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# UEB fluxes products for demonstration

Deliverable D8.2



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## CONTENTS

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1	Introduction .....	2
1.1	Purpose of the document .....	2
1.2	Definitions and acronyms.....	2
1.3	Symbols .....	2
2	UEB Products for Demonstration .....	2

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## 1 INTRODUCTION

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### 1.1 Purpose of the document

This document is a supplement to Deliverable D8.2, briefly describing the UEB (Urban Energy Budget) fluxes products for demonstration.

### 1.2 Definitions and acronyms

#### *Acronyms*

UEB	Urban Energy Budget
URBANFLUXES	URBan ANthropogenic heat FLUX from Earth observation Satellites
WP	Work Package

### 1.3 Symbols

$Q_F$	Anthropogenic heat flux
$Q^*$	Net all-wave radiation flux
$Q_H$	Turbulent sensible heat flux
$Q_E$	Turbulent latent heat flux
$\Delta Q_S$	Net change in heat storage within the volume

## 2 UEB PRODUCTS FOR DEMONSTRATION

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Several UEB products were available for demonstration and they were used in the Demonstration Events. The ones included in this deliverable are specifically chosen within WP8 for demonstration purposes because they correspond to cloud free days.

Figures 1-6 show representations of the data which have been used in the demonstration events and can be downloadable through the URBANFLUXES data repository: <http://urbanfluxes.eu/data/>

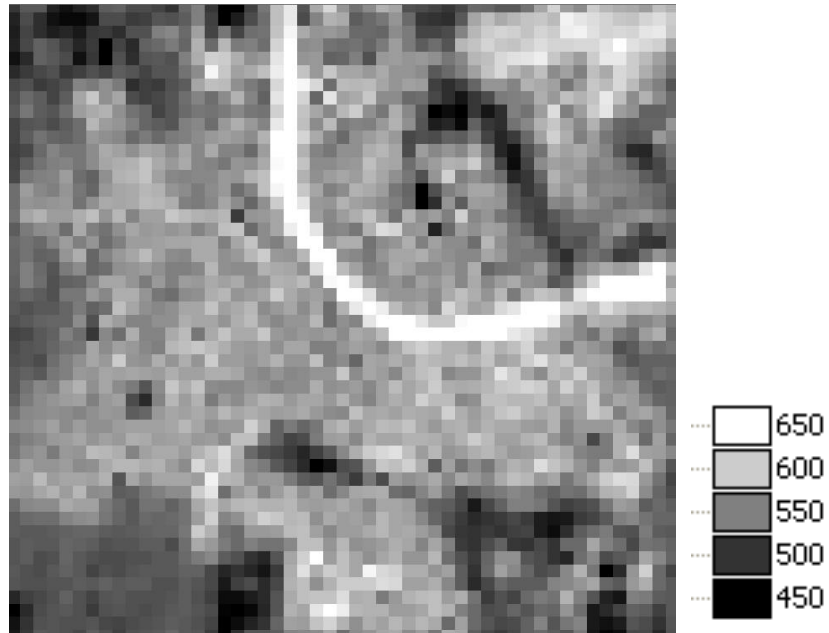


Figure 1. Total Radiative budget for Basel [ $\text{W}\cdot\text{m}^{-2}$ ] on 21/08/2015, 100m grid.

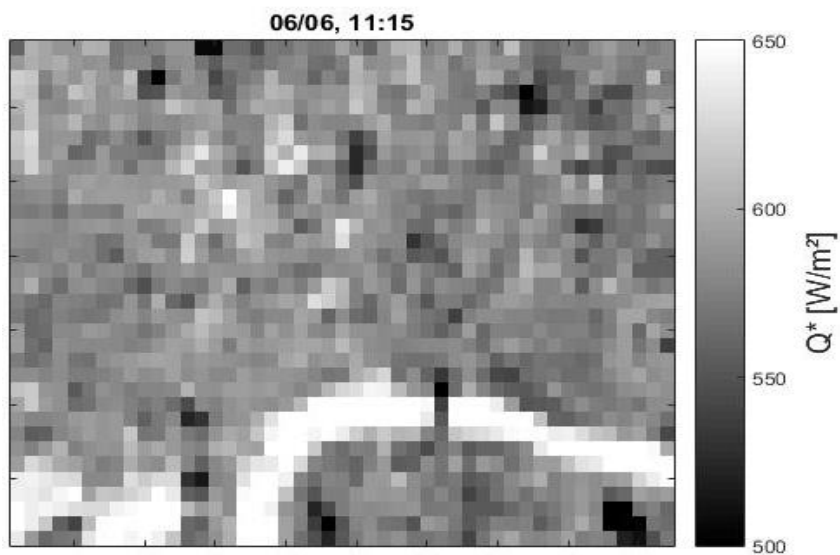


Figure 2. London  $Q^*$  map for the 6<sup>th</sup> June, 2016, 100m resolution.

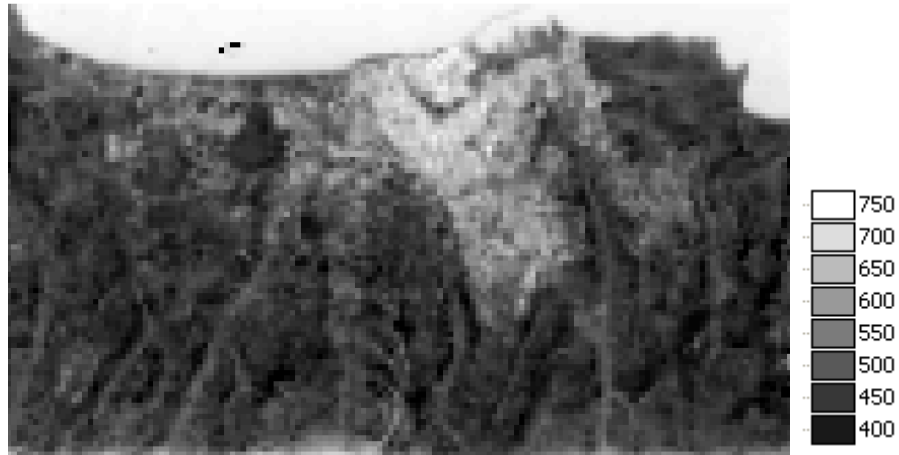


Figure 3.  $Q^*$  map for Heraklion corresponding to 29<sup>th</sup> of July 2016

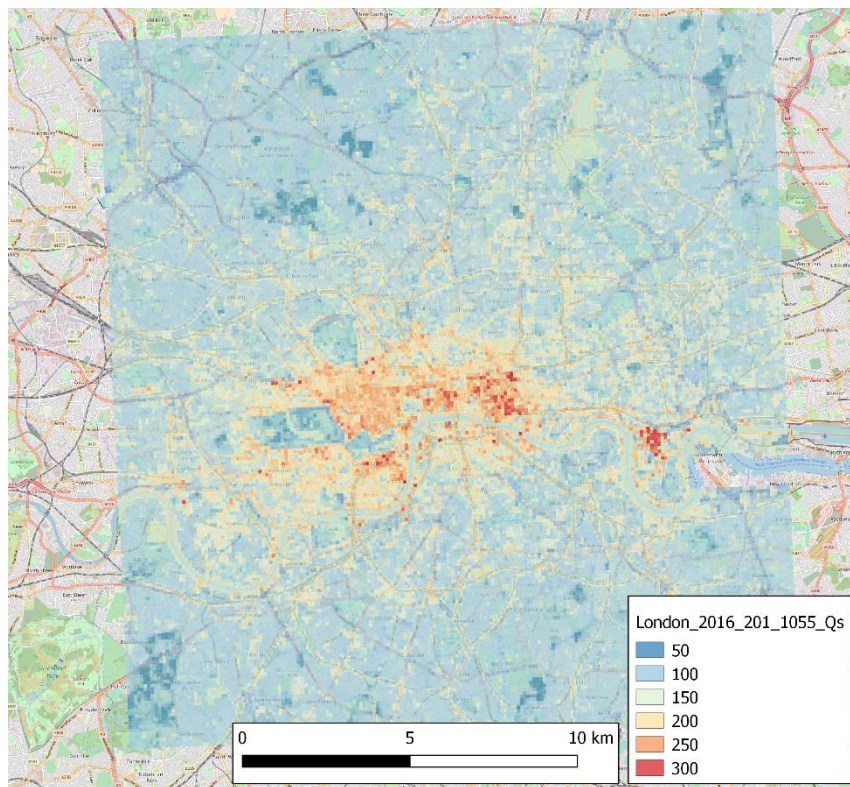


Figure 4. London  $\Delta Q_s$  on a clear summer day 19<sup>th</sup> of July 2016, 11 am.

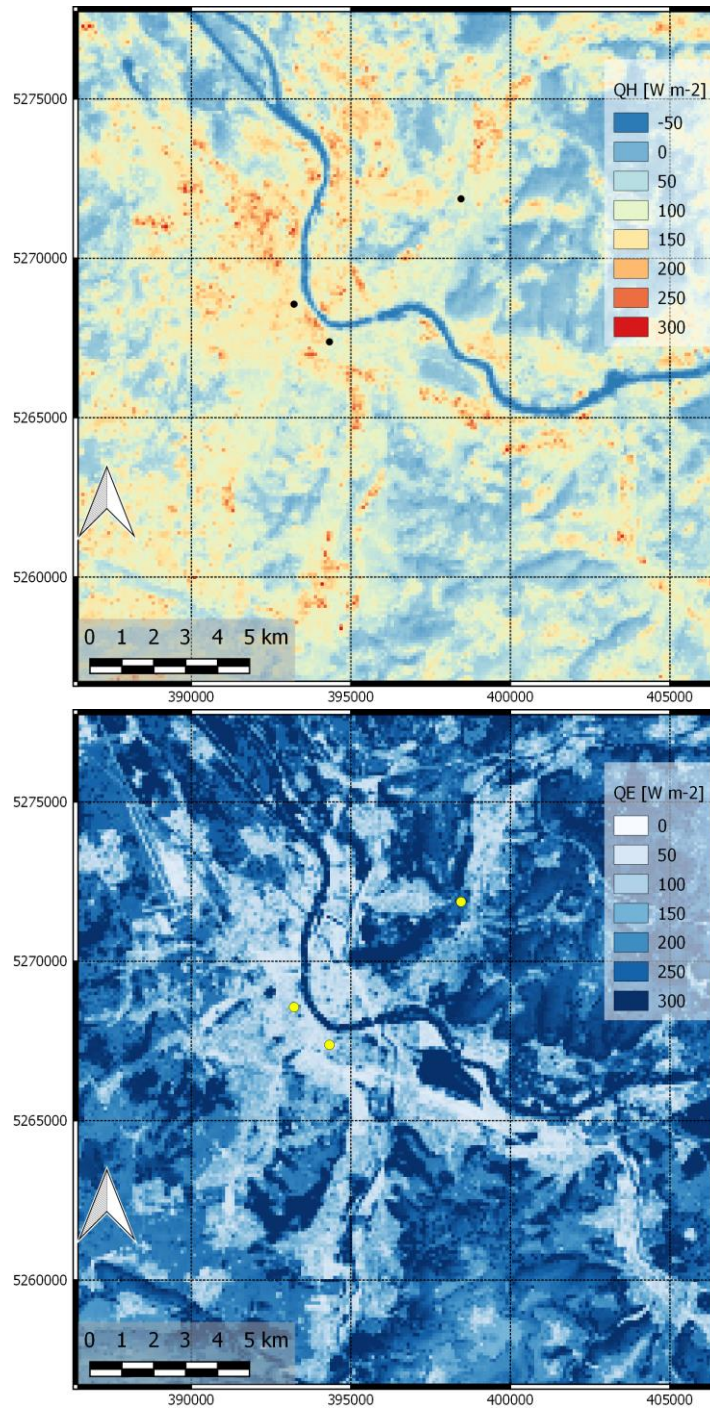


Figure 5. Sensible and latent heat flux for Basel at 30 AUG 2015

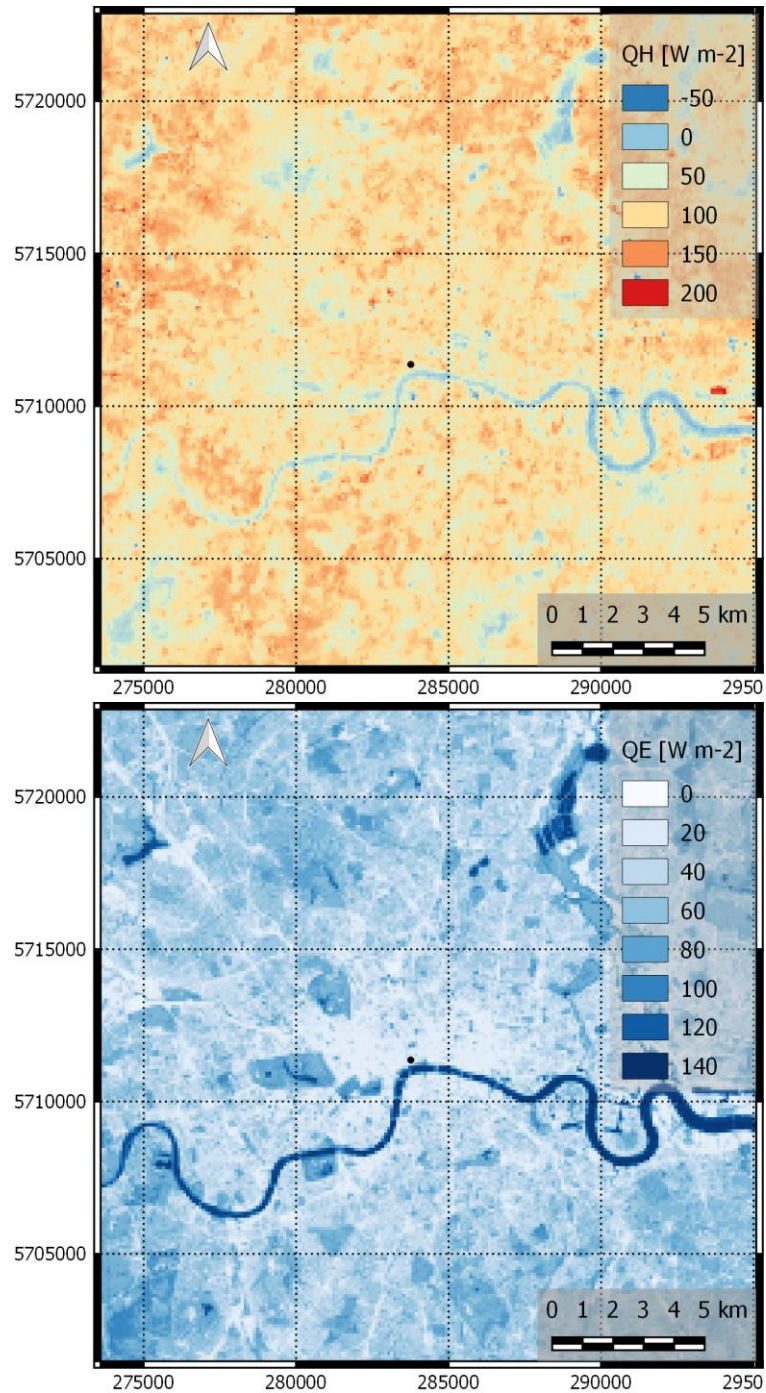


Figure 6. Sensible and latent heat flux for London at 2<sup>nd</sup> OCT 2015

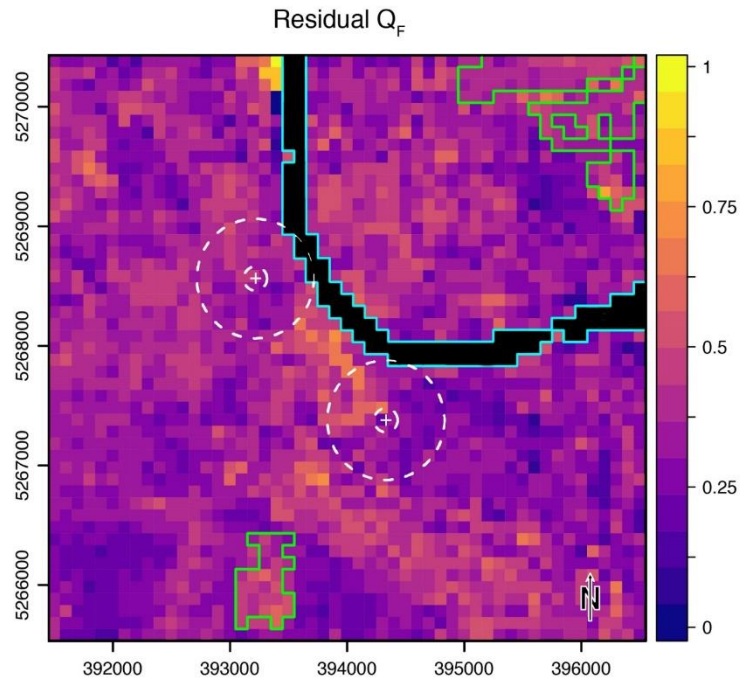


Figure 6. Normalized  $Q_F$  from the remote sensing approach for Basel at 24 June 2016, 11:05 UTC