

Popeyes UK Ltd

06/01 /2024

Ref: Odour assessment for proposed Popeyes Uxbridge

Dear Sirs,

Please find below our assessment of the potential for nuisance Odour arising from the cooking processed carried out at the above site. Although recently withdrawn and in the absence of any other document, we have based our assessment on using EMAQ+ Control of Odour and Noise from Commercial Kitchen Exhaust Systems 05-9-2018

Dispersion

The kitchen extract ductwork is to pass from the kitchen canopy internally through the fan and filtration system, out of the rear wall of the Popeyes unit demise to a central enclosed court yard . The ductwork then rises up the rear elevation to discharge through a vertical discharge at 15m/s, 1.5m above the parapet of the building.

Assessment score 5

Proximity of Receptors

The location of the discharge has been noted to be within 20-100m of the nearest receptor

Assessment score of 5.

Size of Kitchen

This restaurant is medium sized between 30 and 100 covers

Assessment score of 3.

Cooking Type (odour and grease loading)

The type of food being cooked is fried chicken and fast food

Assessment score of 10

Total Assessment Score = 23

Based on the above score, and following Emaq+ guidance, a high level of odour control will be required on this extraction system. As such we would propose to install a system comprising of the following:

System specification for high level of odour control:

1. Canopy baffle filters used as primary filters within canopy
2. UV odour control unit ducted into canopy ductwork
3. ESP filtration units for removal of smoke and grease

Filtration Specification

Based on the latest catering layout provided, using method 1 of DW/172:2017 we have determined a Specific Extract flow rate for the cooking operation of 1.35m³/s. With this flow rate in mind, the factors of dispersal, operation type and the report result of requiring a high level of filtration we recommend the following extract filtration system is provided for installation:

Primary canopy filtration

50mm deep Heavy-duty, Stainless-steel Baffle filters fitted as primary filtration on the Kitchen extract canopy

ESP/ UV

Purified air UVO – 1000 ducted ultraviolet odour control, connected into the Kitchen canopy header

4no. Purified Air Esp 1500 in 2x2 formation designed to cope for air flow volumes up to 1.4m³/s

Maintenance

The washable stainless-steel grease baffle filters will be cleaned daily as part of a cleaning regime.

The ESP systems will be cleaned, and filters replaced based on monitored schedule with a minimum change of 6 weekly services however with a reduction between service periods depending on trading level

The UV tubes are to be visually inspected monthly but have an hour specific operation life and will require replacement on a frequency in line with the manufacturer's recommendations.

As well as maintenance to the filtration, the fan unit will be maintained and cleaned as per the manufacturer's recommendations, and this should form the basis of a service contract.

The ductwork cleaning will be provided in accordance with TR19 as published by the HVCA. We hope you find this proposal to your satisfaction, please contact us with any queries.

Yours Sincerely

Adam Moran