

A Systems Change for Parks

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EPSRC

Liveable Cities

*Transforming the
Engineering of Cities to
deliver Societal and
Planetary Wellbeing*

A key global finding was the importance of Nature in cities

Presentation:

- The Story
- The Measures
- The World
- The Opportunity

Research findings:-

- Municipal Governance
- Municipal Finance
- Municipal Planning



House of Commons
Communities and Local
Government Committee

Public parks

Seventh Report of Session 2016–17

*Report, together with formal minutes relating
to the report*

*Ordered by the House of Commons to be printed
30 January 2017*

Inquiry- 3 questions:

- Why Parks matter ?
- The challenges Parks face?
- A sustainable future for Parks?



UNIVERSITY OF
BIRMINGHAM

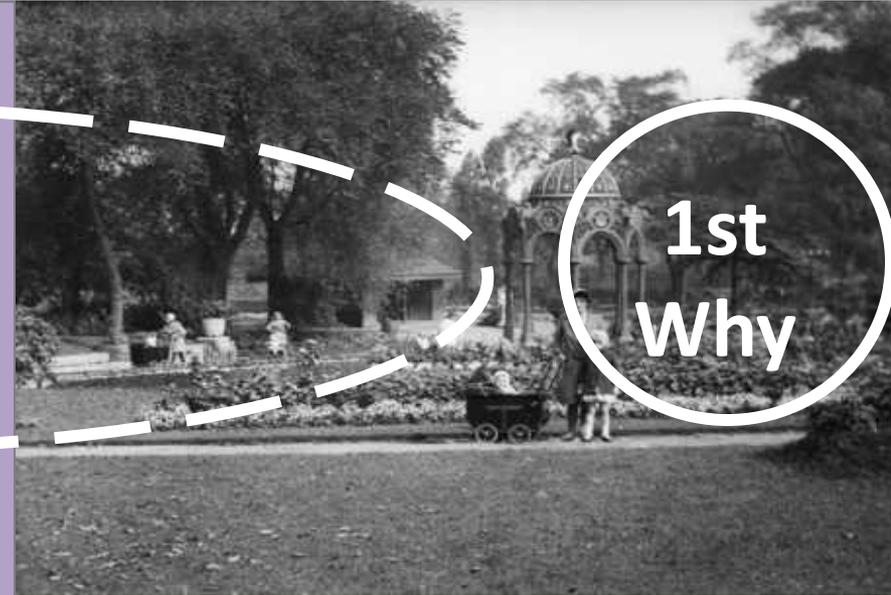
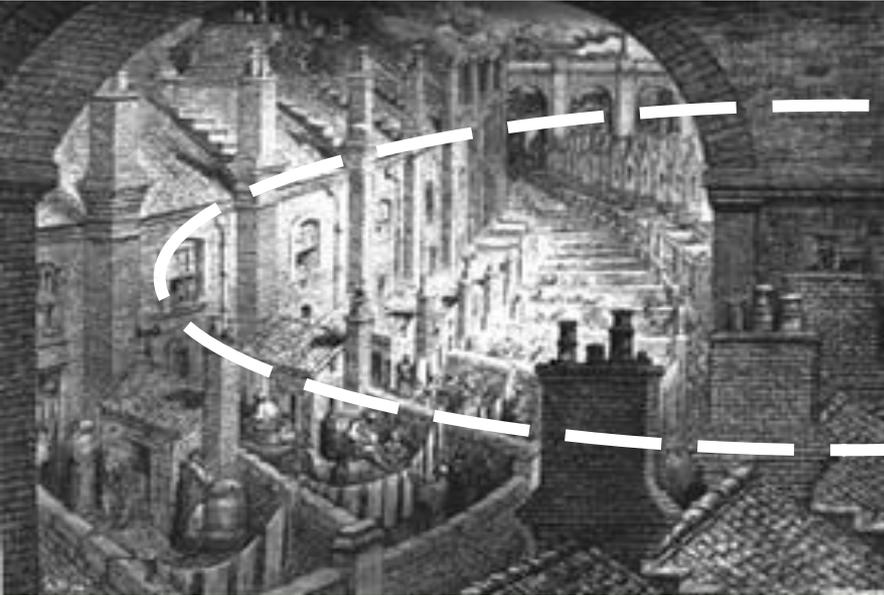
Nick Grayson, Climate Change & Sustainability Manager,
Senior Research Fellow, University of Birmingham



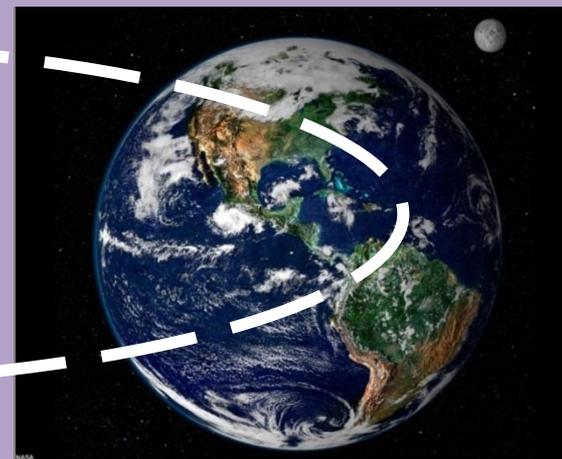
Birmingham
City Council



The Story



**1st
Why**



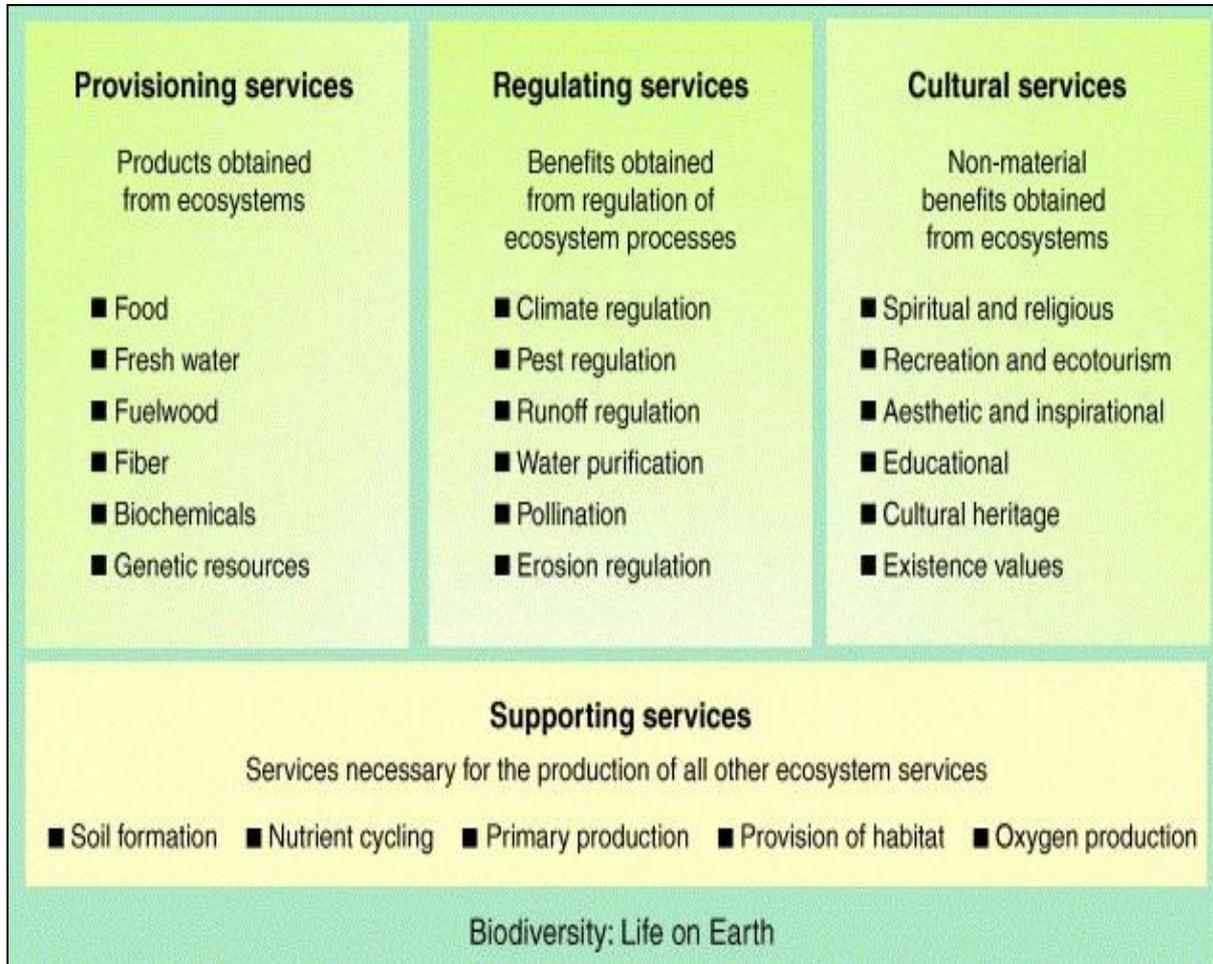
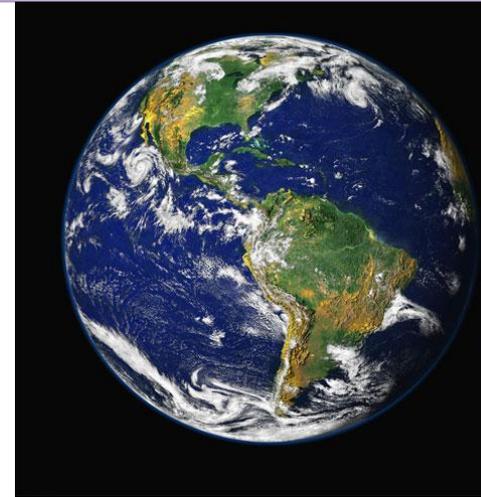
**MEA &
NATURAL
CAPITAL
2005**

2ndWhy



The Measures

Definition - the benefits provided by ecosystems that contribute to making human life both possible and worth living



Emphasizes **service production** but the story is also about **consumption....**

The Measures



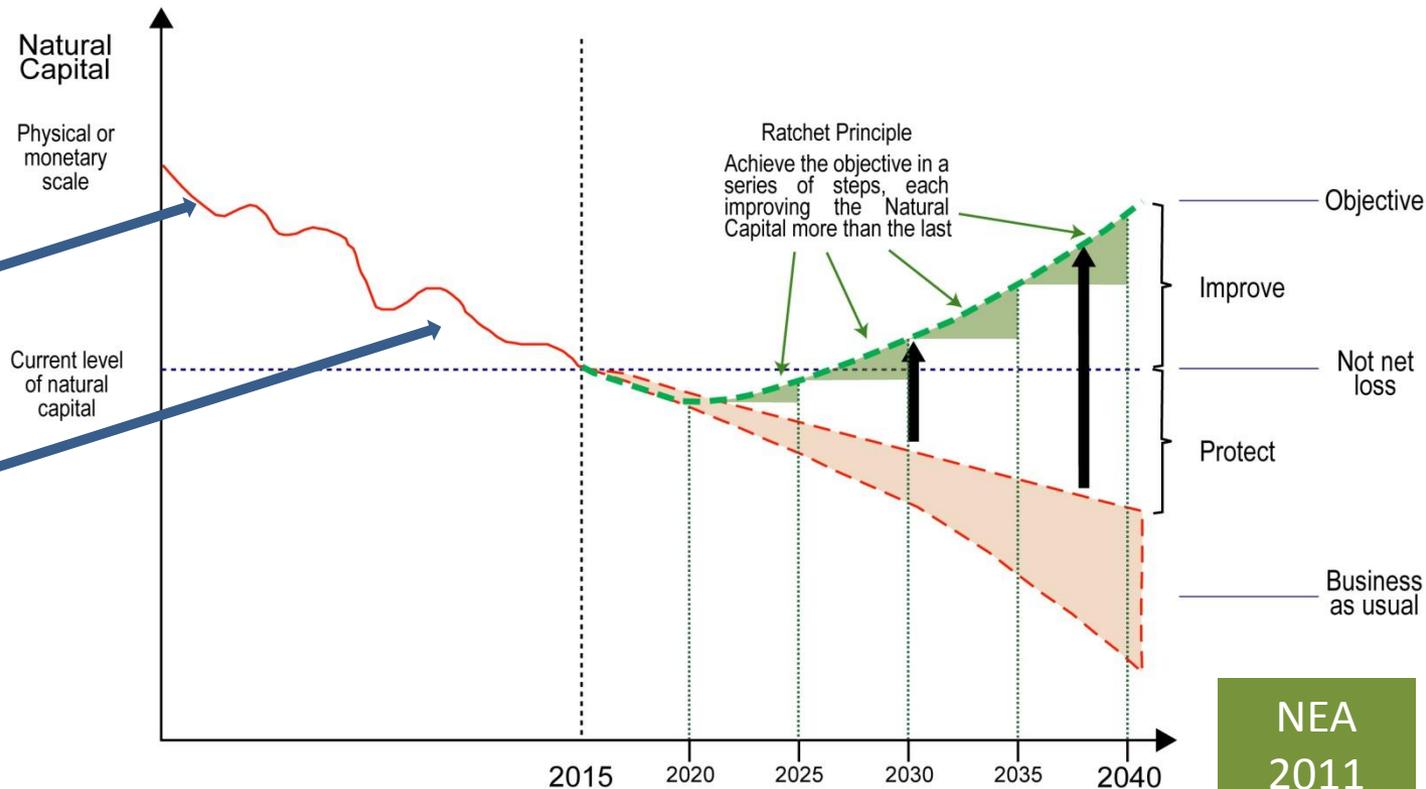
A Green Future: Our 25 Year Plan to Improve the Environment



Natural Capital can be defined as the world's stocks of **natural** assets which include geology, soil, air, water and all living things. It is from this **Natural Capital** that humans derive a wide range of services, often called ecosystem services, which make human life possible. (Natural Capital Committee Third Report 2015)

Figure 1: Protecting and improving natural capital over a generation – a stylised interpretation

25 YEAR NATURAL CAPITAL PLAN



Spatial loss

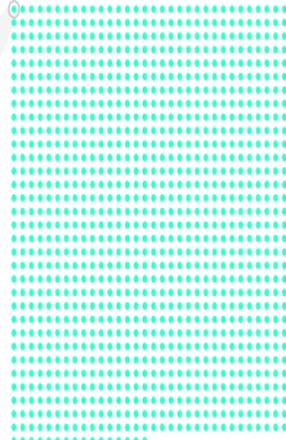
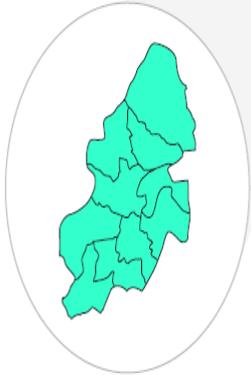
Systems failure

The World (Finance)

1 Birmingham...

... every week ...

... for 20 years



1

52

1040

We need to build the equivalent of one Birmingham a week around the globe for the next 20 years if we are to house the growing urban populations.

THE FARRELL REVIEW INTRODUCTION

IUCN 2016
Article 63
\$200-300bn
1%

The City 600: MGI's Cityscope identifies the world's fastest-growing megacities and middleweights

● The City 600 (600)
● Additional cities in MGI Cityscope (~1,400)



- McKinsey paper 21st century growth and wealth creation:
- http://www.mckinsey.com/insights/urbanization/urban_world;

SOURCE: McKinsey Global Institute Cityscope 1.0

20 YEAR PATTERN OF GLOBAL GROWTH
"Patient Money"



Climate Alliance

Climate Alliance represents \$21 Trillion Dollars of global investment awaiting climate proofing

The World (Finance)

Gross Ecosystem Product

NEW SYSTEM OF GREEN FINANCE

200 M people being paid to restore natural capital



Liveable Cities:
Beijing
Dalian
Shenzhen
Shanghai

GEP – the total value of ecosystem goods and services supplied annually

Healthy ecosystems brings Income stability

Mark Carney



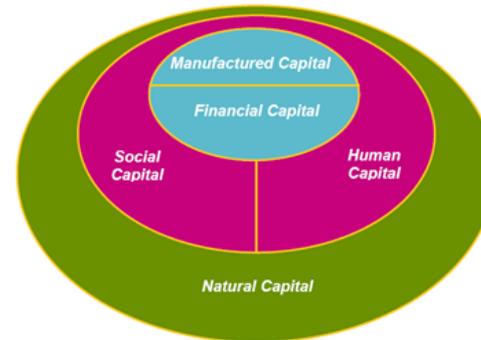
FINANCIAL TIMES



SUSTAINABLE DEVELOPMENT GOALS



2015

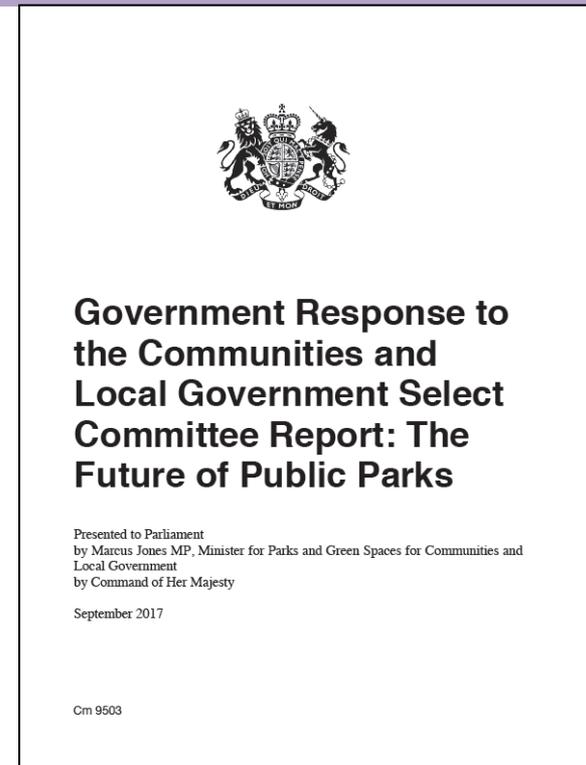
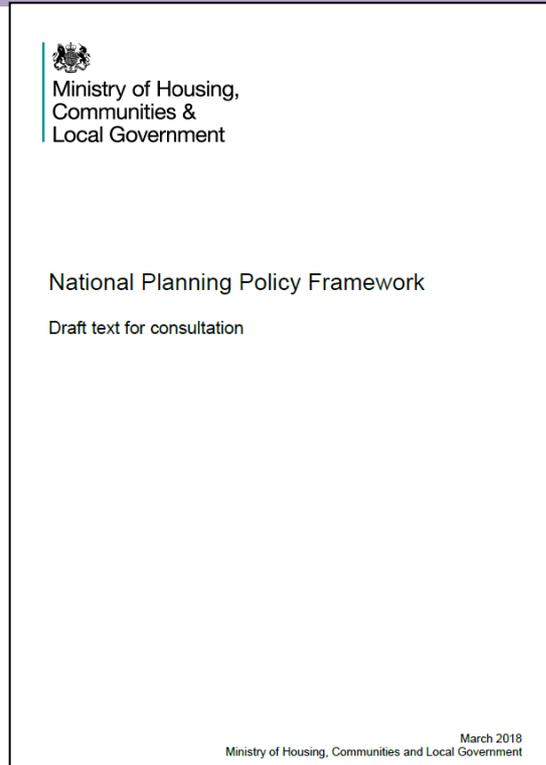


Source: Forum for the Future (2013)
Five essential capitals for human wellbeing



COP21 • CMP11
PARIS 2015
UN CLIMATE CHANGE CONFERENCE

The Opportunity (Governance)



URBAN GREEN SPACE IS THE BIGGEST CONNECTION

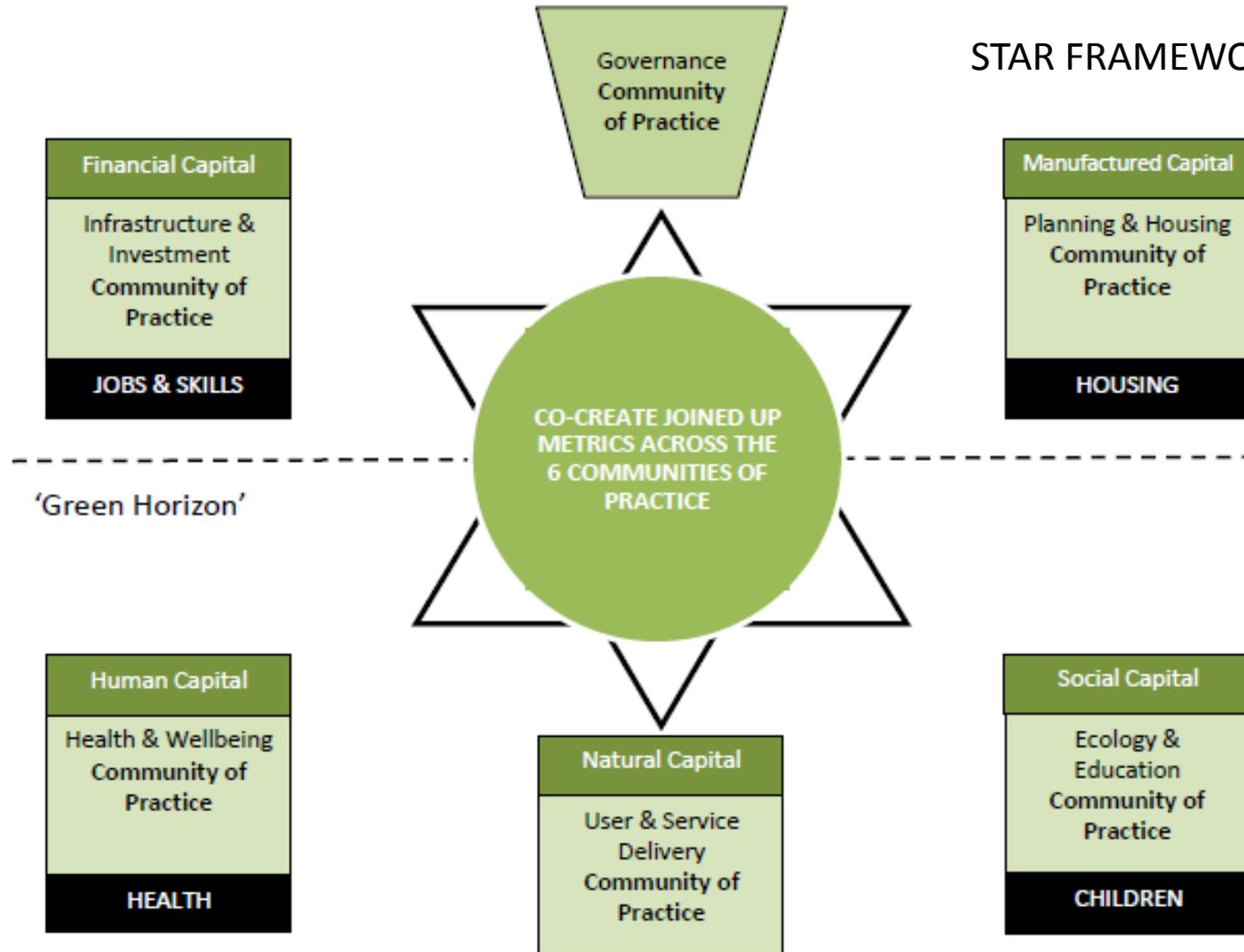
Department for Environment, Food & Rural Affairs (Defra)
Department of Health (DH)
Department for Education (DfE)
Department for Culture, Media & Sport (DCMS)



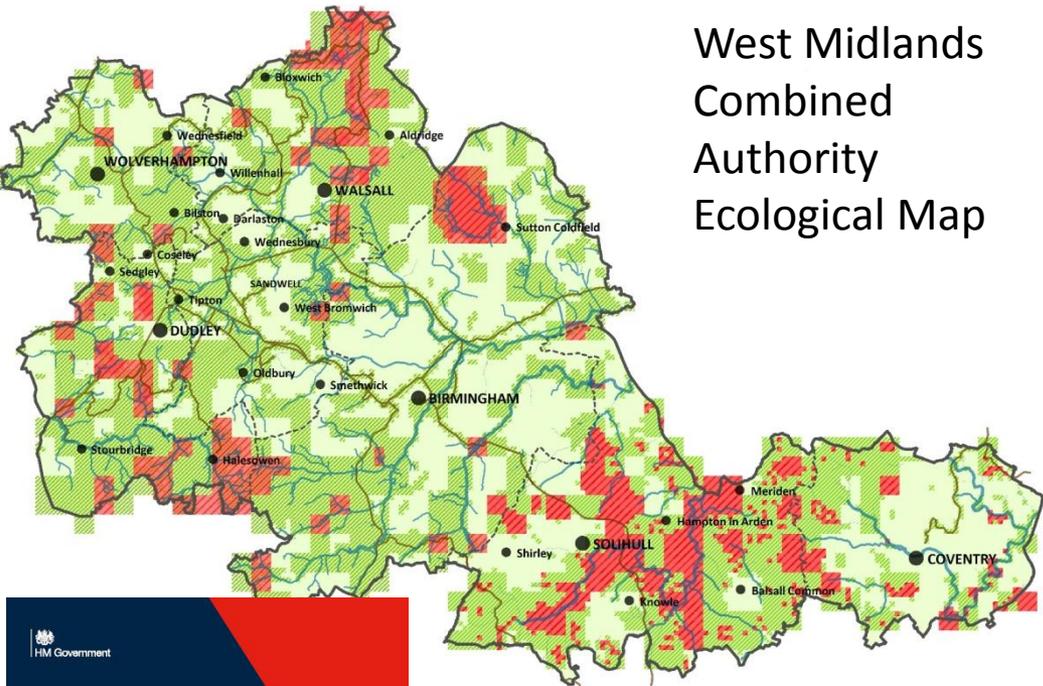
Home Office (HO)
Department for Business, Energy & Industrial Strategy (BEIS)
Department for Work and Pensions (DWP)

The Opportunity (Local Governance)

STAR FRAMEWORK

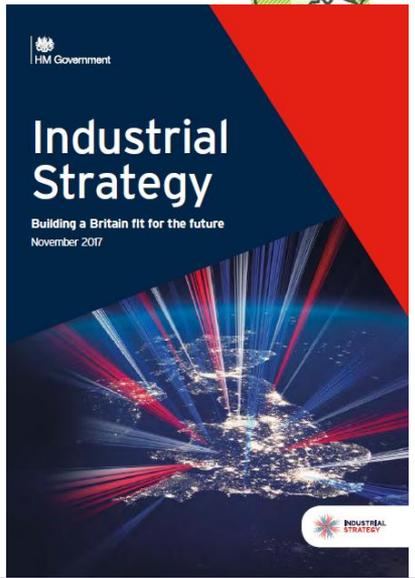


The Opportunity (Planning)

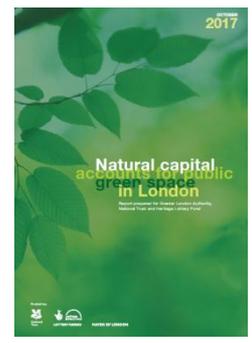


West Midlands
Combined
Authority
Ecological Map

-  Core Ecological Areas
-  Ecological Linking Areas
-  Ecological Opportunity Areas
-  Rivers and Streams
-  Canals
-  Major Settlements
-  Settlements
-  District Boundaries



Birmingham Smithfield
Zero Emissions City Framework
January 2017



The Opportunity (Systems & Spatial Change)



House of Commons
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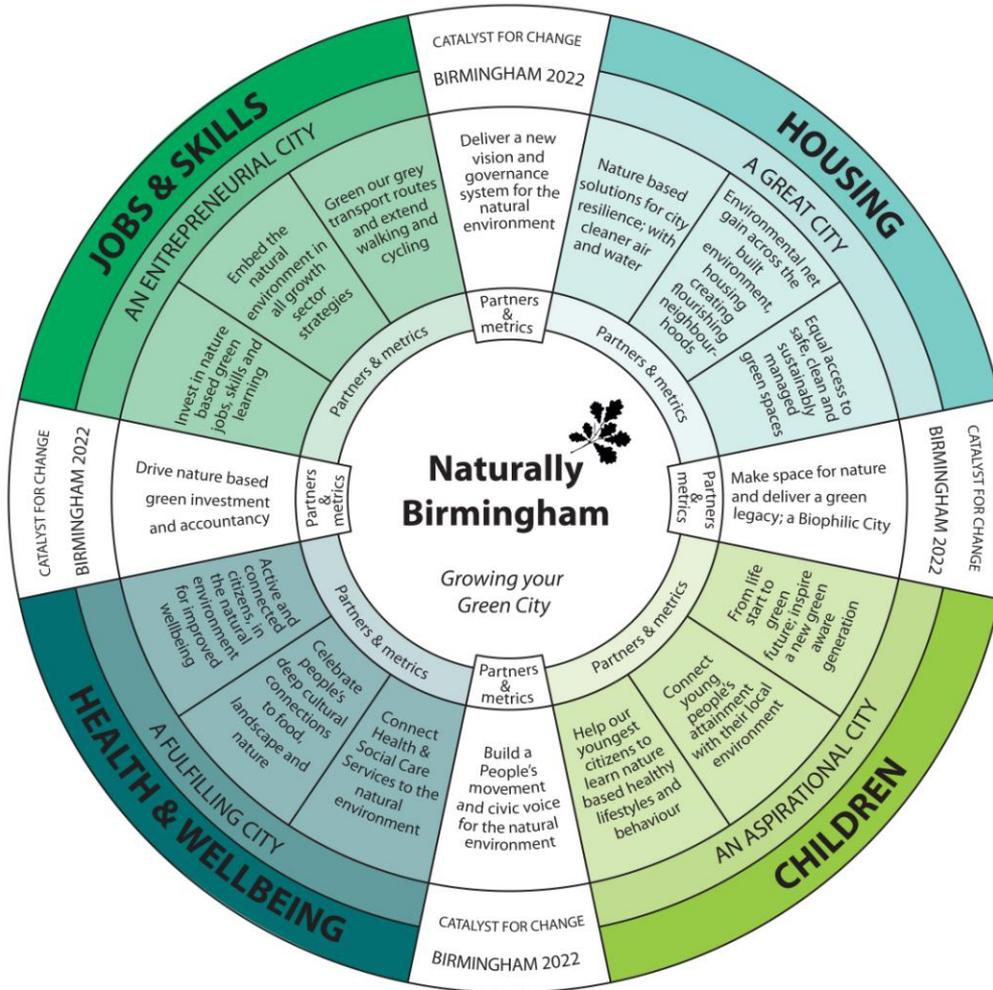
**Future Parks aims to transform the relationship
between communities and parks at scale**

Transformation – maintenance to value creation

The Opportunity (Systems & Spatial Change)

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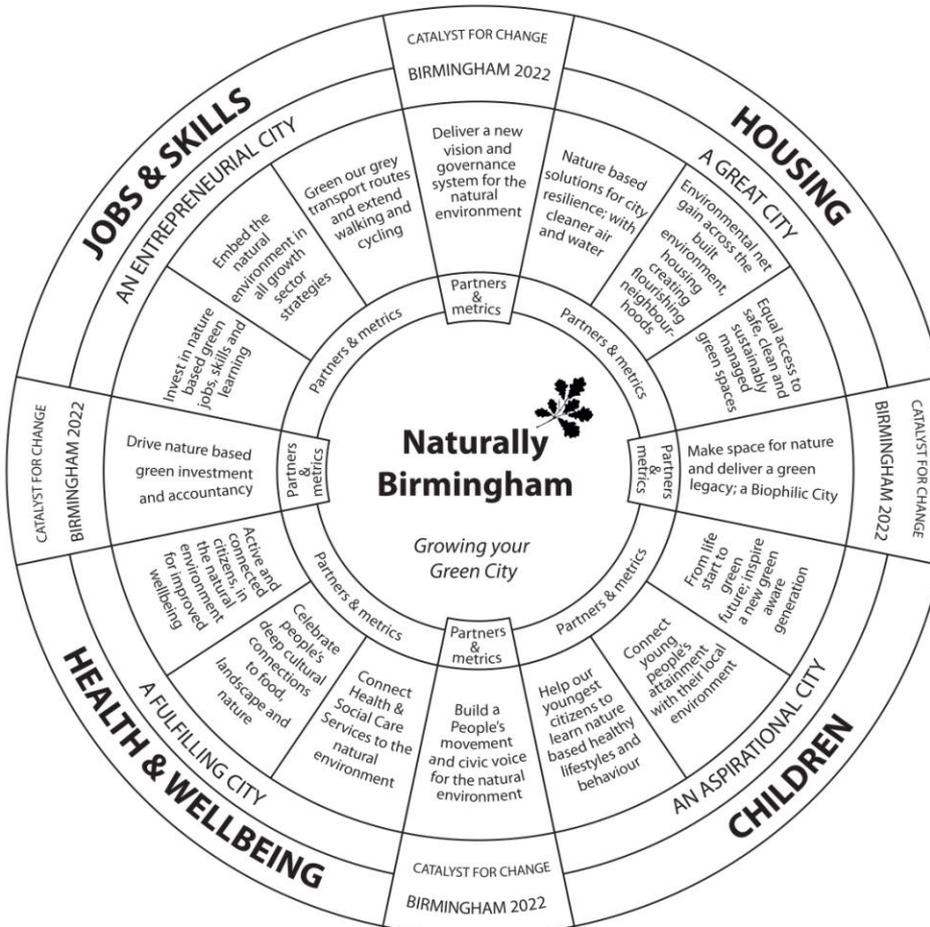
The Opportunity (Cross-check)

The 5 Capitals
Financial
Manufactured
Social
Human
and
Natural

Framework
For the
25 Year
Environment
Plan

- Parks Inquiry

3 questions



Research Findings:

- Municipal Finance
- Municipal Planning
- Municipal Governance

Delivery mechanism for a Biophilic City & Natural Capital Investment Trust

A Systems Change for Parks

Biophilic Cities - Cities that achieve a deep affinity with nature



A Systems Change for Parks

Questions & Answers?

Nick Grayson, Climate Change & Sustainability Manager,
nick_grayson@birmingham.gov.uk

<http://www.birmingham.gov.uk/greencommission>

<http://www.birmingham.gov.uk/greenlivingspaces>

<http://www.birmingham.gov.uk/plan2031>

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<http://www.wbcsd.org/home.aspx>

<http://uknea.unep-wcmc.org/>

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<http://www.bmj.com/content/348/bmj.g2407>

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<http://www.theguardian.com/cities/2014/apr/03/birmingham-san-francisco-oslo-global-green-biophilic-cities-club>

<https://www.naturalcapitalcommittee.org/>

<http://www.westmidlandscombinedauthority.org.uk/>

<http://www.overshootday.org/>

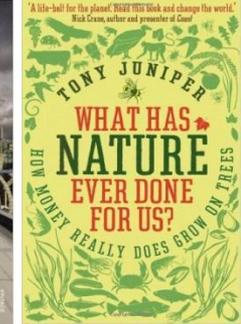
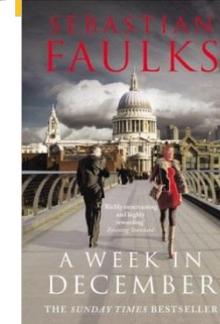
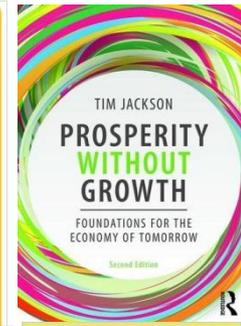
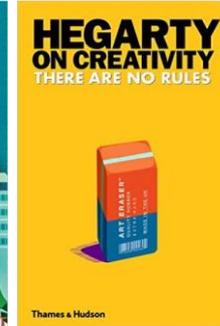
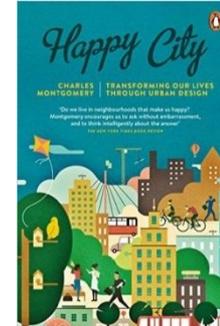
http://www.mckinsey.com/insights/urbanization/urban_world

<http://liveablecities.org.uk/>

<http://biophiliccities.org/>

<http://www.farrellreview.co.uk/>

<http://www.un.org/apps/news/story.asp?NewsID=48773#.VrnAcVLctjo>



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Birmingham
City Council