

# **National Brownfield Institute**

**Bringing Brownfield Back Into Economic Use** 

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## **The next 20 minutes**

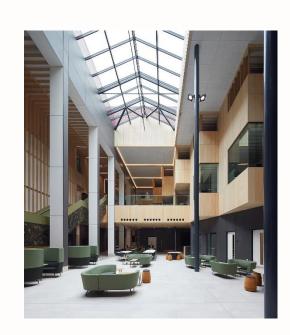
- Springfield Overview
- National Brownfield Institute and Brownfield Sites
- What does that mean for businesses?
- National Brownfield Institute's opportunities
- Equipment/Services
- Strategic Approach
- Summary
- Q&As



#### **Springfield Campus**

- School of Architecture and Built Environment
- National Brownfield Institute
- Thomas Telford UTC
- Elite Centre for Manufacturing Skills











#### **National Brownfield Institute**

"Create a world-class brownfield regeneration industry cluster through multi-sector partnership, based at the University of Wolverhampton's Springfield site."









## Why develop brownfield sites?

- $\checkmark$  Reduces the use of green field sites
- ✓ Eliminating blighted landscapes to encourage redevelopment
- ✓ Brings social and economic benefits
  - Employment land
  - Housing
    - Targets
    - Sustainable urban development/Increase green spaces
  - Incentives
    - Brownfield Land Release Fund 2





#### What is the challenge?







## **Controlling Unknowns**

#### Information

- What happened in the past
- Not available early enough
- Not comprehensive, accurate or update
- If available its not in one place or easily accessible

#### • Cost

- Lack of knowledge & certainty
- Site investigation
- Remediation



#### **Brownfield Database**

Database of Black Country brownfield sites that allowed sites to be identified and ranked against a set of criteria.

The previous use or industrial history of a site also allows an assessment of the presences of potential contamination to be made, the risks and the potential cost of remediation depending upon proposed land use



To give an approximate cost

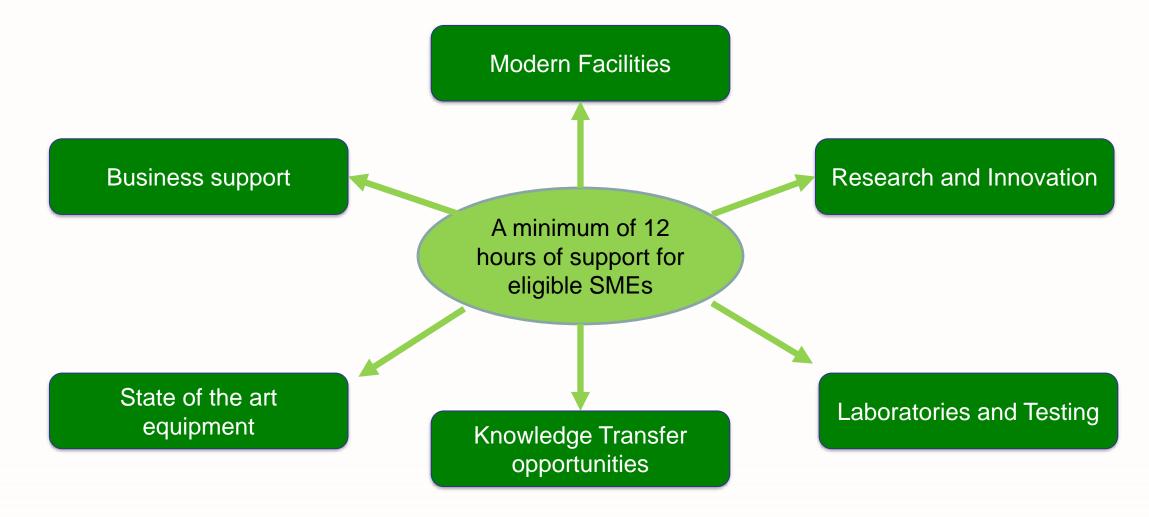
More proactively identify sites using algorithms and programming, Google earth/Google maps







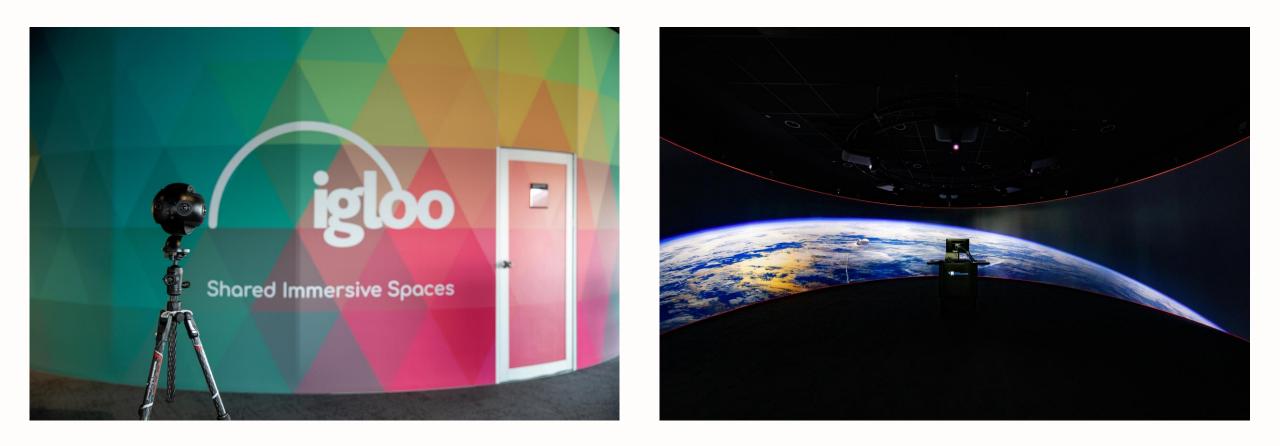
#### What does that mean for you?







#### Igloo – 360° Immersive space







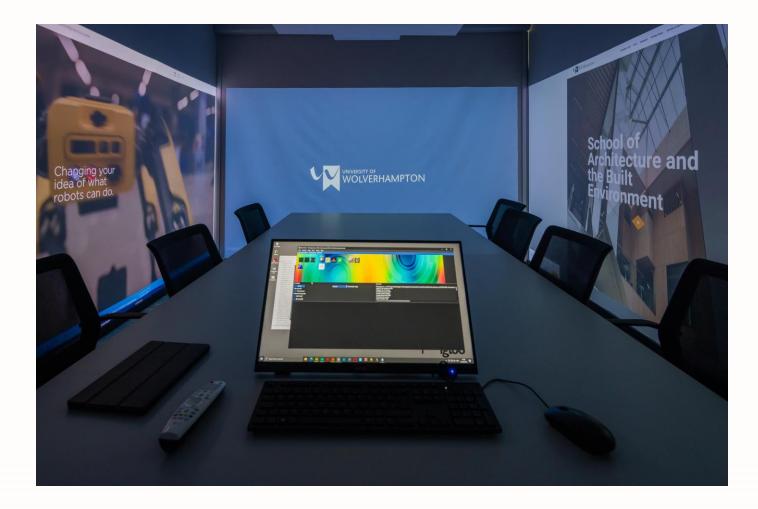
#### Igloo – 360° Immersive space







#### Igloo – Immersive room







## **Spot – Boston Dynamics**

- Automate routine tasks
- Capture data safely
- · Avoid obstacles as they appear
- Navigates terrain
- Carry payloads up to 14Kg







#### **Reality Capture – SLAM Technology**

Up to 10 times faster than a terrestrial laser scanner





Leica BLK2GO handheld laser scanner NavVis VLX mobile mapping system





#### Accurate point cloud data

Create Floorplans, BIM models and 3D visualisations







## **Strategic Approach**

- Wolverhampton City Council
- Homes England
- L&G Modular Homes
- Department for Levelling Up, Housing and Communities (DLUHC) Whitehall to Wolverhampton







#### Summary

- The only National Brownfield Institute in the UK
- Business Support free to SMEs at the point of delivery
- State of the art building Events, meeting rooms
- The latest equipment visualisation of projects, site investigations
- Knowledge Transfer Seminars, workshops, networking
- Research and Innovation New technologies, access to academics and industry leaders



#### National Brownfield Institute Fully funded support for business

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