



CRYPTOMATHIC IMPLEMENTS SUSTAINABILITY REPORTING TO COVER COMPANY EMISSIONS WORLDWIDE

Cryptomathic takes the environment very seriously and even though we are a company that digitalises the world and indirectly reduces thousands of tonnes of CO2 emissions, we still need to know how much we emit, how we can reduce our emissions and what we can do to offset the rest. Beyond pollution and CO2, sustainability is also about the environment of the company, its employees and the wider community. This report gives insight into Cryptomathic's approach to sustainability with regards to our staff, the community and the environment as a whole.



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An Introduction from us

Welcome to our second sustainability report. Following on from last year we have captured, measured, reported and communicated our actions and compared this to our 2016 benchmark.

This Report once again demonstrates how we act responsibly in relation to our employees, the communities that we operate in and the environment. We have compared our actions to last year's targets and set new ones as we further develop our sustainability strategy. These will in turn be compared against our 2018 Report in order to gauge our progress and expand our ambition.

We feel it is important to engage with stakeholders, customers and partners; accordingly we welcome any comments on our performance and suggestions for targets from anyone who reads this Report. We would also like to encourage other companies to start the process of sustainability reporting.

About Cryptomathic

Founded in 1986, Cryptomathic has become one of the world's leading providers of secure solutions based on crypto across a wide range of industry sectors.

We pride ourselves on strong technical expertise and unique market knowledge, with 2 out of 3 employees working in R&D, including an international team of security experts and a number of world renowned cryptographers. At the leading edge of security provision within key markets, Cryptomathic closely supports its global customer base, with many multinationals as longstanding clients.

Cryptomathic's strong focus on research and new inventions has aided in Cryptomathic becoming a market maker, establishing new technologies, all of which are centered around digitalization, bringing convenience, mobility and ease of use while greatly reducing the need for travel and shipping. Examples include the secure electronic signing server, secure electronic bills of lading, automated remote key management, mobile security and much more.

Working from 4 offices accross Europe and the United States, we develop; sell; deliver; maintain and support the most secure and efficient off-the-shelf and customized commercial crypto solutions.

KEY FACTS

Total Number of Staff: 64

Our Offices:

Aarhus, Denmark

Cambridge, UK

Munich, Germany

San Jose, USA



■ Men: 51

■ Women: 13



Staff

The following section describes what actions we take towards investing in our employees.

Investment in training for all staff

The environment in which our employees work is vital to their wellbeing and productivity, so Cryptomathic does not use open plan desk environments, but instead we provide individual and shared offices, with plenty of natural light through large window areas and workstations featuring electric height adjustable desks.

Commitment to provide professional training for all staff:

We are committed to provide professional training and we encourage our staff to continually progress their professional training and development. Over the year we have provided courses for staff across our locations to develop their professional skills and competencies.

“

The Scrum Master certification has helped me understand and improve on our development process.

- Rune H.

”

“

Completing the Architecture with Agility training has benefitted my testing, modelling and architecture skills.

- Frederik J.

”

Staff benefits

In addition to professional training, we provide a variety of in-house benefits for our staff, as summarised below:

Aarhus office - as our Head Office, with the largest number of staff, we offer a popular bike to work scheme, subsidised lunch, an open pantry, a weekly visiting all-day massage therapist, plus a games room with fussball and a pool table.

Cambridge office - free use of the in-office gymnasium and table tennis room.

San Jose office - free membership of the building's gymnasium.



Charitable giving and sponsorships

Educated staff form the core of Cryptomathic, which values the importance of education everywhere. As a result Cryptomathic aims to contribute to the communities in which it is based and actively supports local charities as well as educational institutions.

Educational support

\$10,000 annual donation to The University of Chicago for 5 years 2016-2020

£10,000 donation to the Isaac Newton Institute for Mathematical Sciences, University of Cambridge

£1,250 donation to Churchill College, University of Cambridge

\$5,000 contribution to the Real World Crypto Symposium

DKK 5,000 IT Camp for Girls

DKK 50,000 Bjørn Grøn: Film about mathematics

DKK 20,000 Baltik Way Mathematics competition



THE UNIVERSITY OF
CHICAGO



UNIVERSITY OF
CAMBRIDGE



Charitable giving

Aarhus office supports Danish Red Cross and the Danish Cancer Society

Society for Children with Cancer

£3,000 donation to Hunger in Africa

£4,000 donation to Cambridge University Real Tennis Club



DANISH
RED
CROSS



Danish Cancer Society

Society for Children with Cancer



How do we establish our carbon footprint

In order to reach accurate and comparable results, we use the best practice guidelines laid down by Defra (Department for Environment, Food & Rural Affairs). These enable us to measure and calculate the primary emissions sources we generate.

We have used the GHG (Greenhouse Gas) Protocol for our GHG measurement as this is the most widely adopted international accounting tool in the world. It serves as the foundation for nearly every GHG standard and program in the world - from the International Standards Organization to The Climate Registry - as well as thousands of GHG inventories prepared by individual companies.

The Scope definitions

SCOPE 1 EMISSIONS:

Emissions from activities owned or controlled by CRYPTOMATHIC. Scope 1 emissions include emissions from combustion in vehicles; emissions from production in owned or controlled process equipment.



SCOPE 2 EMISSIONS:

Emissions released into the atmosphere associated with CRYPTOMATHIC's consumption of purchased electricity, heat, steam and cooling. These are indirect emissions that are a consequence of our organisation's energy use but which occur at sources we do not own or control.



SCOPE 3 EMISSIONS:

Emissions that are a consequence of our actions, which occur at sources which we do not own or control and which are not classed as Scope 2 emissions. An example of this is taking business flights.



Boundaries and Exclusions

In calculating our GHG inventory, we have established that the most relevant boundaries for our business relate to emissions within an operational control boundary, comprising electricity usage and business travel. We have opted to further incorporate all vehicle use, including employee commuting under our Scope 3 emissions to provide a broader view of the impacts of our business.

Emissions resulting from heating and cooling are not specifically itemised, as their emissions in our calculations are based on energy use.

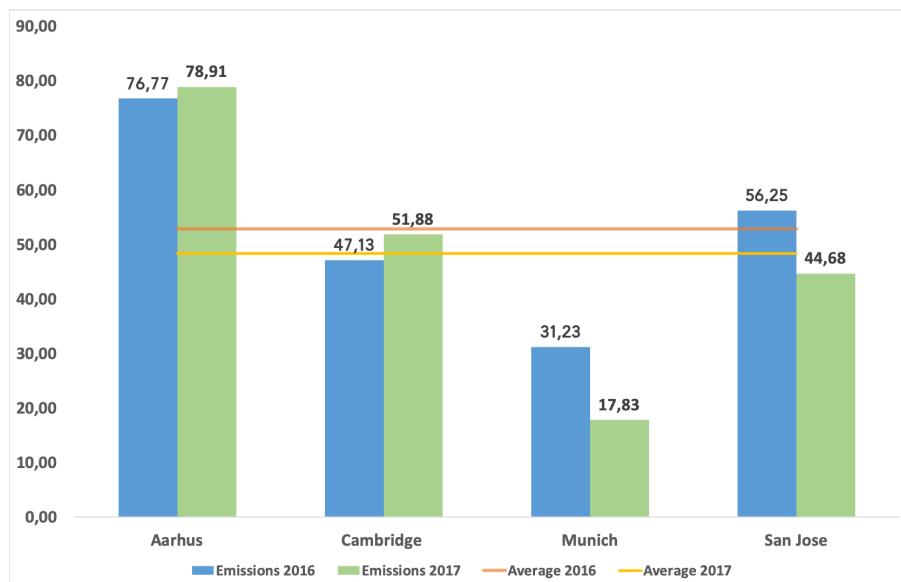


Total group emissions summary

193.31
tonnes CO₂e

Total emissions of all four offices

Emissions breakdown by office



78.91
tonnes CO₂e

Aarhus emissions

51.88
tonnes CO₂e

Cambridge emissions

17.83
tonnes CO₂e

Munich emissions

44.68
tonnes CO₂e

San Jose emissions

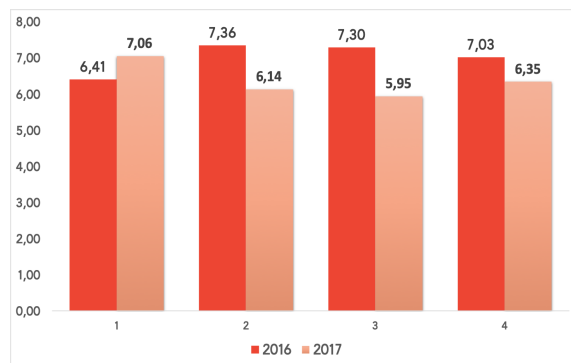


Aarhus emissions breakdown

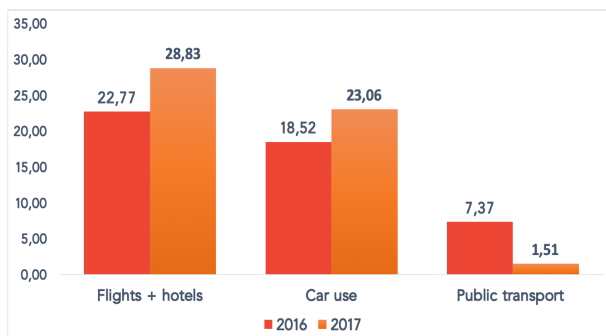
Scope 1 emissions

Scope 1 emissions refer to emissions caused from combusted fuels at company facilities. In the case of the Cryptomathic office, no fuels are burned on site therefore Scope 1 emissions do not exist. Note that the emissions for the Aarhus office also include those of Copenhagen.

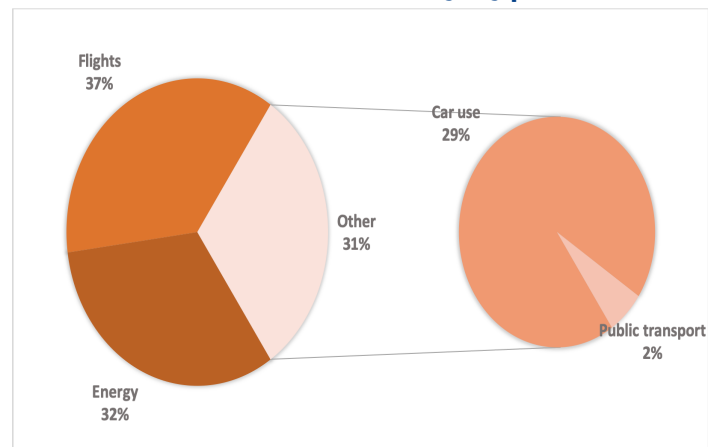
Scope 2 emissions



Scope 3 emissions



Total emissions by type



Aarhus total emissions 78.91 tonnes CO₂e

Emission factor calculation data sources

Electricity	CO2 emissions per generated kWh of electricity in Denmark based on the Key Figures and Energy Maps Report for Danish electricity by the Danish Energy Agency. (http://www.ens.dk/)	Mass transit	Defra/DECC (2017). UK Government conversion factors for greenhouse gas reporting. Department of Environment Food and Rural Affairs/Department for Energy and Climate Change, London. The same data source provides data points for both bus and train emissions (measured in kg CO ₂ e per Passenger Kilometer)
Flights	Source: 2017 UK Government GHG Conversion Factors for Company Reporting. Based on average consumption data for typical short-haul and long-haul aeroplanes and flight class. Radiative forcing (RF) impact is included in the calculations	Lodging	The hotel conversion factors are from the Hotel Footprinting Tool, produced by the International Tourism Partnership and Greenview, which have been derived from the Cornell Hotel Sustainability Benchmarking Index
Vehicle use (Passenger vehicles)	Source: 2017 UK Government GHG Conversion Factors for Company Reporting. Vehicle emissions based on car type and size. (measured in kg CO ₂ e per Passenger Kilometer)		

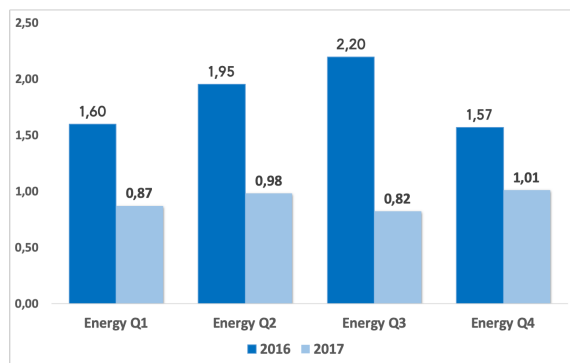


Cambridge emissions breakdown

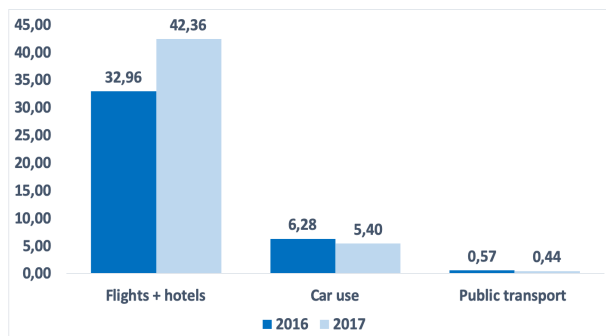
Scope 1 emissions

Scope 1 emissions refer to emissions caused from combusted fuels at company facilities. In the case of the Cryptomathic office, no fuels are burned on site therefore Scope 1 emissions do not exist.

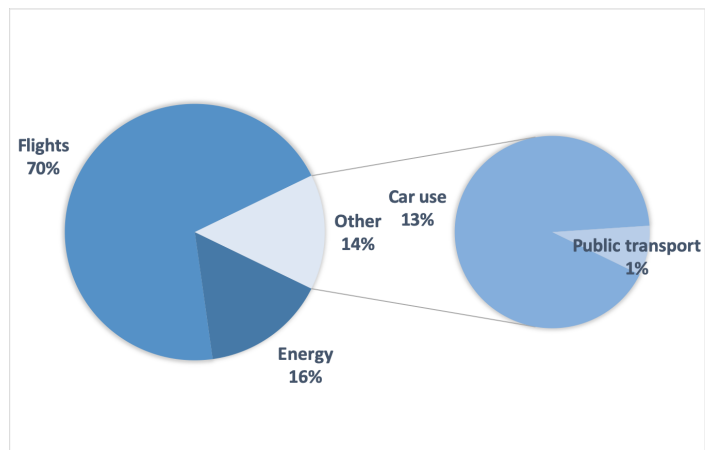
Scope 2 emissions



Scope 3 emissions



Total emissions by type



Cambridge
total emissions

51.88
tonnes
CO₂e

Emission factor calculation data sources

Electricity	Defra/DECC (2017). UK Government conversion *factors for greenhouse gas reporting. Resulting from Electricity generated and Transmission & Distribution for UK electricity. Total measured in kg CO ₂ e consisting of totals of kg CO ₂ , kg CH ₄ and kg N ₂ O	Mass transit	Defra/DECC (2017). UK Government conversion factors for greenhouse gas reporting. Department of Environment Food and Rural Affairs/Department for Energy and Climate Change. The same data source provides data points for both bus and train emissions (measured in kg CO ₂ e per Passenger Kilometer)
Flights	Source: 2017 UK Government GHG Conversion Factors for Company Reporting. Based on average consumption data for typical short-haul and long-haul aeroplanes and flight class. Radiative forcing (RF) impact is included in the calculations	Vehicle use (Passenger vehicles)	Source: 2017 UK Government GHG Conversion Factors for Company Reporting. Vehicle emissions based on car type and size. (measured in kg CO ₂ e per Passenger Kilometer)
		Lodging	The hotel conversion factors are from the Hotel Footprinting Tool, produced by the International Tourism Partnership and Greenview, which have been derived from the Cornell Hotel Sustainability Benchmarking Index

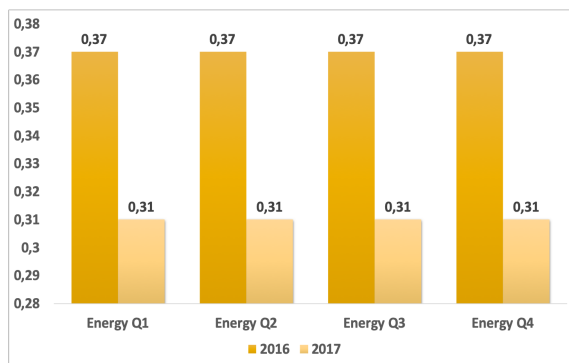


Munich emissions breakdown

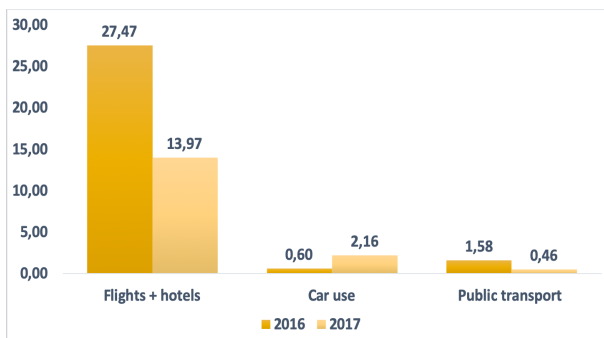
Scope 1 emissions

Scope 1 emissions refer to emissions caused from combusted fuels at company facilities. In the case of the Cryptomathic office, no fuels are burned on site therefore Scope 1 emissions do not exist.

Scope 2 emissions*

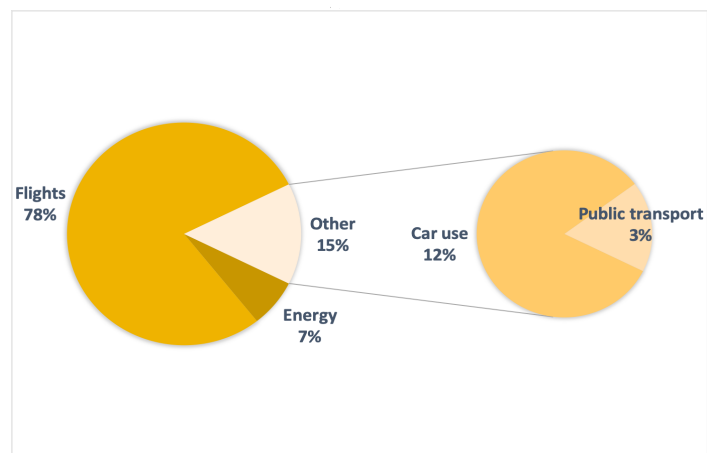


Scope 3 emissions



*Based on an average annual consumption

Total emissions by type



**Munich
total emissions** 17.83
tonnes
CO₂e

Emission factor calculation data sources

Electricity	Electricity map data for 2016 emissions for Germany. Total measured in kg CO ₂ e consisting of totals of kg CO ₂ , kg CH ₄ and kg N ₂ O	Mass transit	Defra/DECC (2017). UK Government conversion factors for greenhouse gas reporting. Department of Environment Food and Rural Affairs/Department for Energy and Climate Change, London. The same data source provides data points for both bus and train emissions (measured in kg CO ₂ e per Passenger Kilometer)
District heat	District heating customers comply with the Renewable Energies Heating Act (EEWärmeG) as Federal government gives heat from highly efficient combined heat and power plants the same status as renewable energies.	Flights	Source: 2017 UK Government GHG Conversion Factors for Company Reporting. Based on average consumption data for typical short-haul and long-haul aeroplanes and flight class. Radiative forcing (RF) impact is included in the calculations
Vehicle use (Passenger vehicles)	Source: 2017 UK Government GHG Conversion Factors for Company Reporting. Vehicle emissions based on car type and size. (measured in kg CO ₂ e per Passenger Kilometer)	Lodging	The hotel conversion factors are from the Hotel Footprinting Tool, produced by the International Tourism Partnership and Greenview,

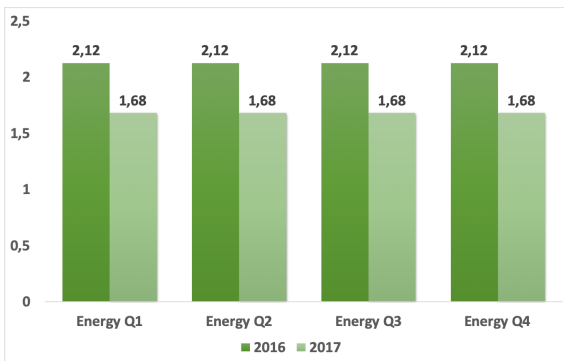


San Jose emissions breakdown

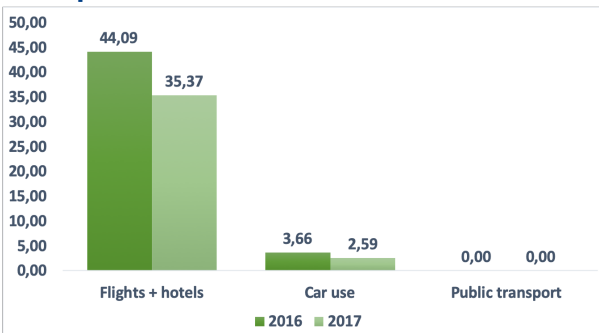
Scope 1 emissions

Scope 1 emissions refer to emissions caused from combusted fuels at company facilities. In the case of the Cryptomathic office, no fuels are burned on site therefore Scope 1 emissions do not exist.

Scope 2 emissions*

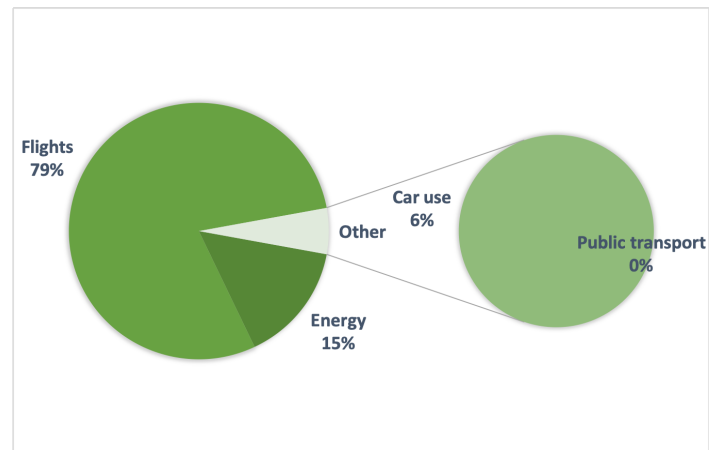


Scope 3 emissions



*Based on an average annual consumption

Total emissions by type



San Jose
total emissions 44.68
tonnes CO₂e

Emission factor calculation data sources

Electricity	Based on EPA.gov eGRID Summary Tables 2016 Latest available data. Total measured in kg CO ₂ e consisting of totals of kg CO ₂ , kg CH ₄ , and kg N ₂ O	Mass transit	Defra/DECC (2017). UK Government conversion factors for greenhouse gas reporting. Department of Environment Food and Rural Affairs/Department for Energy and Climate Change, London. The same data source provides data points for both bus and train emissions (measured in kg CO ₂ e per Passenger Kilometer)
Flights	Source: 2017 UK Government GHG Conversion Factors for Company Reporting. Based on average consumption data for typical short-haul and long-haul aeroplanes and flight class. Radiative forcing (RF) impact is included in the calculations	Lodging	The hotel conversion factors are from the Hotel Footprinting Tool, produced by the International Tourism Partnership and Greenview, which have been derived from the Cornell Hotel Sustainability Benchmarking Index
Vehicle use (Passenger vehicles)	Source: 2017 UK Government GHG Conversion Factors for Company Reporting. Vehicle emissions based on car type and size. (measured in kg CO ₂ e per Passenger Kilometer)		



USE OF KPIs

Performance indicators or 'KPIs' are a concise, standardised way to describe our performance. They enable comparison between reporting years and can take account of changes within the business such as growth in headcount.

OVERALL GROUP EMISSIONS INTENSITY

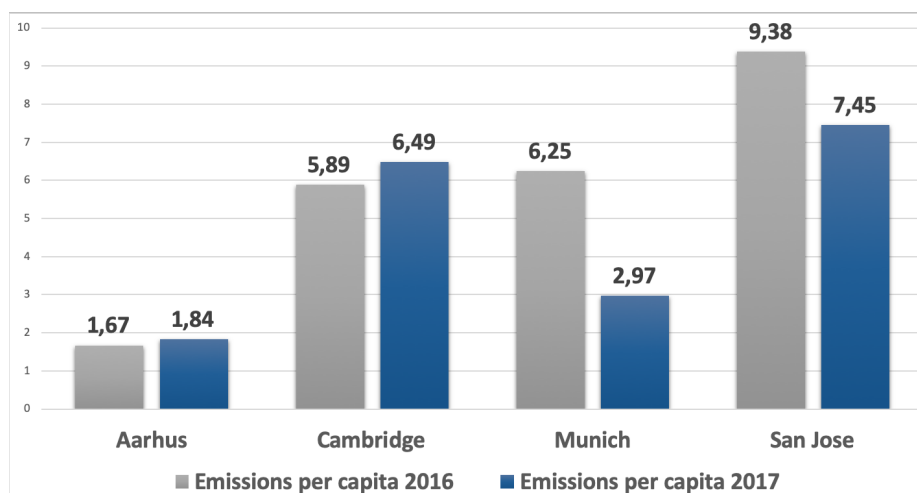
The overall emissions intensity per capita sets a group benchmark considering all of the company's offices as a whole. This allows us to measure and compare the overall environmental KPI of our organisation.

In comparison to the 2016 emissions intensity, the overall group emissions have reduced by 7.07% per capita.

3.02 tonnes
CO₂e per
capita

7.07% Decrease
in
CO₂e per
capita

EMISSIONS INTENSITY breakdown by office



By breaking down the emissions between the offices, we can see that while the overall emissions in the largest office are closer to double those in the other locations, the emissions intensity is actually better. This is due to efficiencies resulting from having more personnel operating from the same location.

This is also attributed to the office housing more administrative and technical, rather than sales staff who typically generate higher emissions due to travel.



Efficiency Policy

The company aims to travel as efficiently as possible. While we cannot eliminate flying altogether, we are aware of the environmental impact and use alternative modes, where possible. Our European offices use rail travel widely and all offices have videoconferencing facilities which we use to further reduce our travel emissions.

We recognise that there is more to do to reduce travel related emissions and we will be using the data gathered from this Report to enable us to analyse and develop new policies. Furthermore we hope to reduce CO2 emissions over time, though with our business growing, the demand for travel increases resulting in more CO2 emissions.



Aarhus



Cambridge



Munich



San Jose





TARGETS FOR 2018 AND BEYOND

We recognise that sustainability impacts all sectors of our business. To continually improve our performance requires us to set ourselves targets. Using our 2017 data as a baseline, we have chosen the following targets for 2018 after consultation with our staff. These will be reviewed in our 2018 Sustainability Report.





YEAR PROGRESS SYNOPSIS

Scope 2 Energy use	2016	2017*	Loss / Gain %
Aarhus	28.10	25.50	-9.24
Cambridge	7.32	3.68	-49.78
Munich	1.47	1.24	-15.65
San Jose	8.50	6.72	-20.94

Scope 3 Car use	2016	2017*	Loss / Gain %
Aarhus	18.52	23.06	24.49
Cambridge	6.28	5.40	-14.04
Munich	0.60	2.16	257.61
San Jose	3.66	2.59	-29.28

Scope 3 Flights	2016	2017*	Loss / Gain %
Aarhus	22.77	21.73	-4.55
Cambridge	32.96	35.37	7.31
Munich	27.47	12.05	-56.14
San Jose	44.09	30.69	-30.39

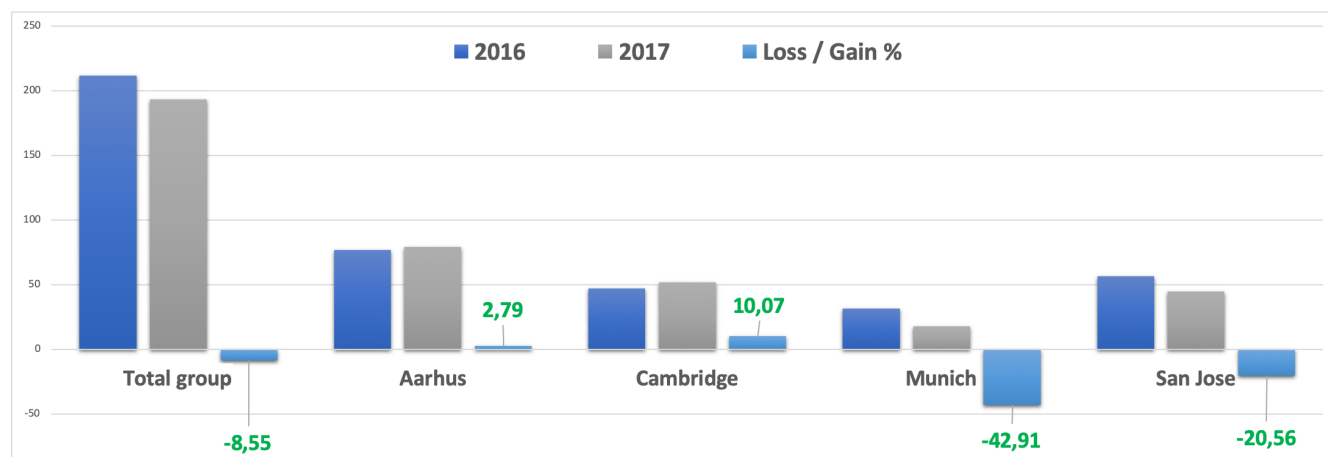
Scope 3 Public transport	2016	2017*	Loss / Gain %
Aarhus	7.37	1.51	-79.50
Cambridge	0.57	0.44	-22.23
Munich	1.68	0.46	-72.59
San Jose	0.00	0.00	0.00

PERFORMANCE AGAINST TARGETS

Reduce emissions from electricity consumption by 5% and travel by 7%, per capita.	ACHIEVED
Update and re-issue Environmental Policy.	NOT ACHIEVED
Measure, reduce and offset all aggregated emissions.	PARTIALLY ACHIEVED
Elect a Sustainability co-ordinator.	NOT ACHIEVED - ONGOING
Continue existing programme of charitable donations.	ACHIEVED
Support an international social impact & carbon offset project for 2016 emissions.	NOT ACHIEVED
Continue to provide professional training & CPD for all staff.	ACHIEVED
Present & promote 2016 Sustainability Report to all staff.	ACHIEVED
Invite and consider 3 x staff generated sustainability ideas for the next reporting period.	ACHIEVED
Identify and consider two low energy investment opportunities in Cryptomathic operations.	NOT ACHIEVED - ONGOING

PROGRESS OVERVIEW

Overall group emissions performance and % change to previous year.





REPORTING PARTNER

This report has been compiled with the assistance of our reporting partner, Tessera Limited.

Tessera Limited is a Sustainability Reporting specialist with over 10 years of experience in the UK and European environmental markets.

For more information see: www.tessera-ltd.com



Tessera Limited

METHODOLOGY AND REPORTING PERIOD UTILISED

We do not have responsibility for any emission sources that are not included in our consolidated statement.

We have used the GHG Protocol: A Corporate Accounting and Reporting Standard (Revised Edition), one of the standards approved for reporting by the Defra Environmental Reporting Guidelines.

All emissions calculations have been conducted using the latest greenhouse conversion factors published by Department for Energy and Climate Change (DECC) and Defra. The emissions have been calculated for the period: 1. Jan 2017 until 31. Dec. 2017.

REPORT SIGN-OFF

Report attestation by:

Date of Compilation:	31/05/2019
Issued by:	Grattan MacGiffin
Email:	gmg@tessera-ltd.com
Registered Address:	Tessera Limited, 29 High Street, Harston, Cambridge, CB22 7PX