



WASTE BURNING IN PUNE

**A study on the incidence and
redressal of waste burning cases**

Table of Contents

01

Introduction

02

Methodology

03

Findings

04

Findings

Waste Burning Citizens Survey

06

Findings

Analysis of complaints

07

Findings

Data from RTI applications

08

Inferences

09

Next Steps

Introduction

With populations exploding in urban areas, waste management, a vital service for a city's welfare, is increasingly becoming very challenging. Pune city generates 2200 metric tonne solid waste daily. The current waste management system is not able to process the waste optimally, hence a lot of it is dumped in landfills and gets burnt eventually. This emits enormous amounts of pollutants, esp Particulate Matter (PM) which has serious health impacts. PM_{2.5}, refers to these tiny particles or droplets in the air that are two and one half microns or less in width. They are so minute that they can enter the nasal cavity, penetrate through the lung membranes and enter the bloodstream thus causing a host of diseases in the body. Chronic Obstructive Pulmonary Disease (COPD), heart disease, asthma, impacts on organs like liver, kidneys etc, neurological impacts, diabetes are just some of the effects of air pollution. The Emission Inventory 2021 prepared by IITM (Indian Institute of Tropical Meteorology) states that Residential sector contributed to 13% of PM_{2.5} in 2019-20.

The Solid Waste Management Rules issued under the Environment Protection Act specify how each of these types of waste are to be collected, transported and treated and the responsibilities of the Municipal Bodies and the waste generators. This also places a responsibility on citizens to segregate their waste, enabling the city to dispose off each kind of waste effectively.

In the absence of these systems there are two kinds of waste disposal by burning that are happening - small amounts of wet waste, like dried leaves, kitchen refuse etc are collected by individual households or societies and set on fire. And then there is large scale dumping of any kind of waste, including plastic, rubber, and other material which usually happens on the city outskirts, or open areas and usually at night, which is then burnt.

For a few years now, concerned citizens have been trying to get the PMC to take cognisance of this hazard. The efficacy of enforcement against waste burning incidences through PMC's official grievance redressal mechanism has been observed to be unsatisfactory. This study, undertaken by the Pune Air Action Hub, documents incidence of waste burning through a citizen survey and the the process of waste burning resolution through the existing grievance redressal mechanism.

Methodology

The study has data inputs from the following three methods;

01

Waste burning citizen survey

292 citizens were interviewed through online and offline modes and the results were collated. The survey form was designed to capture details of waste burning like the frequency, the material being burnt and awareness about action to be taken against waste burning.

02

Waste burning complaints study

53 complaints spanning over a period of 6 months, starting Oct 2023 - May 2024, along with a few older complaints too, were documented using different criteria like speed of resolution, nature of resolution, complainant experience, kind of action taken etc to gauge efficacy of resolution.

03

Information from RTI

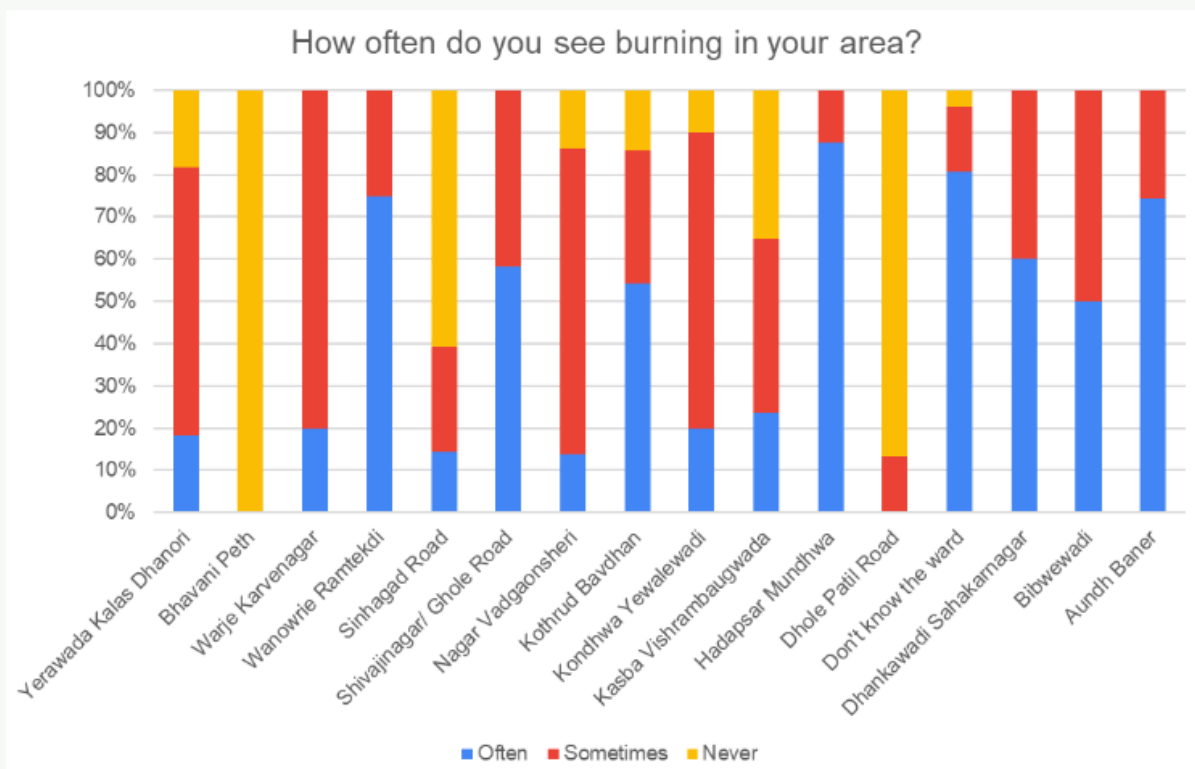
Applications were made to find out number of complaints made in each administrative ward of Pune, along with other details like mode of complaint, action taken etc. These were also collated.

02

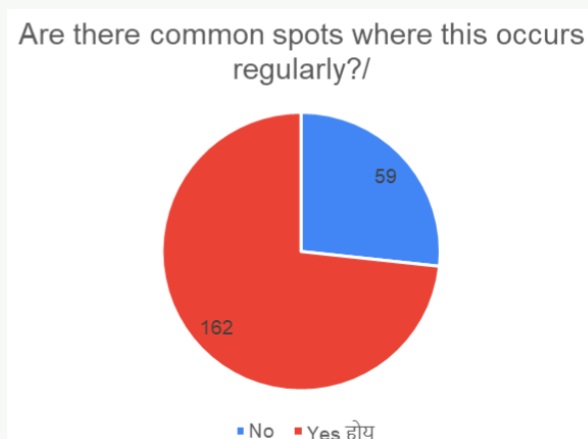
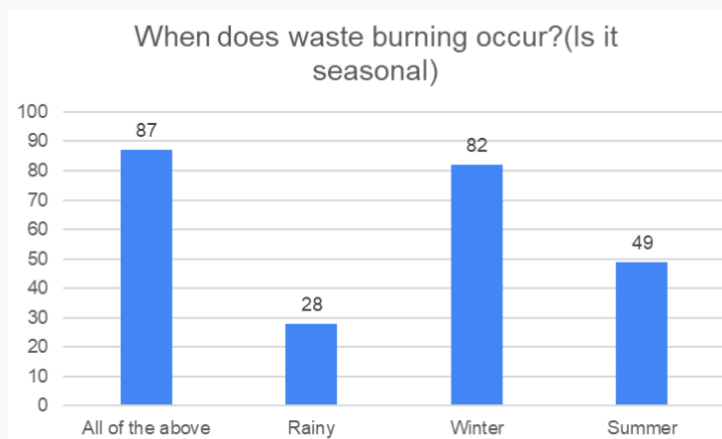
Findings

Waste burning citizens' survey

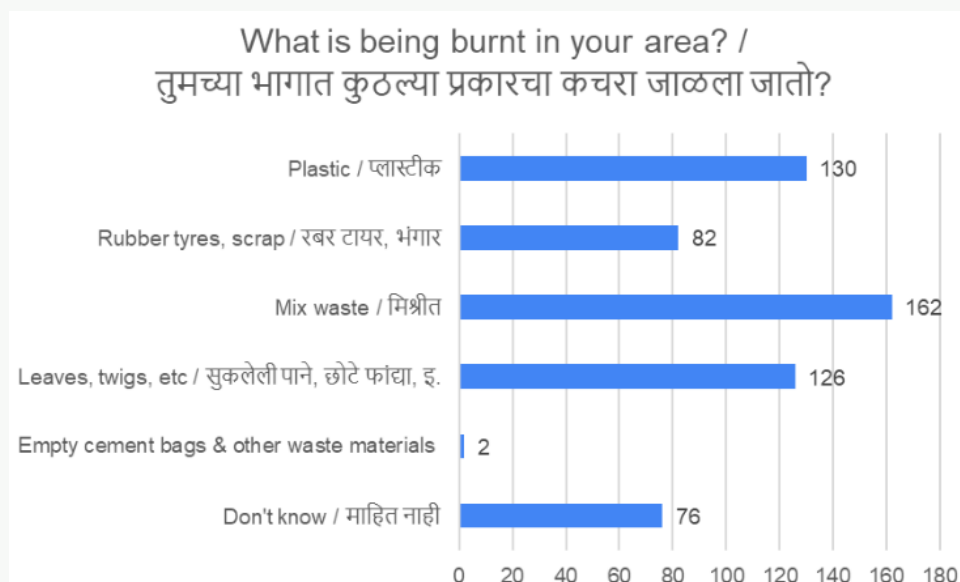
The waste burning survey was conducted to know from citizens the incidence of waste burning in the city and awareness about it. 292 citizens from all over the city were surveyed both online and offline. Following are the outcomes of the survey;



It can be seen that waste burning instances are rampant in the wards of Hadapsar Mundhwa, Aundh Baner, Dhankawadi Sahakarnagar, Wanowrie Ramtekdi and Shivajinagar Ghole Road. In other wards like Nagar Vadgaonsheri, Yerawada citizens have reported waste burning happening some times.

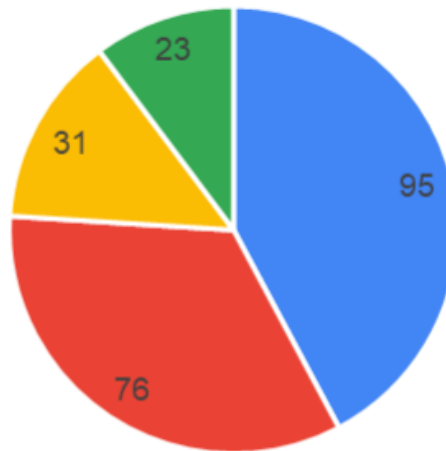


Seasonally, the least instances of waste burning seem to occur in the rainy season and the most in winter. Many citizens felt that it happens throughout the year. Waste burning was observed to be a habitual issue, where some spots are more prone to waste burning than others.



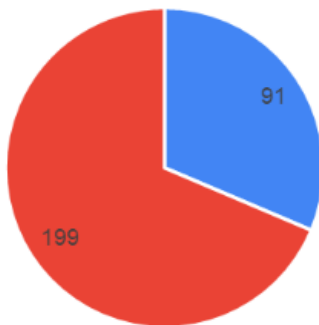
While most citizens said that mixed waste is being burnt, a considerable number have also responded saying plastic and garden waste is burnt. Both of these could be viewed as results of an ineffective system of collection and/ or enforcement. A state wide single use plastic ban has been effective since 2018. However, plastic is rampantly used and disposed off in these hazardous ways due to ineffective enforcement of this ban. Similarly, PMC has a mechanism to collect garden waste, but gaps in this system means that citizens gather garden waste and burn it for quicker disposal.

How frequently does waste burning happen in your area?



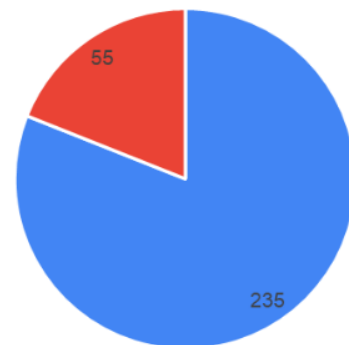
■ 1-2 times a week ■ Everyday ■ Once a month ■ Very rare

Do you know that burning waste in the open is a criminal offence? /
उघड्यावर कचरा जाळणे हा गुन्हा आहे हे तुम्हाला माहीत आहे का?



■ No / नाही ■ Yes / होय

Have you ever filed a complaint regarding waste burning on that number? /
तुम्ही कचरा जाळण्याबाबत त्या नंबरवर कधी तक्रार केली आहे का?



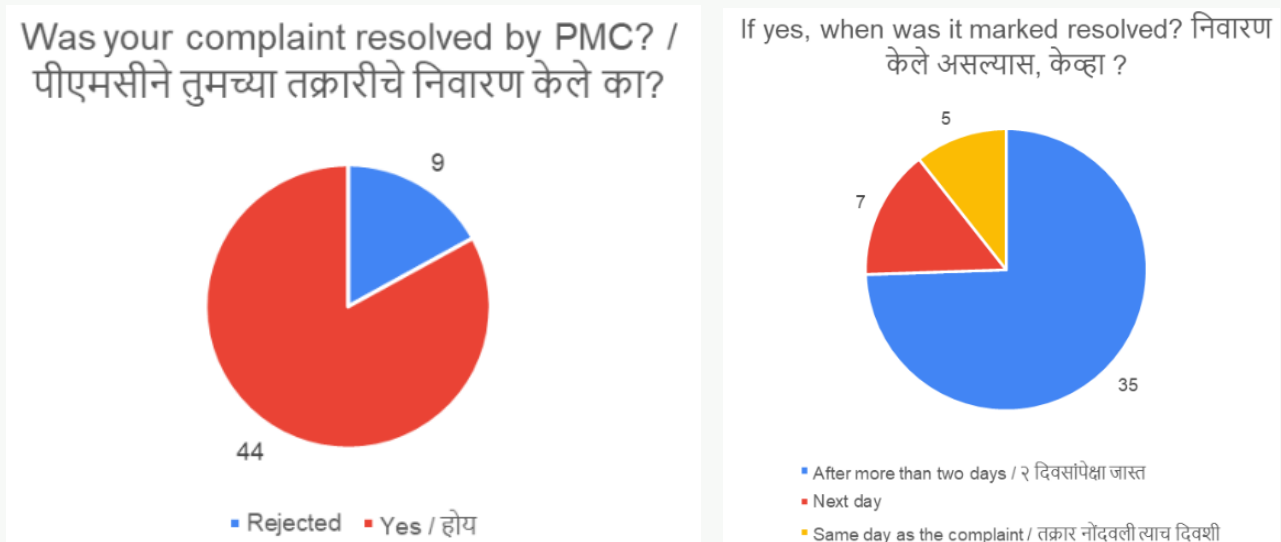
■ No / नाही ■ Yes / होय

Of the 55 people who said they filed complaints, 37 people said their complaint was not resolved, the remaining said the complaint was marked resolved but they have no idea what action was taken.

We tried to look at how many people who observe burning in the city, also lodge complaints. We found that out of almost 100 respondents who said they observe burning 1-2 times a week, only 21 have ever complained about it. It is evident that a minority of those who actually see burning in their area actually lodge complaints, indicating a lack of awareness about the ways in which they can take action against waste burning.

Waste burning complaints study

Around 53 complaints, majority of which have been made in this year (2024-25) were documented to help identify gaps in complaint resolution, and consequently a reduction in waste burning instances. Complaints made by different citizens in different parts of Pune were documented using a [google form](#) to find out how complaints were responded to from the citizen's/ complainant's perspective.



All the complaints were marked as resolved by PMC. A few were rejected, mainly on two conditions - repetitive complaint and area being out of PMC boundaries. The meaning of repetitive complaint is unclear, and so is the ground for rejection.

Some complaints have been marked as resolved almost 15 days after the complaint was made. All these observations imply an ineffective redressal mechanism, wherein in none of the 53 complaints lodged were any site visits made or any fines imposed on those burning garbage.

This also conflicts with [news](#) reports of fines being imposed by PMC to curb waste burning. This is not reflected through this study of 59 complaints.

Data from RTI applications

In order to understand the quantum of complaints and actions taken, an RTI application was made to look at all the complaints for waste burning lodged from June to November 2023, which were then forwarded to different ward offices. Replies were received from only 9 ward offices, with varying details of information. Based on the information received, following inferences can be made.

Ward name	Number of complaints	Fine collected	Notes
Bhavani Peth	0	NA	
Kothrud	6	5500	Fines imposed on all complaints. Token numbers not shared, not possible to verify. In 4 instances, the fine imposed was 500 Rs and for the remaining two it was 1500/- and 2000/-
Ghole Road	15	5000	Fine imposed on 1 instance. This complaint number, on checking doesn't give any details of the fine imposed - just says work done. (screenshot at the end of the report) CB 2268
Dhankawadi	13	0	
Hadapsar	12	20360	No details given, cannot verify
Kasba Peth	1	500	
Sinhagad Road			No information given, just a general statement saying complaints filed were resolved.
Wanawadi	8	0	
Bibwewadi	2	0	
Yerawada Kalas			No information
Nagar Road Wadgaon Sheri			No information
Aundh Baner			No information
Warje Karvenagar			No information
Dhole Patil Road			No information

Appeals were made to the remaining ward offices from where no information was received, as well as for those where incomplete information was received. Apart from Hadapsar ward office, none other responded. It is unlikely that only 57 burning instances have happened in the entire city in 6 months. This could mean multiple things - firstly that citizens are not complaining, and secondly that incomplete information is being given out when asked for through RTI. In the absence of proactive disclosure, coupled with haphazard information through RTI, it becomes difficult to analyse the nature of complaints, any trends and consequently any solutions.

Inferences

1. From the documentation of the waste burning complaints, it is evident that the redressal system has huge gaps. The complaints are being marked resolved without effective resolution, with no on ground checks or enforcement of fines. With no visible deterrent, waste burning incidences are unlikely to reduce.
2. On checking the status of complaints, it is observed that often the complaints have to be forwarded multiple times before they reach the right authority, wherein time is lost.
3. The back end communication flow needs to be reworked to ensure swift action. The complaint system needs to be backed by a strong enforcement mechanism which seems to be lacking as of now. A proper audit of the existing system and its strengthening is crucial to reduce waste burning incidents.

Next Steps

Based on the inferences, following recommendations emerge to strengthen the waste burning grievance redressal mechanism;

- 01** **Dedicated 24 x 7 number for waste burning complaints**
Ensure that complaints reach concerned actors within minutes, enabling immediate action. Currently all complaints are made on a single number shared by PMC, or through the PMC dashboard. A separate number only for waste burning complaints
- 02** **Dedicated and trained mobile squad**
To ensure prompt response and efficient handling of complaints, dedicated personnel will be trained and appointed who will possess the necessary skills and knowledge to effectively extinguish the fire with the appropriate equipment depending on the size and extent of the fire. The mobile squad will also be given the authority to investigate the cause of fire and if the perpetrator is found at the site, penalise them under the relevant Act.
- 03** **CCTV Surveillance**
To identify garbage dumping hotspots and implement Comprehensive Closed-Circuit Television (CCTV) surveillance that will enable the identification and tracking of offenders. This will facilitate the recording of important details such as vehicle numbers and other identifying information. A centralized control room will be established to monitor and analyze the CCTV footage in real-time, enabling quicker identification and resolution of incidents.

Parisar
'Yamuna', ICS Colony
Ganeshkhind Road,
Pune 411 007
www.parisar.org

