

CASE STUDY

Adapting to High Kitchen Demand

Quick Service Restaurants

Overview

Quintex has worked with a variety of different quick service restaurants, including KFC, Nando's, Wagamama's, Ikea, Deliveroo and more. In this case study, we will explore the technical aspects of their ventilation systems and highlight the energy savings achieved through our Cheetah solution.

Cheetah is a demand control kitchen ventilation system that uses a series of network sensors installed into the kitchen ductwork and canopy that monitor the activity on the cookline. Cheetah can slow down the fan speeds to as low as 40% during low-demand periods, which uses only 6.4% of the required power.



At two sites, KFC's two 3kW fans running at full speed, consume a total of 40,500 kWh and, at a rate of 25p per kWh, this equates to £10,000 annually for running the fans 15 hours per day. This wasn't sustainable financially and had a big environmental impact as they are also producing 5 Tonnes of CO2 each year.

Here's the game changer...

Our proven DCKV system, Cheetah, was implemented into their kitchen's ventilation system, and as a result, the energy consumption was dropped to 16,800 kWh, saving 23,700 kWh and nearly £6,000 per year, cutting their fan energy usage by 58%



Now let's compare this to Nando's. Across five sites, Nando's was consuming 448,000kWh annually, which, at an energy rate of 25p per kWh, resulted in £112,000, just to run their kitchens fans. Their extract fans are rated at 7kW, significantly larger compared to KFC.

After installing Cheetah, we've reduced their fans consumption to 235,000kWh, saving them 212,000kWh each year. Nearly cutting their fans energy usage in half! Saving them £53,000 and 48 Tonnes of CO2 each year.



Cheetah



Key Stats & Figures

Each year we save KFC Birmingham 2 sites;

23,875 kWh saved each year

5 Tonnes of CO2 saved each year

£6,000 Pounds saved each year

17 MONTHS Return on investment

58% Fan energy reduction

Since Cheetah was installed, we save Nando's [across 5 sites];

212,170 kWh saved each year

48 Tonnes of CO2 saved each year

£53,000 Pounds saved each year

11 MONTHS Return on investment

47% Fan energy reduction

Are you looking to integrate the Cheetah system into your kitchen ventilation? Contact our sales team for a free desktop survey, and let's start your energy-saving journey with Quintex



Deliveroo have recently won 'Operator of the year' by foodservice equipment awards 2024 with Cheetah being included in their kitchen design



Please contact our sales team for additional real time data from quick service restaurants we've installed Cheetah in.

www.quintex.co.uk | sales@quintex.co.uk

