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Heathrow

# Heathrow Expansion

Enabling successful delivery through  
Project 13 and other initiatives

# Heathrow expansion: the story so far





# Heathrow expansion: the benefits

**10,000**  
total apprenticeships by  
2030



Up to  
**40**  
new long haul trading  
routes



**2x**  
current  
cargo  
capacity for  
British  
exporters

**4**  
Logistics  
Hubs across  
the UK



NPS enables at least  
**260,000**  
additional ATMs per annum



Up to **40,000**  
new local jobs

# Our five key stakeholder groups





# Heathrow's Preferred Masterplan





# Heathrow's Future





# Heathrow's Future





# Heathrow's Delivery Targets

**100% Safety**

**2% productivity  
improvement YoY**

**25% reduction in  
capital carbon**

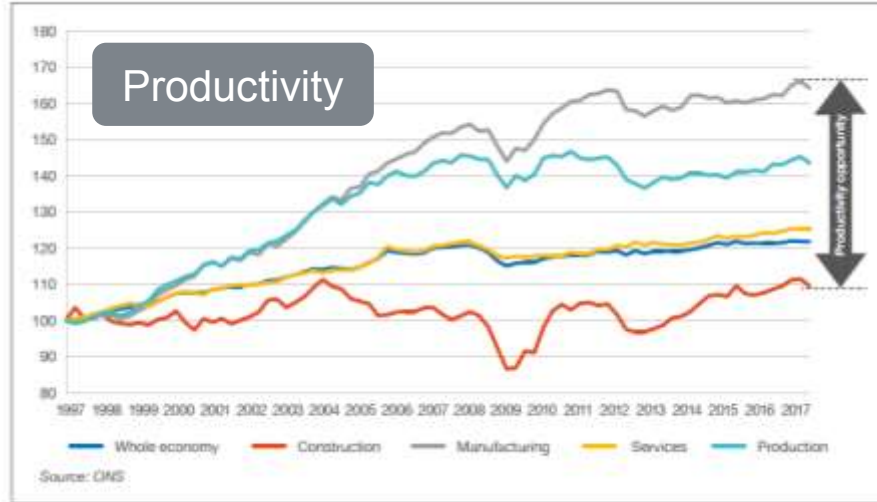
**Minimise impacts to  
local communities and  
Heathrow operations**





# Project 13: the drivers for change

Chart 1: Productivity Growth – Output per worker (1997=100)



Source: McKinsey&Company, "The construction productivity imperative" By S Changali, A Mohammad and M van Nieuwland, July 2015

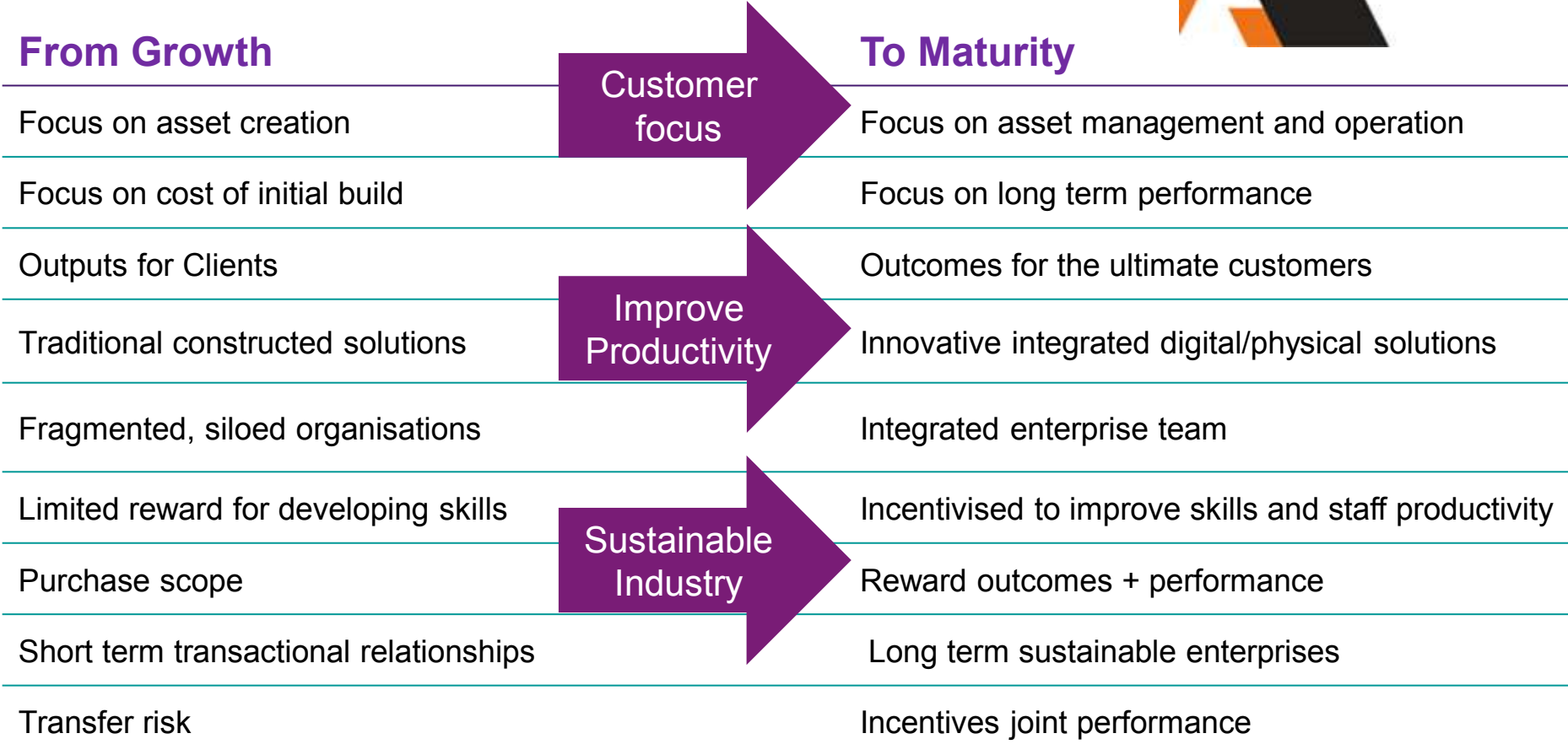


Source: Construction Leadership Council, "The Farmer Review – Modernise or Die" By M. Farmer 2016





# Project 13: a shift in our thinking





# Project 13: nothing new invented

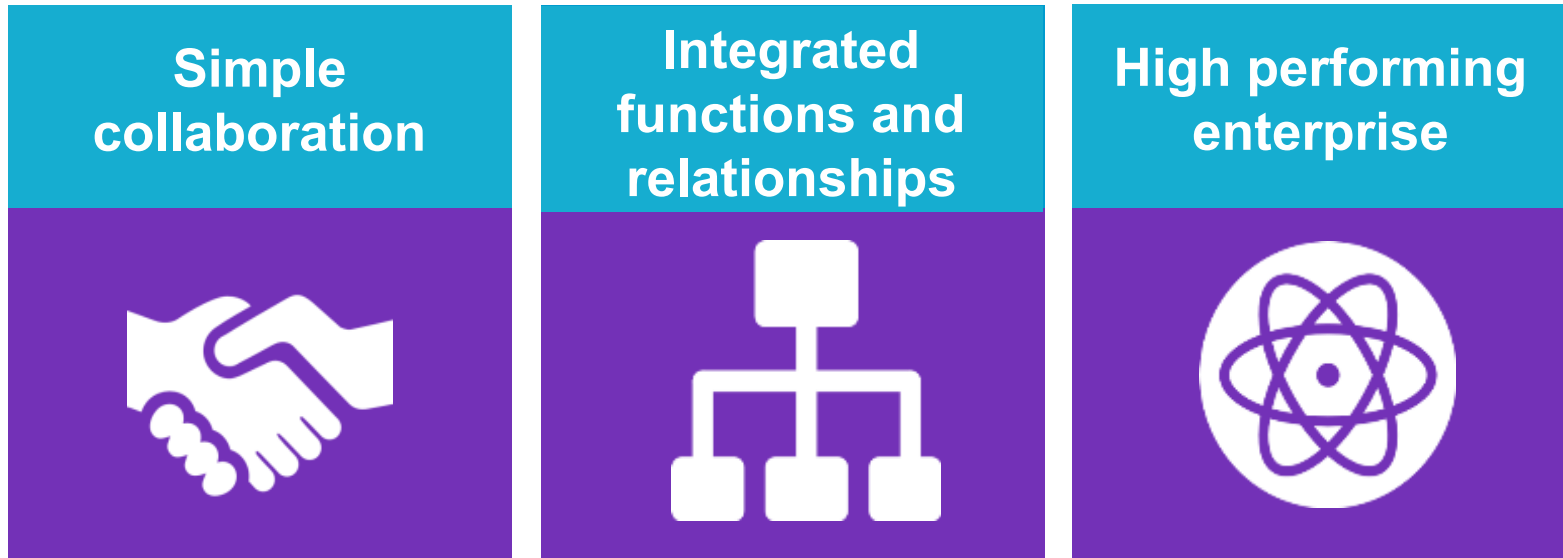
Governance  
Organisation  
Integration

Capable owner  
Digital transformation





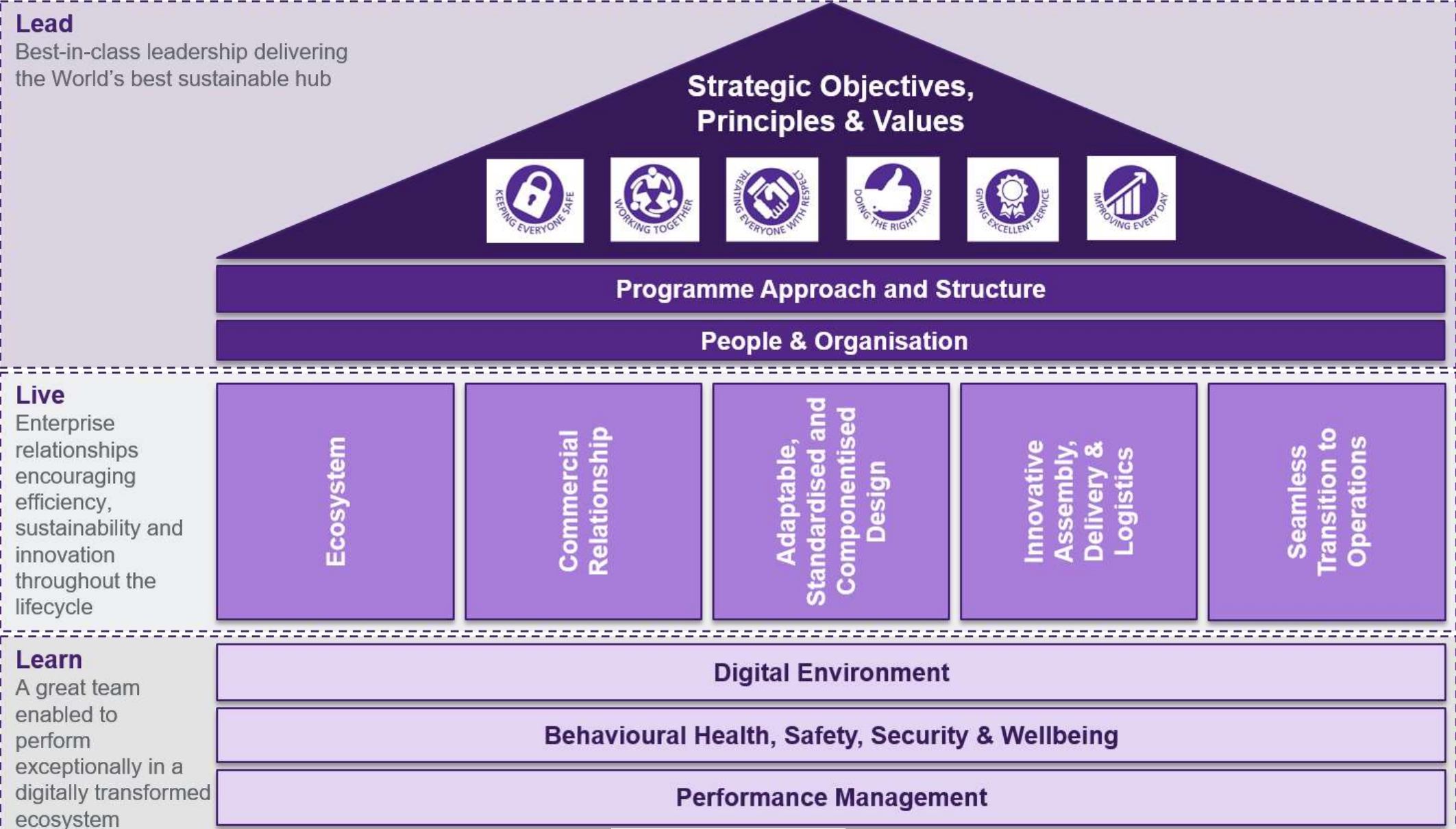
# Improving alignment, integration and agility



The scale and complexity of expansion demands a better integrated solution:

- Organisational design to encourage proactive, agile and collaborative behaviours
- Flexibility in the delivery ecosystem as the programme evolves
- Enable horizontal rather than vertical communication

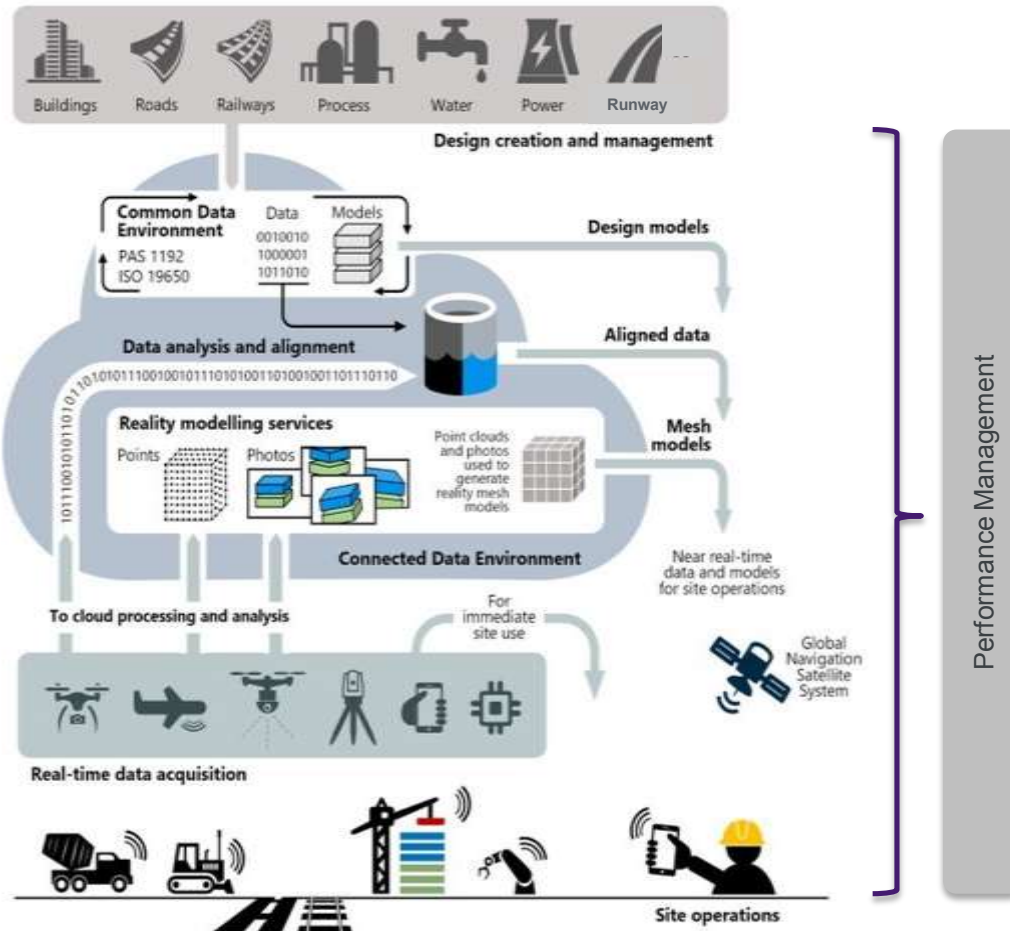
# Heathrow's Delivery Model





# Enabling Digital Transformation

We are at the start of a 5 year journey of digital transformation which will create an operational Digital Twin of our airport and deliver world-class programme controls.

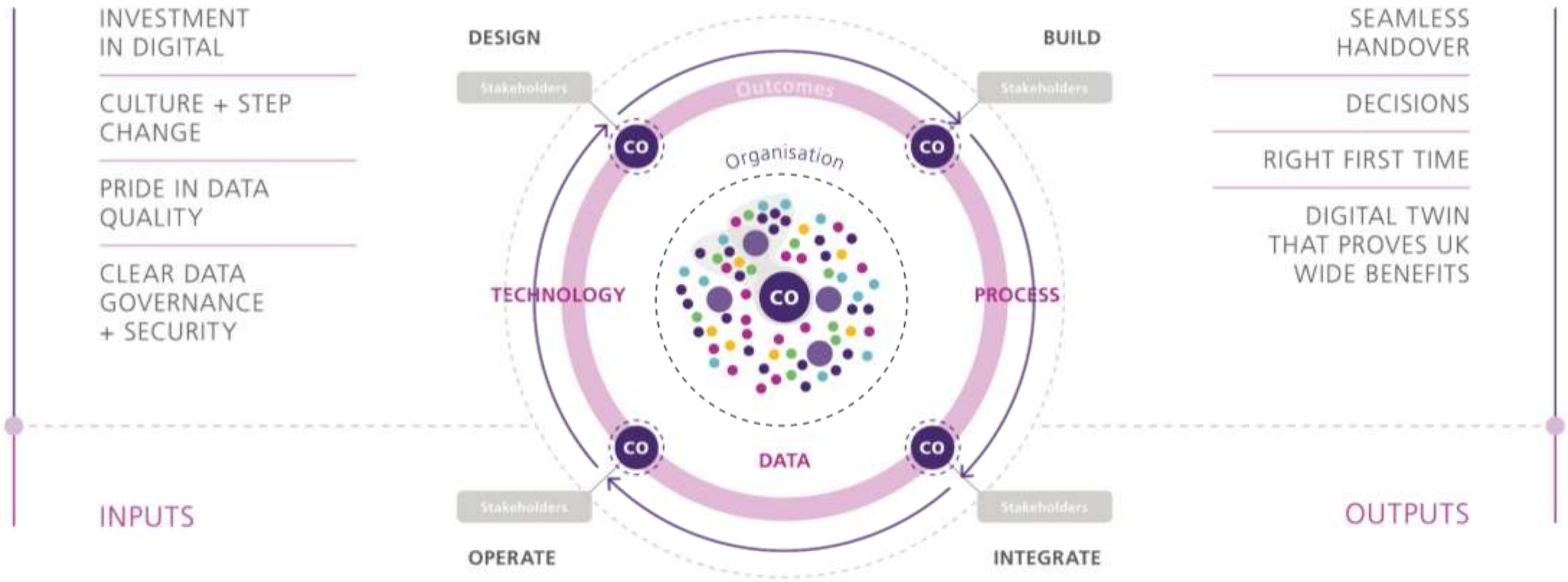


Our goal is simple:

To be the first airport operator in the world who can leverage value from our digital assets, allowing our people to work in a safe environment, design and plan in a collaborative environment and operate a fully integrated asset system.

*“Digital transformation offers vast opportunities to improve infrastructure performance, not just in the delivery of new assets, but also in their operation and integration with existing infrastructure”, Project 13.*

# Digital Guiding Principles

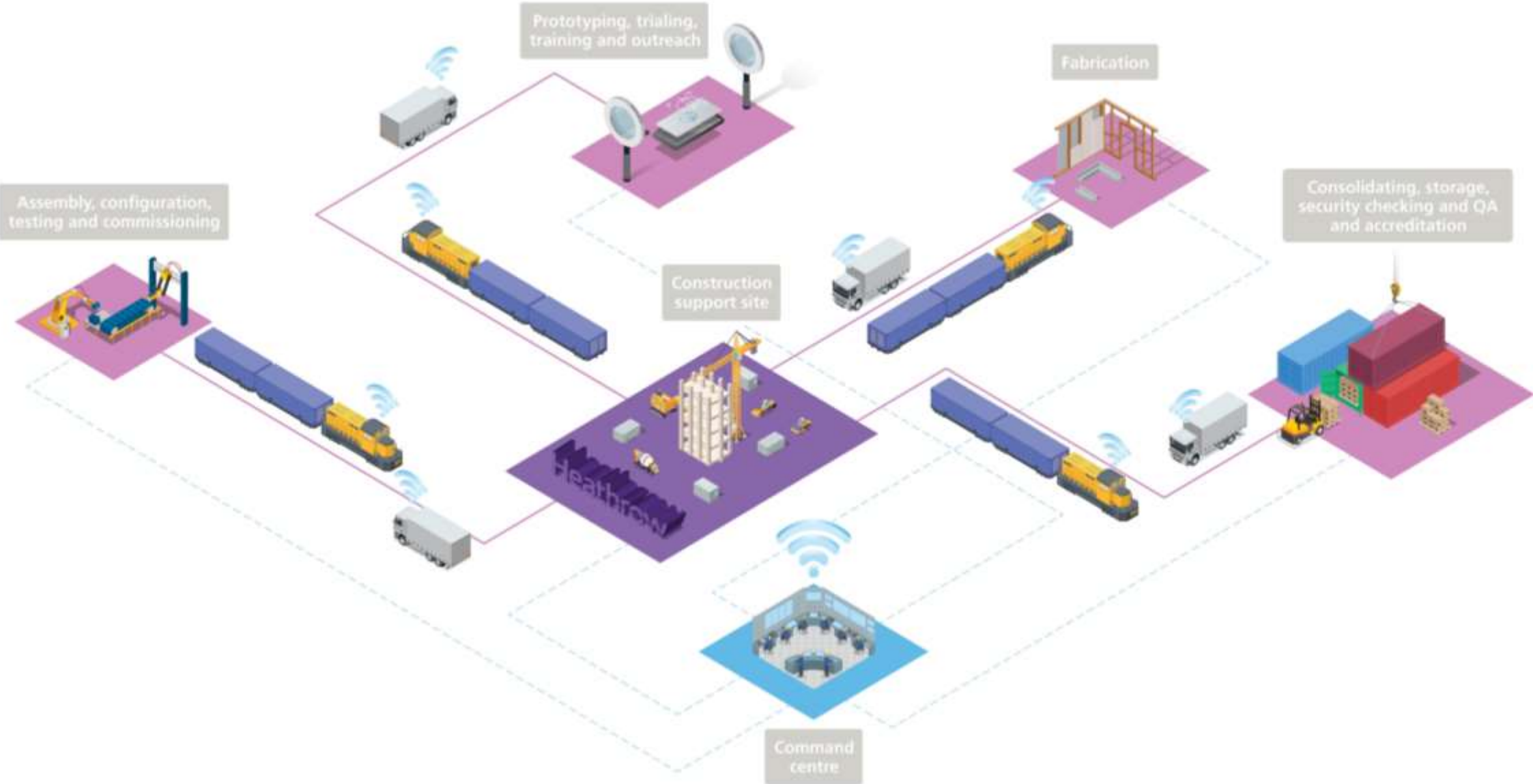




# Centralised Control Centre



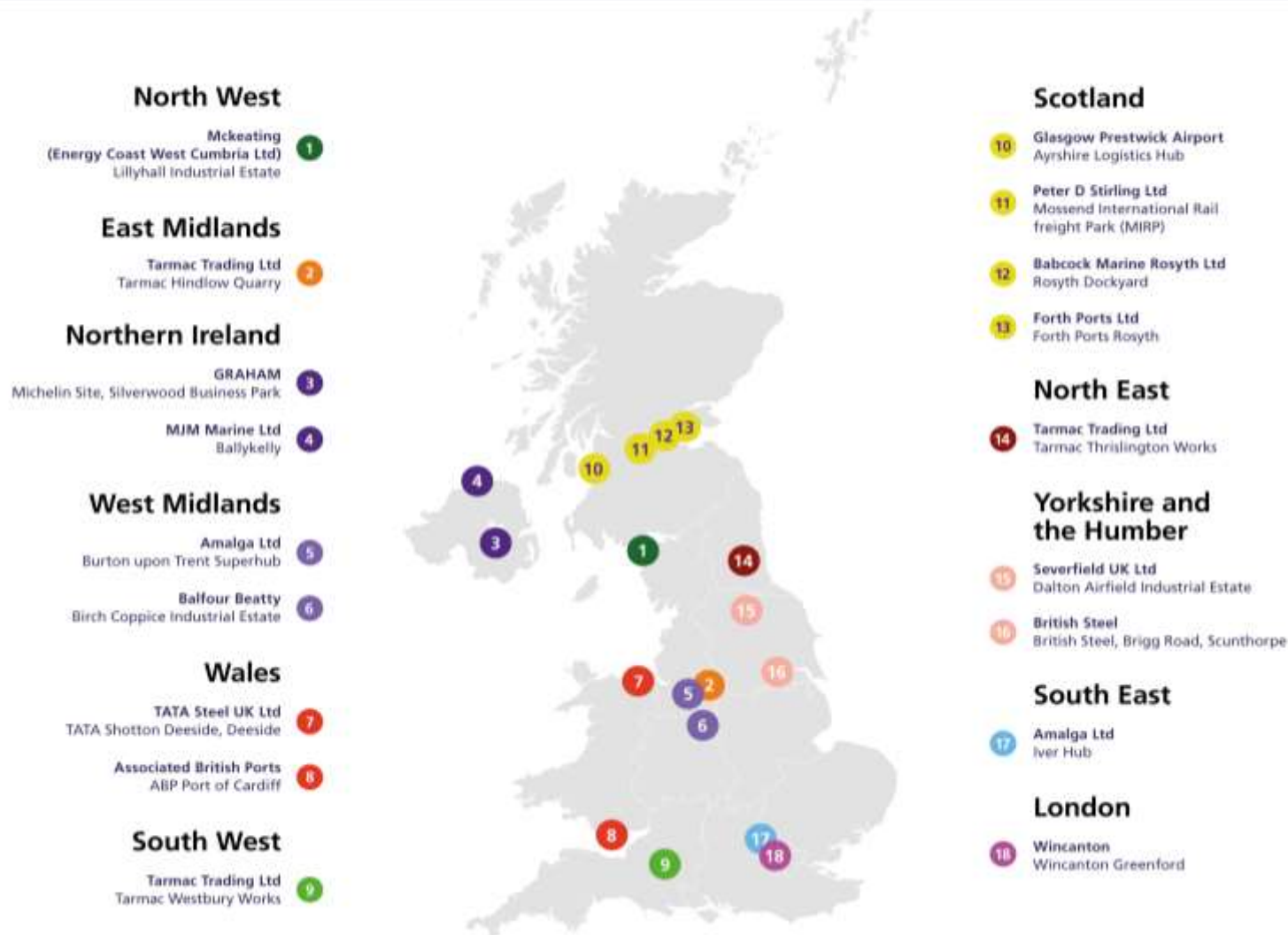
# Logistics Hubs





# Logistics Hubs

## Shortlist of potential locations across the UK



### North West

Mckeating  
(Energy Coast West Cumbria Ltd)  
Lillyhall Industrial Estate **1**

### East Midlands

Tarmac Trading Ltd  
Tarmac Hindlow Quarry **2**

### Northern Ireland

GRAHAM  
Michelin Site, Silverwood Business Park **3**

MJM Marine Ltd  
Ballykelly **4**

### West Midlands

Amalga Ltd  
Burton upon Trent Superhub **5**

Balfour Beatty  
Birch Coppice Industrial Estate **6**

### Wales

TATA Steel UK Ltd  
TATA Shotton Deeside, Deeside **7**

Associated British Ports  
ABP Port of Cardiff **8**

### South West

Tarmac Trading Ltd  
Tarmac Westbury Works **9**

### Scotland

**10** Glasgow Prestwick Airport  
Ayrshire Logistics Hub

**11** Peter D Stirling Ltd  
Mossend International Rail  
freight Park (MIRP)

**12** Babcock Marine Rosyth Ltd  
Rosyth Dockyard

**13** Forth Ports Ltd  
Forth Ports Rosyth

### North East

**14** Tarmac Trading Ltd  
Tarmac Thrislington Works

### Yorkshire and the Humber

**15** Severfield UK Ltd  
Dalton Airfield Industrial Estate

**16** British Steel  
British Steel, Brigg Road, Scunthorpe

### South East

**17** Amalga Ltd  
Iver Hub

### London

**18** Wincanton  
Wincanton Greenford

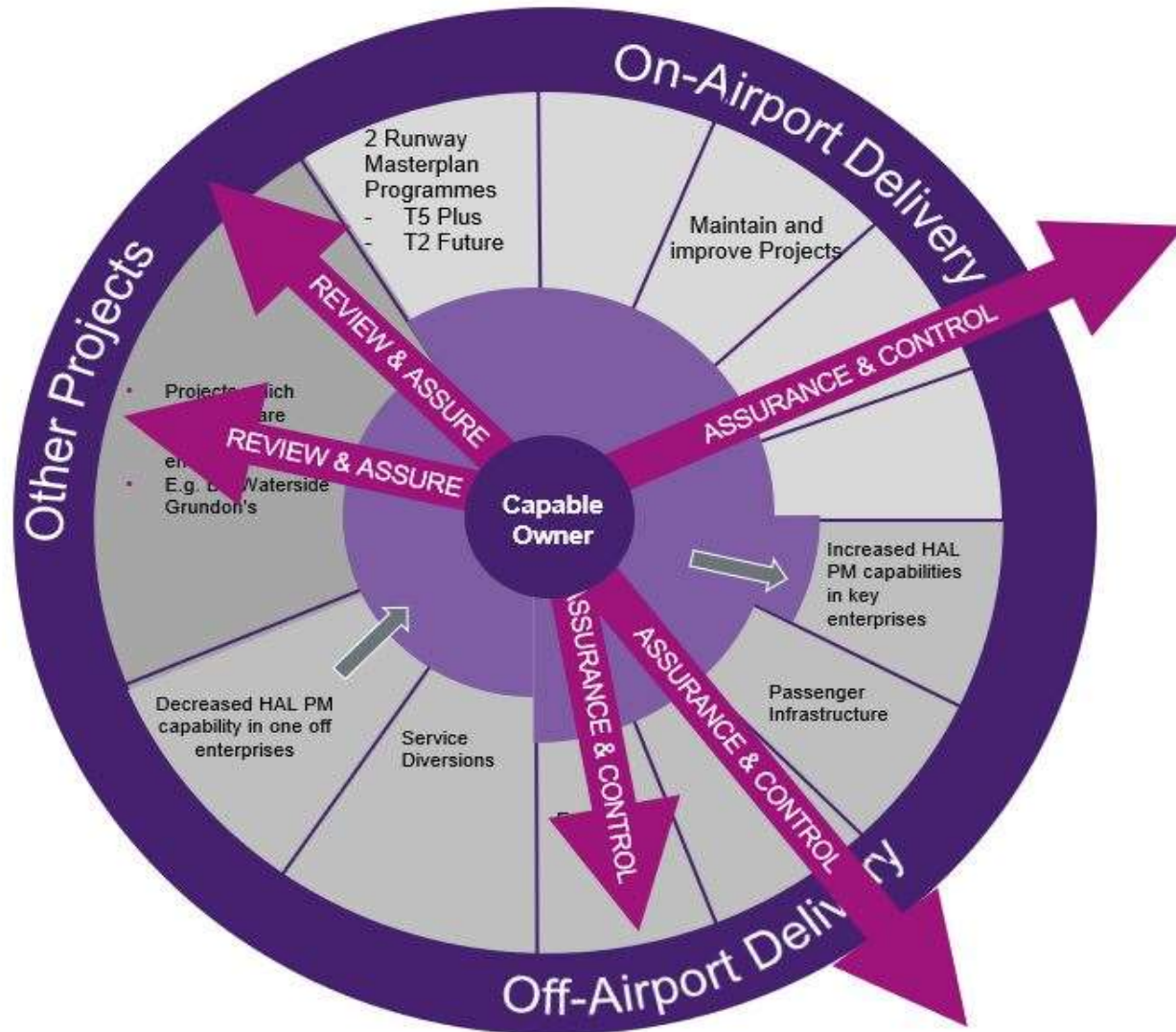
Heathrow has now visited all **18 shortlisted sites** bidding to host one of four offsite construction hubs.

These sites are key to kickstarting the **nationwide benefits** that Heathrow expansion will bring – creating jobs and economic opportunities.

The **final four sites** will be announced in early 2020, with construction set to begin in 2021.

# Heathrow's Organisational Design

Using P13 principles as a broad framework



Heathrow are applying the principles where they add value to the programme

Heathrow will go deep into the supply chain where it already has capability in delivering specific assets

Organisational structure and the level to which the client is involved influenced by:

- Customer experience
- A need to focus on asset outcomes (Systems thinking)



# Underpinned by our commercial approach

We are endorsing an **enterprise approach** for Expansion

## Expansion Challenges

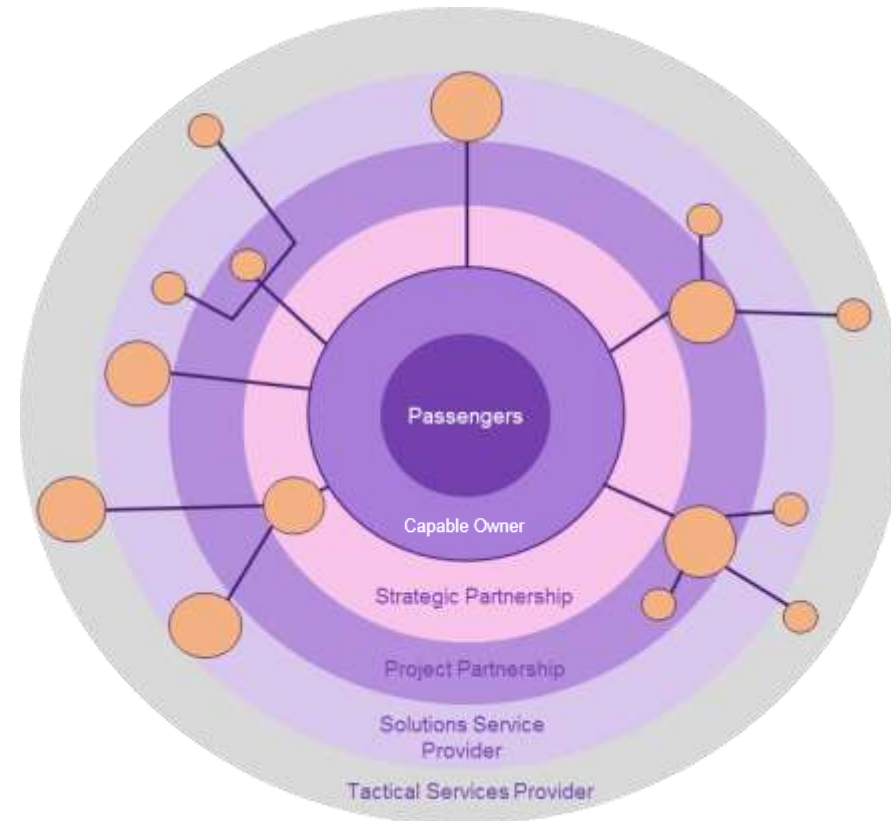
How do we extract the most value from our hubs strategy?

How do we manage the programme complexities of major civils packages?

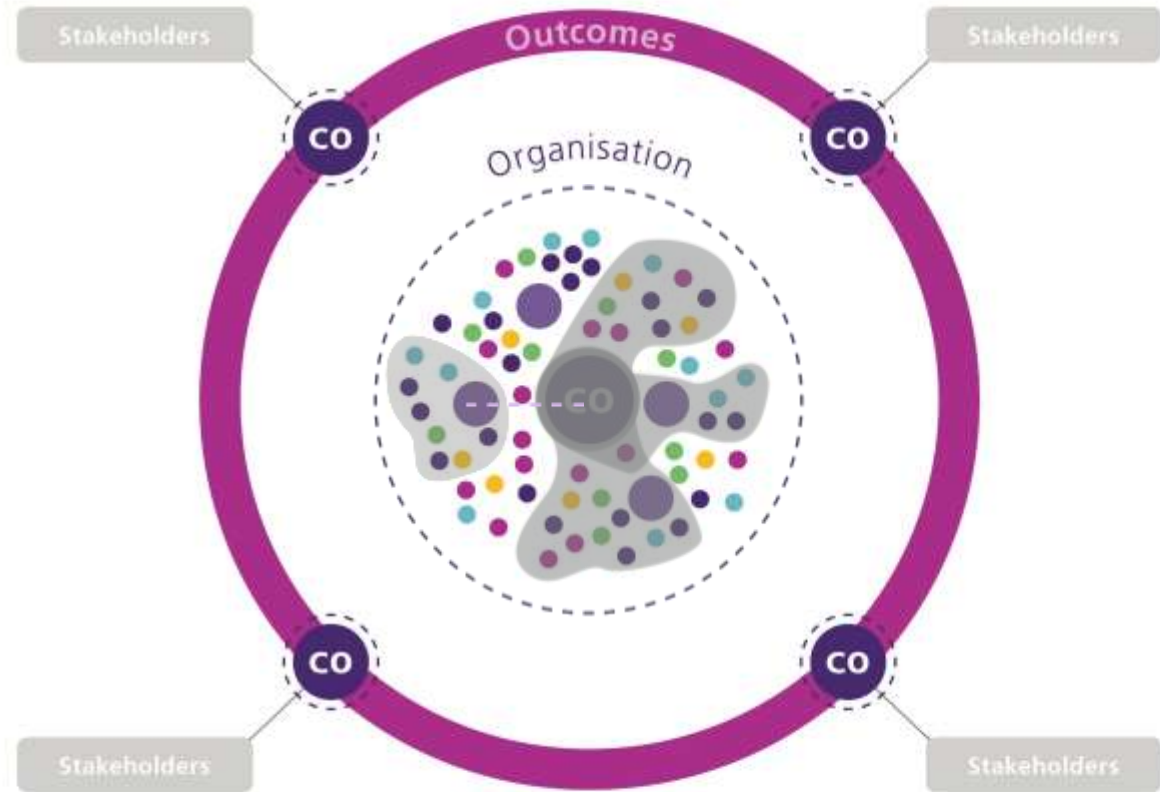
How do we continue to improve the efficient delivery of Heathrow's infrastructure?

How do we manage the programme activities on our constrained sites?

## Setting up for success

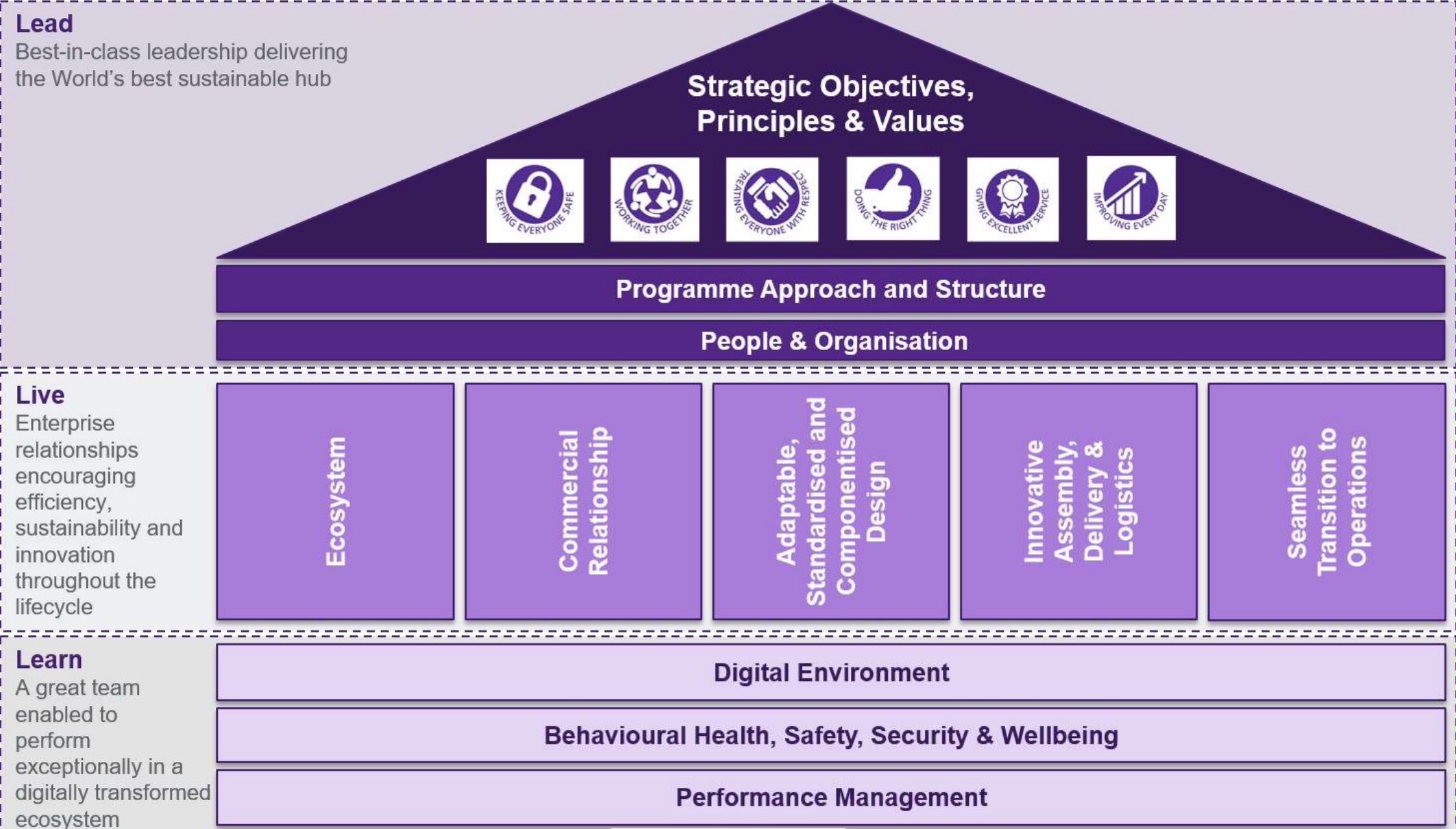


# Enterprises





# Heathrow's Delivery Model





An aerial photograph of Heathrow Airport at sunset. The sun is low on the horizon, casting a golden glow over the entire scene. The airport's infrastructure, including runways, taxiways, and a large terminal building, is clearly visible. The surrounding landscape is a mix of green fields and urban development. The text 'Heathrow' is prominently displayed in the center, with 'Building for the future' written below it.

# Heathrow

Building for the future