



Stimulating Innovation and creating new markets through collaborative demonstrators

Dr Pam Waddell, Director of Birmingham Science City





Birmingham Science City Vision and strategy

Birmingham Science City will develop and use science and technology to improve the prosperity and quality of life of the city-region, the West Midlands and the UK.

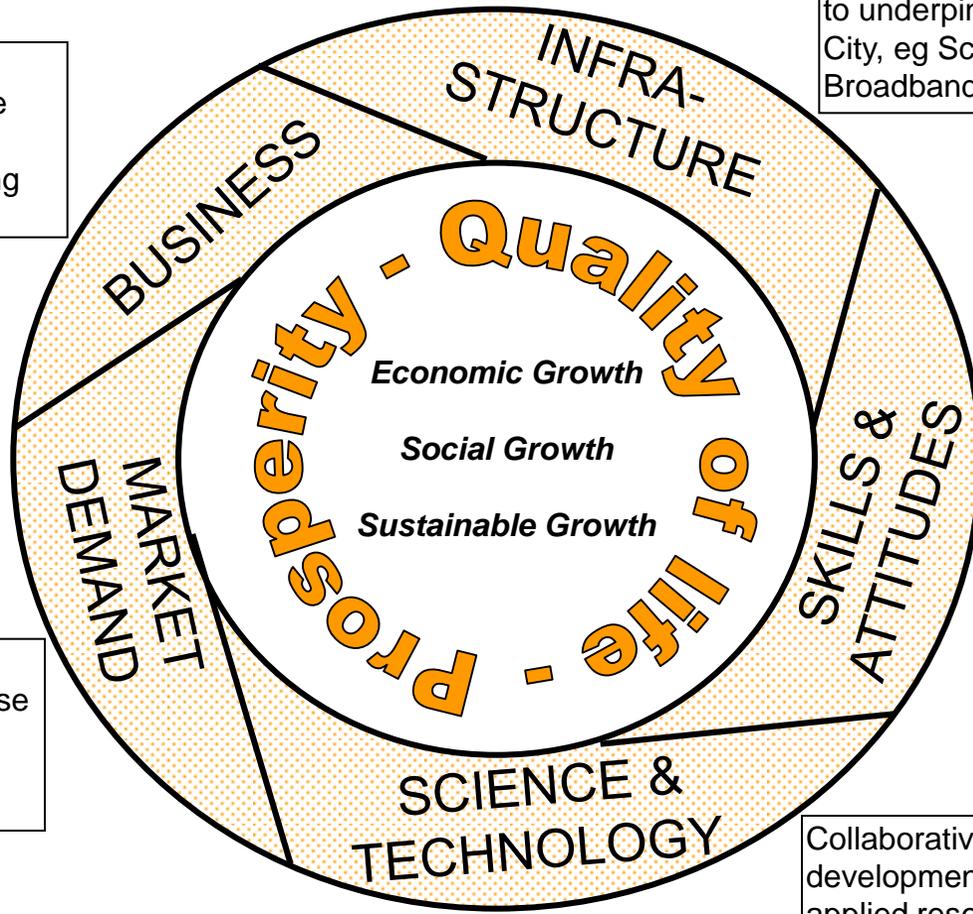
- draw on the strengths of the region's top-class research
- demonstrate, drive and improve prosperity and quality of life
- be guided by a long-term vision
- work with public, private and research partners from across the region
- work towards better engagement with science and technology
- raise the profile of our strengths and activities in S&T and innovation





Action areas

Effective application and commercialisation of Science and Technology in new & existing businesses, attracting Inward Investment



Physical and virtual infrastructure to underpin a successful Science City, eg Science Parks, Broadband and WiFi access

Development of the people / skills base and engagement with science and technology

Development of demonstrator projects to develop and showcase new technology-based market opportunities with private and public sector

Collaborative development of pure and applied research





Current areas of focus

Challenge areas:

- Innovative Healthcare
- Low Carbon
- Digital
- Security

Plus:

- Public Sector Procurement as a driver for Innovation





The demonstrator approach

- Public or private partner(s) with real challenge to address with potential S&T solution and willingness to take a longer-term, innovative approach
- Research organisation(s) with relevant strength and a willingness to translate research to application
- Birmingham Science City creates an environment and provides support to facilitate collaboration to bridge the gap between research and application (TRL levels 4-8)
- Success breeds success – BSC will build on its range of 11 pilot demonstrators; the £77m platform of research investment in Energy, Advanced Materials and Translational Medicine; a range of partner-led demonstrators

Case studies (1)

- **Virtual Hospital:** University Hospital Birmingham is working with Birmingham City University on digital technologies for easy orientation for staff, patients and visitors, providing a low risk environment for SMEs to develop new products and services for healthcare
- **Intelligent Low Carbon vehicles:** Universities of Birmingham and Coventry working with Microcab, Tempus Computers, BT and RDM Automotive on low carbon and IT technologies to reduce emissions, plan routes to avoid congestion and enhance the user-appeal of vehicles through integrating communications systems.





Case studies (2)

- **Centre for Ocular Allergy:** Aston and Worcester Universities characterising ocular allergies and their treatments and working with optometrists looking to develop their businesses into this growing area (by 2015, half the population of Europe will be affected by eye allergies)
- **Local Authority Procurement driving innovation:** Birmingham City Council are developing a demonstrator of forward-commitment procurement (solution rather than specification based) to support carbon reduction aims. This will allow a development phase, promoting innovation.





Example outcomes

- Creation of new businesses to exploit technologies, services, training
- New markets for existing businesses
- Development of skills in business
- Business to business joint ventures and collaborations
- Further collaboration between research base and business/ public sector
- Leverage of public and private R&D funding
- Visibility for region as a centre of innovation excellence attracting national and international collaboration and investment





What next?

- Birmingham Science City is committed to demonstrator approach, has the partnerships to make it work and is putting dedicated support in place
- Promotion of existing success via communication project
- Thematic working groups (Low Carbon, Digital, Innovative Healthcare, Security) reshaped to identify new opportunities that address real challenges and use West Midlands expertise, where funding is available
- Public sector Procurement Working Group to explore potential for solution based procurement to improve services and drive innovation
- Looking to work with businesses with challenges that might be tackled with this approach

CONTACT: pamwaddell@advantagewm.co.uk

