. Average Daily Duration	Peak (LMax)	Peak (LMax)
Phase IV	A – Main Entrance	~111 days	31	20 seconds	10 minutes	102 dB	105 dB
	B – Robinson / Ops	~111 days	42	20 seconds	14 minutes	93 dB	109 dB



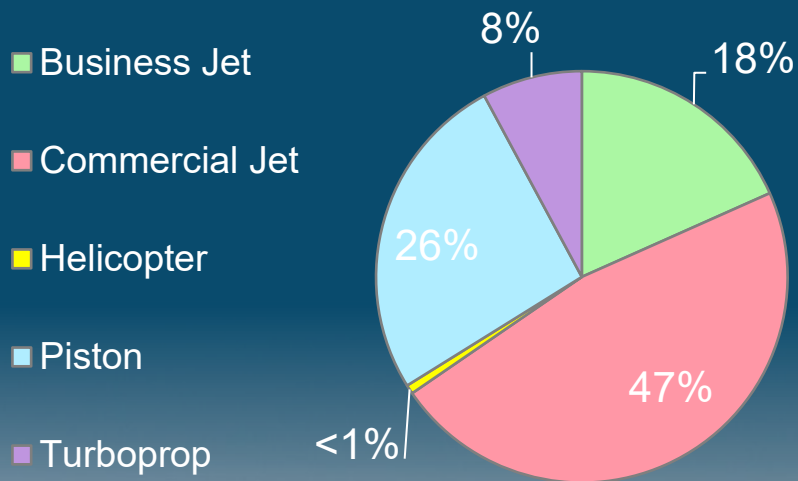
✈ This data set reflects the noise monitors currently on airport property **in closest proximity** to arriving and departing aircraft.

✈ Data gaps may exist due to temporary outage of Monitor B near Robsinon/Ops.

# ✈️ TOTAL RESULTS

✈️ All data captured from  
5/1/2025-8/20/2025

## Aircraft noise events by aircraft category

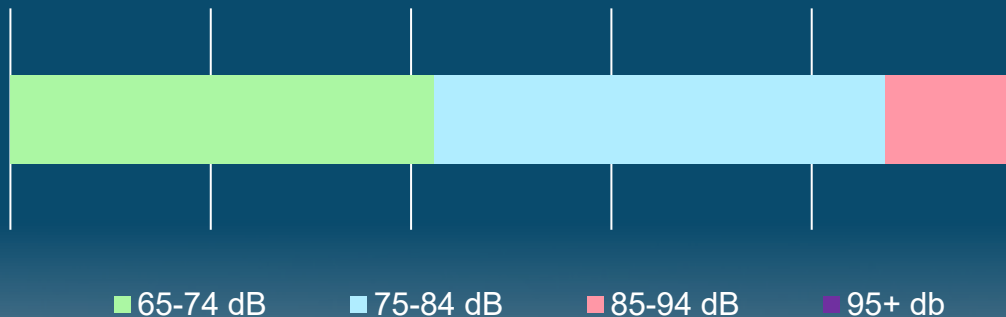


✈️ Of all total aircraft-related noise events registered between 5/1-8/20, approximately 47% were related to commercial aircraft, with the remaining 53% a combination of business jets, helicopters, pistons and turboprops.

# ✈️ TOTAL RESULTS

✈️ All data captured from  
5/1/2025-8/20/2025

## Aircraft noise events by decibel range

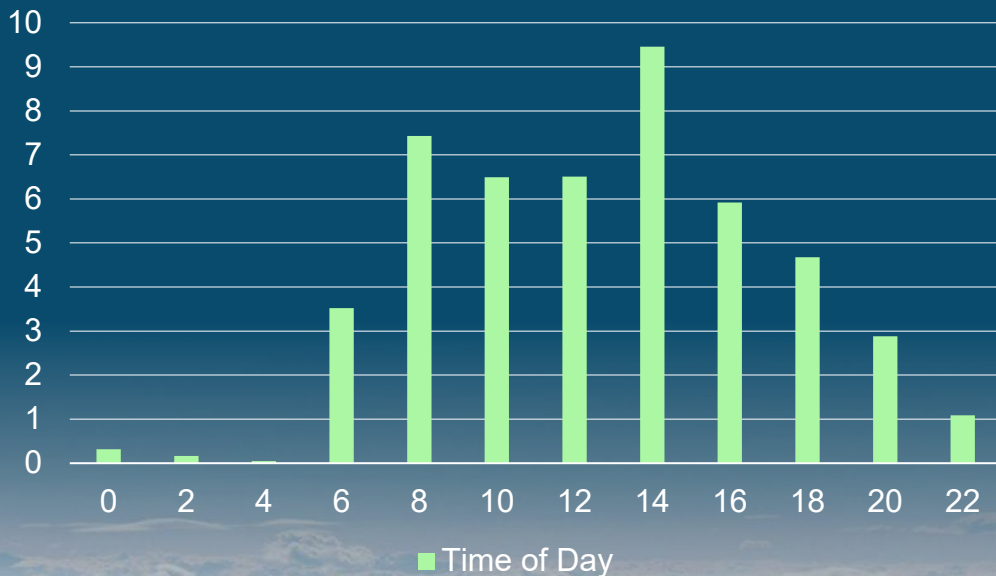


✈️ A slight majority of aircraft-related noise events registered between 75-84 dB Lmax.

# ✈️ TOTAL RESULTS

✈️ All data captured from  
5/1/2025-8/20/2025

## Average aircraft noise events by time of day (2hr blocks)

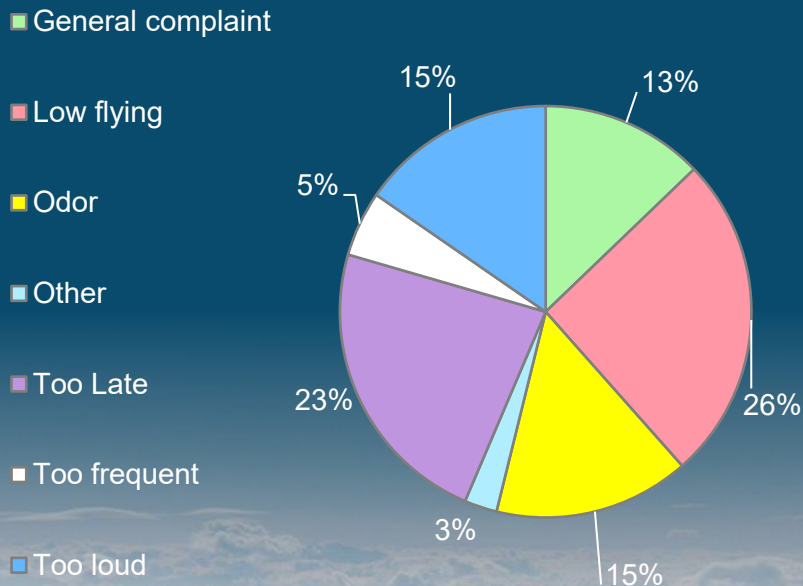


✈️ On average, aircraft noise events peak between 2:00PM – 4:00PM daily.

# ✈️ NOISE INQUIRIES

✈️ All data captured from  
5/1/2025-8/20/2025

### Noise inquiries by reason (unique users)



✈️ There were 30 unique inquirers which generated 69 total inquiries.

✈️ Most inquiries were related to low flying aircraft (10x), followed by too late (9x).

# FAQ

- **What is the limit on aircraft noise?**

- There is no specific limit on aircraft noise. Aircraft noise is federally regulated by the Federal Aviation Administration (FAA) under Federal Aviation Regulation (FAR) Part 36.

- **Does HVN have a curfew?**

- HVN is a public-use airport and signatory of Grant Assurance 22, which means that we cannot legally prohibit aircraft from operating during specific hours.
- As part of HVN's commitment to the community and partnership with our commercial air carriers, both Avelo Airlines and Breeze Airways have voluntarily agreed to restrict their hours of operations to 6:30 AM and 11:00 PM, except for delayed and repositioned flights.

# WHAT'S NEXT

- ✓ **HVN will continue to collect and analyze noise data.**
- ✓ HVN's next report will include new data from residential home deployments.
- ✓ HVN will pause noise monitoring during the winter months.
- ✓ HVN will continue to update the TNHAA and TNHAA Board on results and community interest.





## How is aircraft noise measured?

According to the Federal Aviation Administration (FAA), aircraft noise is measured in A-weighted decibels (dBA). This scale most closely approximates the way humans hear sound.

Here are three noise measurements to understand:

- **Lmax:** For noise sources in motion, like aircraft, noise levels can change over time. For example, the sound level of a plane increases as it approaches, and then as it flies away the sound level decreases. Measuring the maximum sound level, abbreviated as Lmax, can be useful for measuring a particular noise 'event'. While Lmax notes the moment of maximum sound level, it does not account for the duration of a sound event. To account for the differences in duration and loudness of sounds, different metrics are used, including SEL.
- **Sound Exposure Level (SEL):** SEL represents all the acoustic energy (a.k.a. sound pressure) of an individual noise event as if that event had occurred within a one-second time period. SEL captures both the level (magnitude) and the duration of a sound event in a single numerical quantity, by "squeezing" all the noise energy from an event into one second. This provides a uniform way to compare noise events of various durations.
- **Day-Night Average Sound Level (DNL):** The DNL noise metric measures a person's cumulative exposure to sound over a 24-hour period, expressed as the noise level for the average day of the year based on annual aircraft operations. The DNL noise metric provides a mechanism to describe the effects of environmental noise in a simple and uniform way. DNL is the standard noise metric used for all FAA studies of aviation noise exposure in airport communities.

**Maximum sound level, but does not adjust for duration**

**Compressed to 1-second, adjusts for duration – better for comparing noise events.**

**Cumulative noise exposure over 24-hours, expressed as noise level for average day of the year based on annual aircraft operations.**