# Stop Støj!



A Project By:

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### **Project Goal**

Determine the feasibility of implementing a nightlife noise data collection system in Indre By.



## Background

# The nightlife of inner-city Copenhagen is noisy and disruptive.



100+ Alcohol Selling Venues in Nørre **Kvarter** 



Prolonged exposure to noise has potentially adverse health effects.

#### Sleep Disturbances

# Increased Stress

Levels

### Hypertension

Decreased Productivity



**Objective 1** 

**Identify** Stakeholders and key data



**Objective 2** 

**Determine** App users and their motivations



**Discover** Technical considerations



#### **Objective 4**

**Design** Plan for prototype application





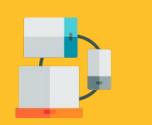
**Develop** A prototype application

## Findings





# Problems with the current nightlife noise complaint mechanisms and management:

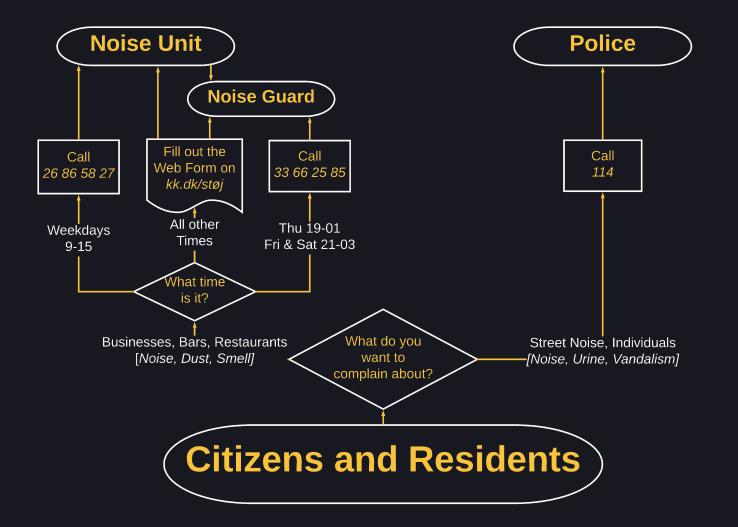


Lack of responses to complaints



No central complaint database





#### Dine kontaktoplysninger

Navn:*	Indtast navn
Adresse:	Indtast adresse
Husnummer:	Indtast husnummer
Postnummer:	Indtast postnummer
Ву:	Indtast by
Telefon:	Indtast telefonnummer
E-mail:*	Indtast E-mail
Træffes bedst:	Indtast hvornår du træffes bedst

#### Hvor er problemet?

Indtast adresse
Vælg først vejnavn
Firmaets åbningstider

#### Hvad er problemet?\*

#### Støj

- Andre støjgener (Ikke byggeplads)
- Musikstøj fra arrangement (ikke restaurationer)
- Musikstøj fra restauration
- Musikstøj grundet åbne døre/vinduer
- Støj fra byggeplads (ikke Metro)
- Støj fra facaderenovering
- Støj fra varelevering (Byggeplads)
- Støj fra varelevering (Detailhandel)
- Støj fra ventilation eller lignende
- Støjende arbejde udenfor tilladte tidsrum (Byggeplads)

#### Lugt

- Andre lugtgener
- Lugt fra brændeovn
- Lugt fra madtilberedning
- Lugt fra tobaksrøg

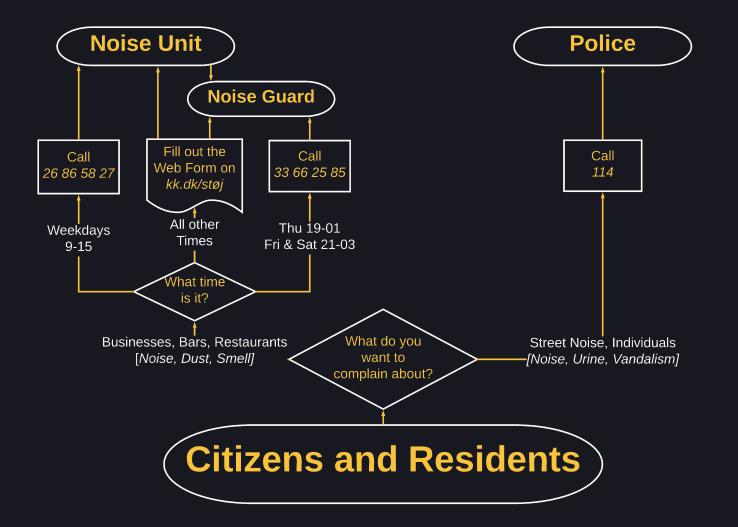
#### Støv

- Andre støvgener
- Støv fra byggeplads
- Støv fra facaderenovering

#### Udeservering

Udendørsservering efter kl. 24

Online Complaint Form kk.dk/støj Øvrigt? Kommentarer:\* Beskriv det du vil klage over Vedhæft filer Choose Files No file chosen Indtast svaret på følgende regnestykke: 6 + 2 Indtast svar Send klage







Limited resources means police reaction to nightlife noise incidents is rarely immediate.

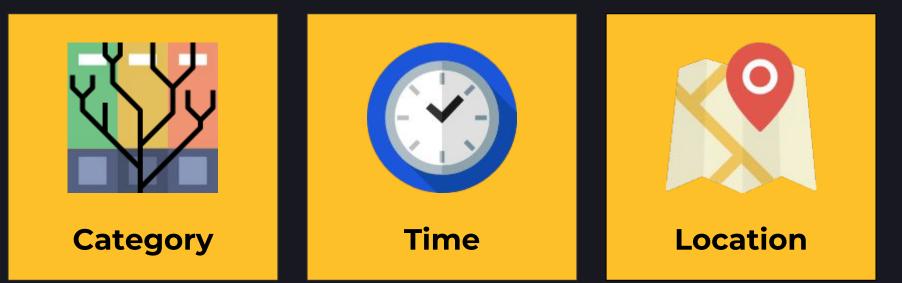




Residents say that a lack of response and a complicated submission process discourages them from complaining.



#### Essential noise complaint data:



### Finding #5

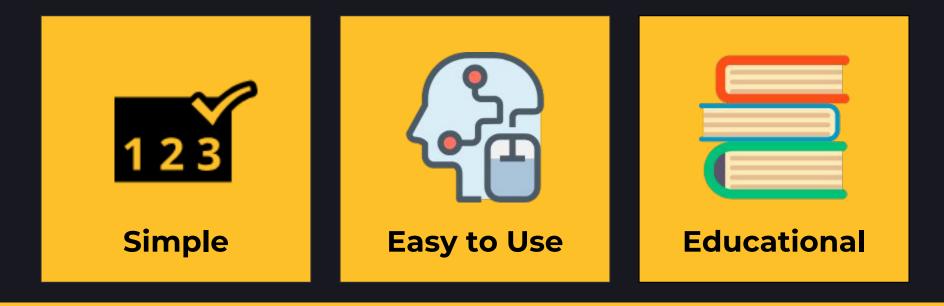
Simple data analysis can provide nuanced insight into the inner-workings of Copenhagen's noise problem.

2018 11:00 PM

Saturday, March 17,

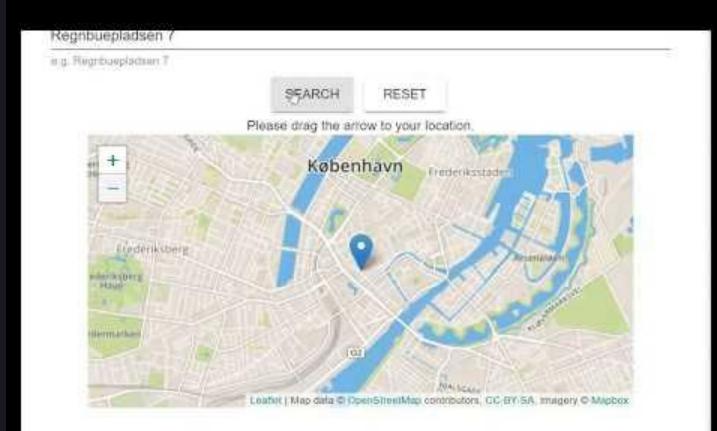


#### A successful noise complaint collection tool is:



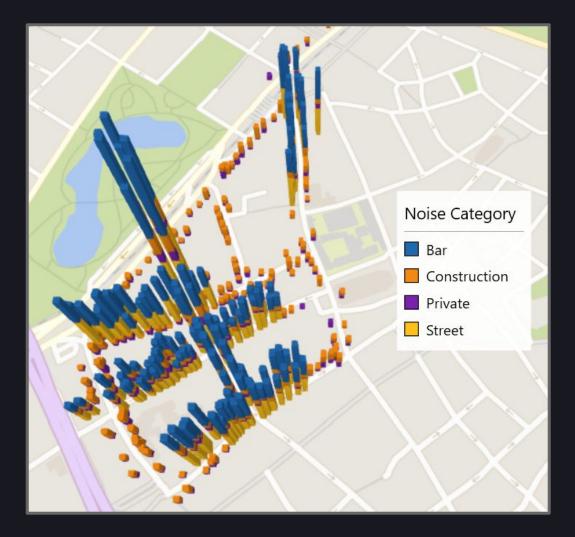
# The Stop Støj App

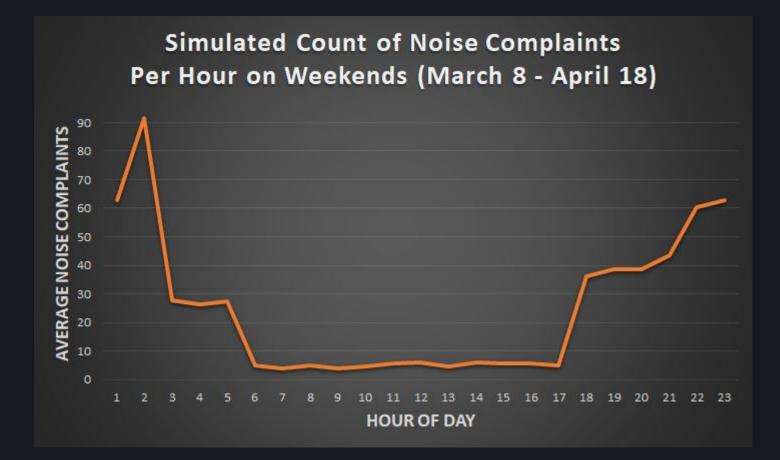


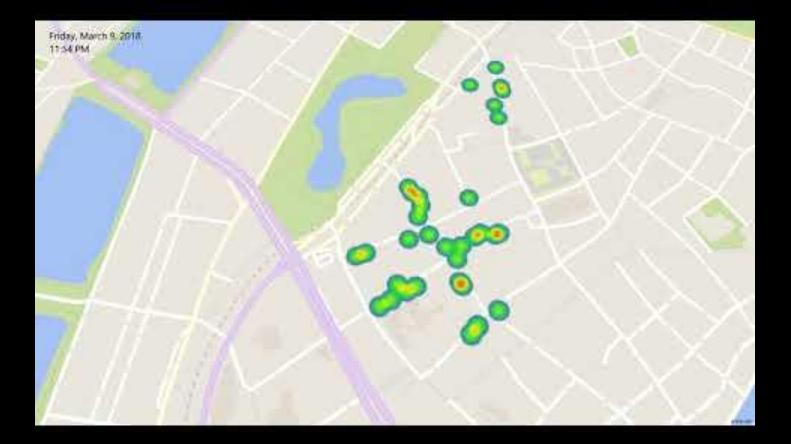


## Visualizations

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Miljøpunkt Indre By & Christianshavn should promote the use of the Stop Støj app to increase collection of data.

#### MILJØPUNKT INDRE BY & CHRISTIANSHAVN

AGENDA 21 · FOR ET BÆREDYGTIGT KBH



The Copenhagen Police utilize the data collected by the app to improve the allocation of nightlife management resources.



City officials utilize the collected data to influence decision making processes regarding the nightlife scene.



# The future developer implement additional features to enhance the app.

**#1: Official Complaint Response System** 

**#2: Auto Detect Location** 

**#3: Audio & Media Upload** 



**#4: Quick Submission** 

**#5: Open Source Data** 

**#6: Complaint Threads** 

**#7: Noise Complaint Tags** 

**#8: Improved Account Features** 





### **Recommendation #5** The Police and Kommune work together to develop an app that streamlines the noise complaint process.





Or build upon an existing platform to showcase the potential of a noise complaint app.



**Our Inspiration** 

The NYC 311 App
NYC Open Data
Noise #1 Complaint





## approx. 1.3 milion

complaints submitted relating to loud music or partying over 6 years.

"The release of open data is a powerful way to give New York City residents a sense of who they are, what they're doing and how they're doing it, as well as the strengths of their neighborhood so that they can work together to address quality of life issues."

- Amen Ra Mashariki Fmr. NYC Chief Analytics Officer

## Mange Tak!

- Marianne Spang Bech
- Prof. Holly Ault
- Prof. Constance Clark

• The Copenhagen Police

- København Kommune
- Noise Network
- Everyone who helped us!

## Questions?

## Tak fordi du kom!

### **Graphical Attributions**

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