



Perfect RAN or perfect edge: the Open RAN dilemma facing operators



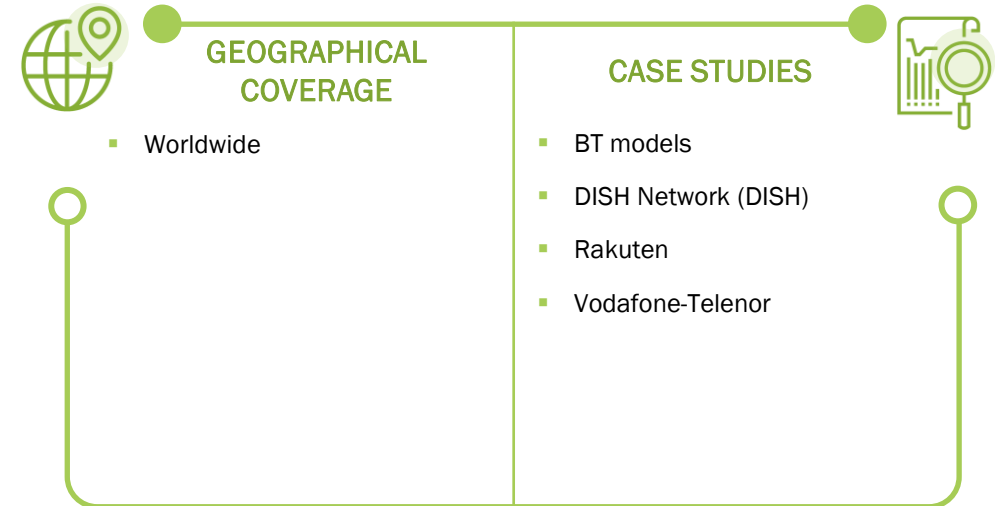
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About this report

This report examines the architectural choices that operators need to assess now if they are to deploy vRAN or Open RAN in the next 1–6 years. As operators' ambitions to expand their 5G revenue streams grow, so will the need for the hyper-distributed edge. However, this shift comes with trade-offs for the RAN. This report analyses the factors that will help operators to decide how to balance the ideal edge infrastructure against the best radio network. We align this with individual commercial models of different types of operators. We also offer recommendations to operators about their options and assess how they can future-proof their networks. We also explain how vendors can smooth the path and accelerate the market. The report is based on case studies and a survey of 75 operators, conducted in June 2022.¹

KEY QUESTIONS ANSWERED IN THIS REPORT

- What is the best balance between hyper-distributed edge cloud and high-performance radio for different 5G business models?
- What are the advantages of the very edge-centric architecture and what do early case studies teach us?
- What are the trade-offs that may have to be made in the RAN and how can they be mitigated?
- What technical and deployment advances are required to improve the balance for future deployments?



WHO SHOULD READ THIS REPORT

- Operators' technical strategists, architecture teams and CTOs
- Strategy and operator support functions within RAN vendors, cloud providers and systems integrators
- Policy makers that are considering Open RAN policy

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¹ Analysys Mason's survey of 75 mobile and converged operators worldwide (including Tier 1 and 2 and challenger operators) that are considering or planning vRAN or Open RAN, conducted in 2Q 2022.



Executive summary

Research overview

The business case for a hyper-distributed edge cloud





Implications of edge-centric vRAN for the 5G radio

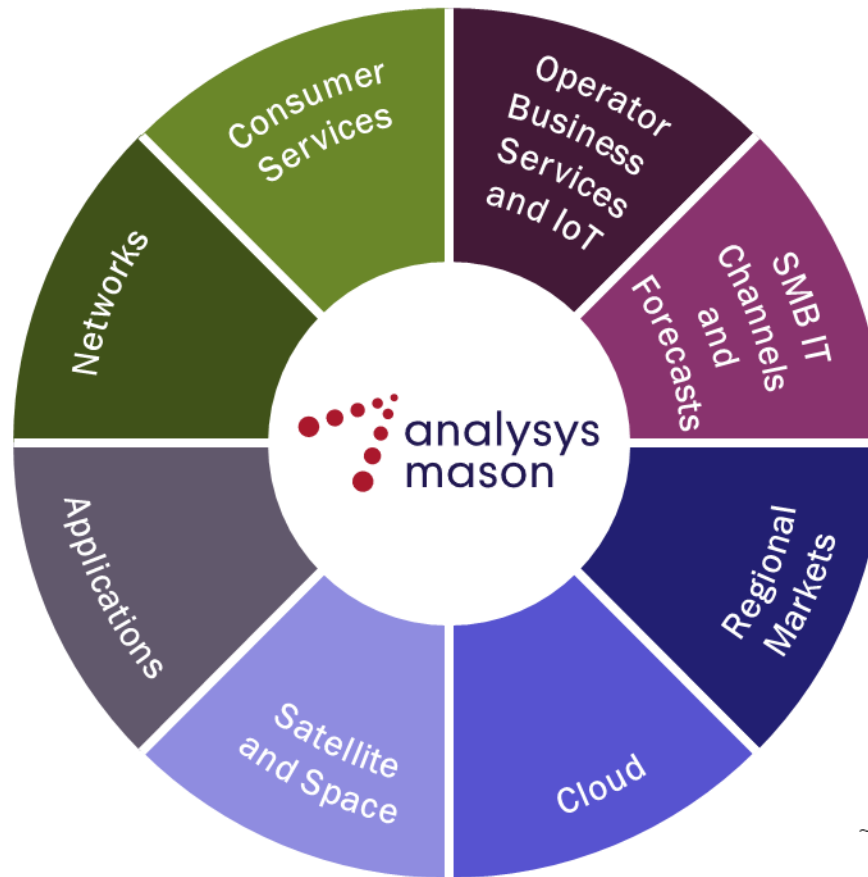
Operator choices and trade-offs





Appendix

About the authors and Analysys Mason

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PUBLISHED BY ANALYSYS MASON LIMITED IN **JANUARY 2023**

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