

Walleys Quarry weekly update – 1 December 2022

The Environment Agency has prepared this weekly update to help the community of Newcastle-under-Lyme and the wider area keep informed about developments concerning its regulation of Walleys Quarry Landfill.

Walleys Quarry Ltd is the operator of the landfill site and it alone is responsible for the hydrogen sulphide emissions escaping from the site.

The Environment Agency is the environmental regulator. We require Walleys Quarry Ltd to meet its environmental obligations and resolve the ongoing odour issues at the landfill as quickly as possible.

News in brief – 1 December 2022

A report by Defra's Chief Scientific Adviser's Office (CSAO) on Walleys Quarry Landfill odorous emissions has been published and can be found at: [Science Search \(defra.gov.uk\)](https://science.search.defra.gov.uk).

We welcome the report compiled by Defra's CSAO. The good progress made on mitigating the concentration of hydrogen sulphide noted in the report has continued through 2022. The concentration of hydrogen sulphide in the gas management system has reduced further to around 1200ppm in Autumn 2022. All four monitoring facilities around the site have shown a monthly average concentration of hydrogen sulphide at or below the long-term health-based guidance value since May 2022. Many of the report's recommendations are consistent with measures we have required Walleys Quarry to implement, as set out in our Plan to reduce hydrogen sulphide emissions. We will consider the report fully and, if necessary, review and revise the Plan in the future.

Regulatory activity

We continue to actively regulate and assess Walleys Quarry Ltd's compliance with its environmental permit by reviewing data and conducting inspections.

The 7 additional gas wells have been connected to the gas collection network and the extraction of landfill gas from them has begun. Data we have received indicates that gas flow to the gas utilisation plant (GUP) continues to remain relatively steady. The extraction rate recorded on 25 November 2022 increased slightly to 3177 m³/hr and the recorded level of hydrogen sulphide at the gas utilisation plant was 1200 ppm. These results are within the normal operational fluctuations we expect.

Facebook Group

November's Facebook Q&A is now available to view on Facebook. Every month we provide a transcript of the Facebook Q&A session here on Citizen Space, so those of you that are not members can access the information. We are currently working on a transcript of the November Q&A which will be uploaded to Citizen Space as soon as possible.

As previously indicated, due to the volume of questions we received in November, we will be splitting the session into two parts.

- Part one, which is now available
- Part two, which we aim to upload by 14 December

We will inform you on Facebook and here on Citizen Space when the video for part two is ready for you to view.

During December we will be working on an update to our FAQs (Frequently Asked Questions) here on Citizen Space. There will be no Facebook questions thread in December.

The next Facebook Questions Thread will open in January 2023 and we will inform you of the date here on Citizen Space.

Reporting odour

It is important that you continue to report odour to us. Reports from local people, along with our regulatory visits and monitoring from our mobile monitoring facilities help to create a picture which informs our enforcement and regulatory approach.

The easiest and quickest way to make a report is via GOV.UK at: <https://report-walleys-quarry-smell.service.gov.uk/>. If you do report odour to us via our incident hotline, please be courteous to our staff. They are working to deal with your reports as efficiently as possible.

There has been a small change to the way we manage the incident reports we receive by email (in order to reduce the number of emails reporters receive). From 1 December 2022, an automatic response email will be sent, followed by a confirmation email containing the incident reference number no more than 3 days later.

Latest hydrogen sulphide levels

Our Ambient Air Monitoring Team continues to check air quality around Walleys Quarry landfill. It does this through a network of mobile monitoring stations (MMFs) that are positioned in communities around the site. These check for levels of hydrogen sulphide and methane, which are indicators of odour pollution.

The chart below contains a summary of the raw data collected from our ambient air mobile monitoring facilities (MMFs) in the period 21 November to 27 November. They stayed the same at MMF1, MMF6 and MMF9 and decreased at MMF2.

MMF ID & Location	% of time the monitoring location recorded H ₂ S above the WHO annoyance guideline level %	Change
MMF1 Cemetery	4.5%	— on previous week
MMF2 Silverdale Pumping Station	0.0%	▼ on previous week
MMF6 Fire Station	0.0%	— on previous week
MMF9 Galingale View	0.0%	— on previous week

It is important to note that this is raw data and may change slightly as results are verified.

It's important to note that there will always be short-term fluctuations in the concentrations of hydrogen sulphide leaving the site especially given the low concentrations we are monitoring. The causes can include factors such as the impact of improvement works being carried out on site and changes in the weather.

Concentrations of landfill gas emissions generally increase overnight, during periods of colder weather, and in still wind conditions with clear skies, most frequent in the winter and spring months. With less ability for the landfill gas emissions to disperse, there is greater potential for these emissions to cause an odour nuisance in the local area. By contrast, during periods of unstable meteorological conditions (warmer weather, higher wind speeds) the gases are more easily dispersed and diluted. This means improvements from measures implemented at Walleys Quarry Landfill to reduce odour could be less noticeable in the winter and spring.

However, hydrogen sulphide concentrations are greatly reduced since monitoring began, in both the source emission and ambient air measurements. Despite temporary low-level fluctuations in concentrations triggered by the weather, our ongoing regulation is ensuring the source emission of hydrogen sulphide from the landfill site continues to remain low.

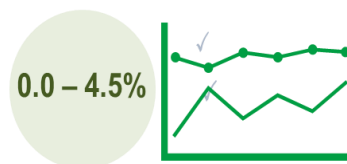
We are not focusing on the monitoring data in isolation and recognise that people may still detect odour from the site. We continue to compare daily odour incident reports with air quality data and source emissions monitoring, looking for trends and issues that will support us in challenging Walleys Quarry Ltd to improve site operations and the capture of fugitive emissions.

Odour Reports

In the week 21 November to 27 November. The Environment Agency received a total of 70 odour reports from local members of the public. This is a decrease compared to the previous week. The highest number of odour reports was on Tuesday 22 November when 21 reports were received.



Number of odour reports/complaints to the Environment Agency
21 - 27 Nov 2022



Hydrogen Sulphide 30 minute average odour annoyance: % of time above WHO guideline level
21 - 27 Nov 2022



Hydrogen Sulphide Level. 24 hour World Health Organisation guideline to protect against short term health effects

Correspondence

Other than by means of the Facebook Group mentioned above, we are unable to answer questions through social media. If you have a question, you can [email](#) us.

Other sources of information

UK Health Security Agency public health messages and advice about the effects of odours from Walleys Quarry landfill are available online via Staffordshire County Council's website: [Frequently asked questions about the health effects of odours and emissions from Walleys Quarry: - Staffordshire County Council](#)

Walleys Quarry Ltd website: <https://walleysquarry.co.uk>