



2022: peak virtualisation?

Professor Paul Crane
Networks research director
14th December 2021

BT has unmatched depth and reach in network infrastructure

Unmatched scale

UK's largest fixed access and core network

Largest high bandwidth footprint

4G geographic coverage >85% UK

5G network rapidly expanding to 50% of population by 2023 and 90% of UK land mass by 2028

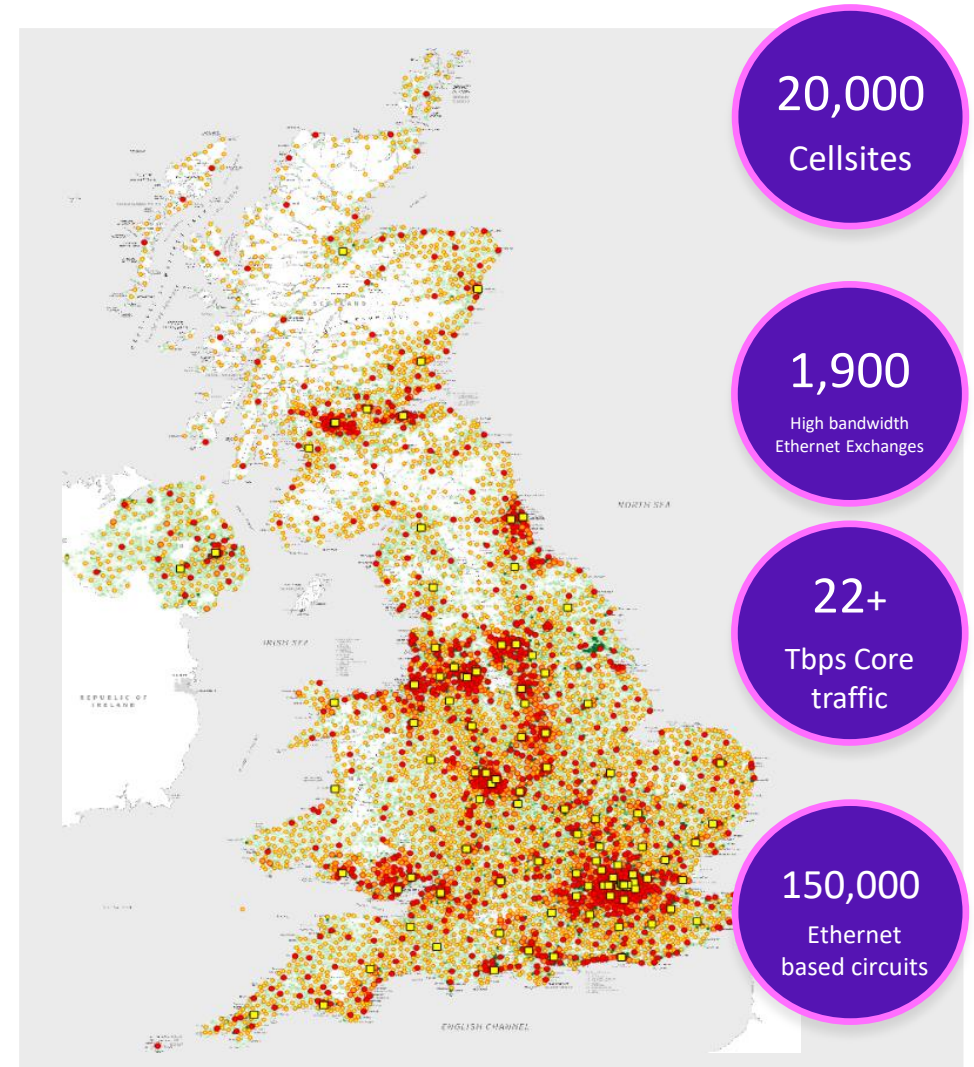
Reliable and secure

Core network performance

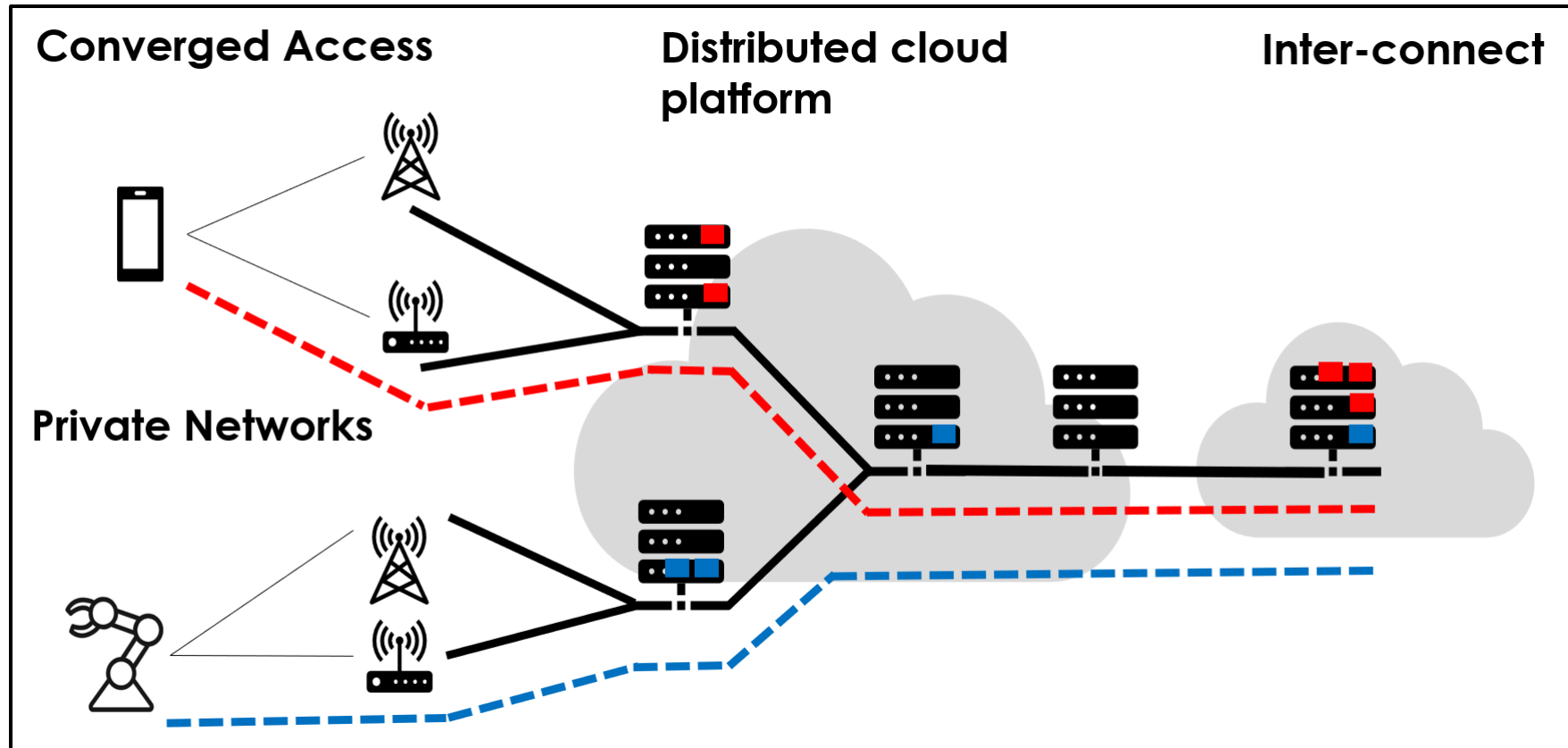
Highly Resilient architecture

Emergency Services Network investment

Power resilience and backhaul diversity for mobile

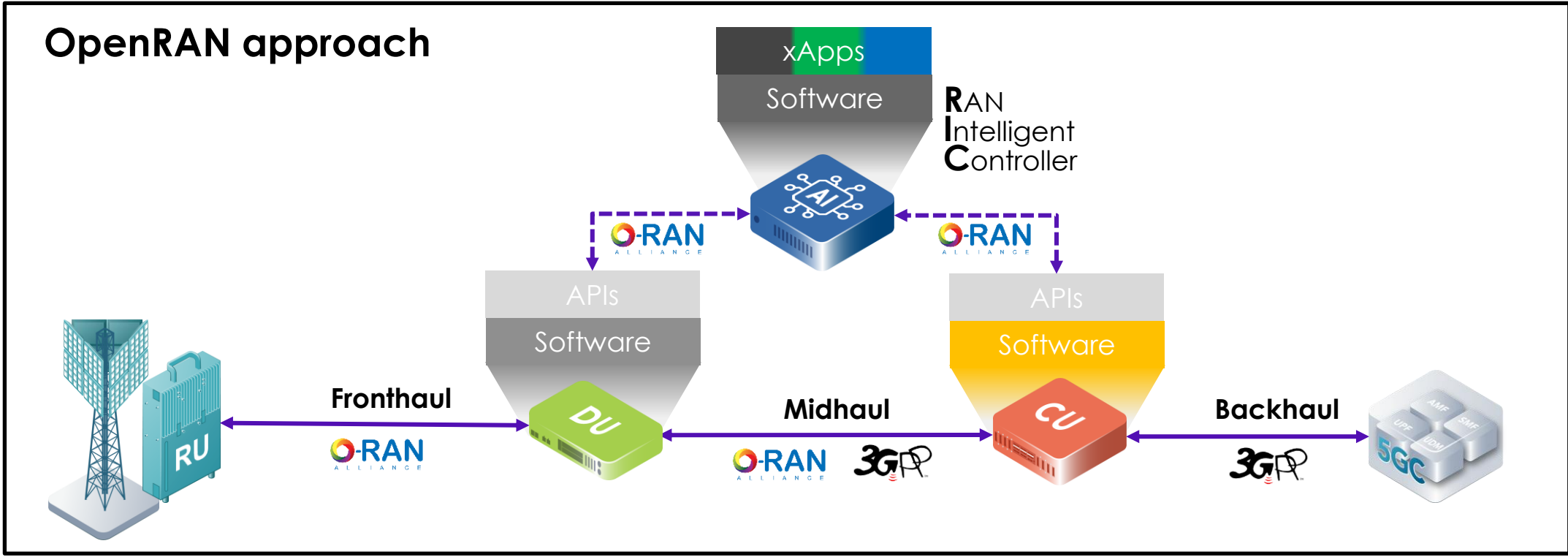
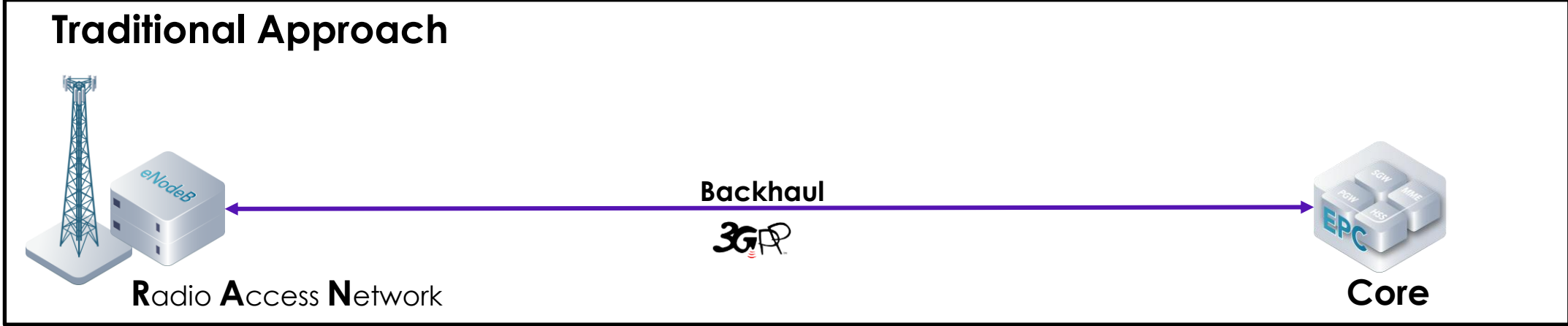


Virtualisation - What have we done?



Converged network: Virtualised, disaggregated, open architectures(?)

OpenRAN – Why the fuss?



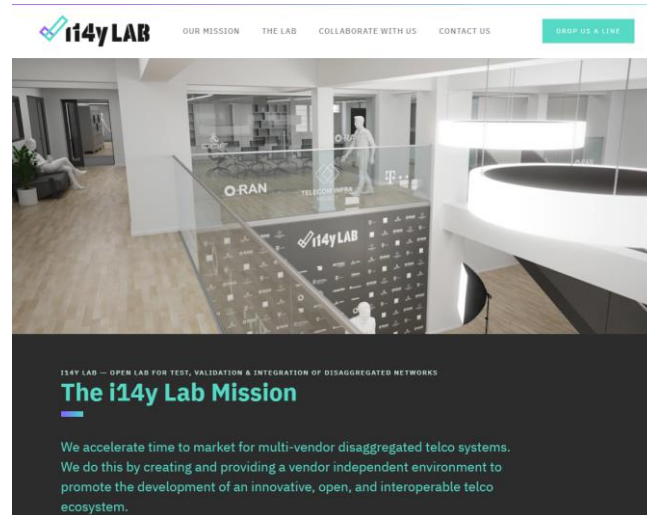
Why the interest from Governments?



“Open, intelligent, virtualized and fully interoperable RAN is essential if Europe is to meet its target of 5G for all by 2030,” the operators

stated. “It will help drive stronger, more resilient supply chains and platforms, as well as promote digital autonomy and continued technology leadership.”

However, the report also stated that Europe risks falling behind North America and Asia in the development and deployment of next-generation networks, if the region fails to have a collaborative approach in the Open RAN field



“Digital Secretary Nadine Dorries announced the ambition, alongside £50 million of telecoms research and development projects, ahead of her first visit to the United States where she will meet with US Secretary for Commerce Gina Raimondo.

The leaders will renew their commitment to diversifying the global telecoms supply chain

and discuss shared ambitions and co-operation on transatlantic data policy”

DCMS news publication 9/12/2021

What are we doing?



BT TIP Community Lab

Outdoor test bed

Exploiting open architecture




What do we need from the technical community?

A common cloud platform?




Security




Filling the skills gap

Reduced energy usage



Reliability



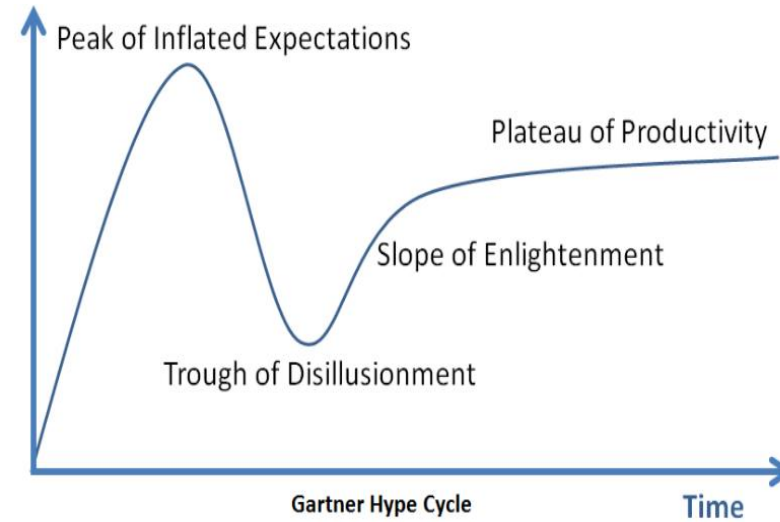
A vibrant equipment ecosystem; mature reliable systems

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Network cloud

Open RAN

Open BNG





Offices Worldwide

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