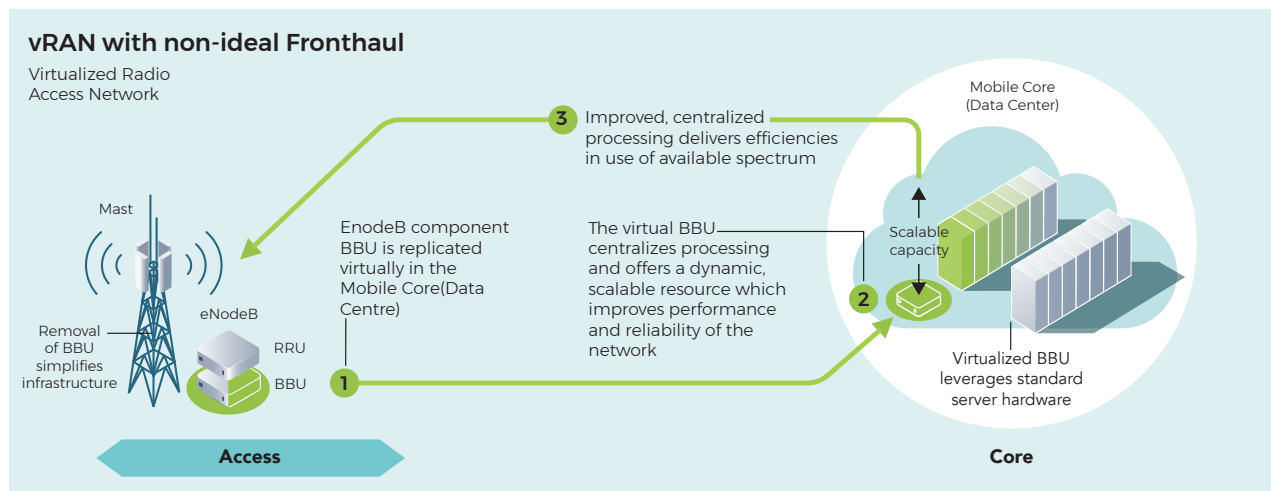
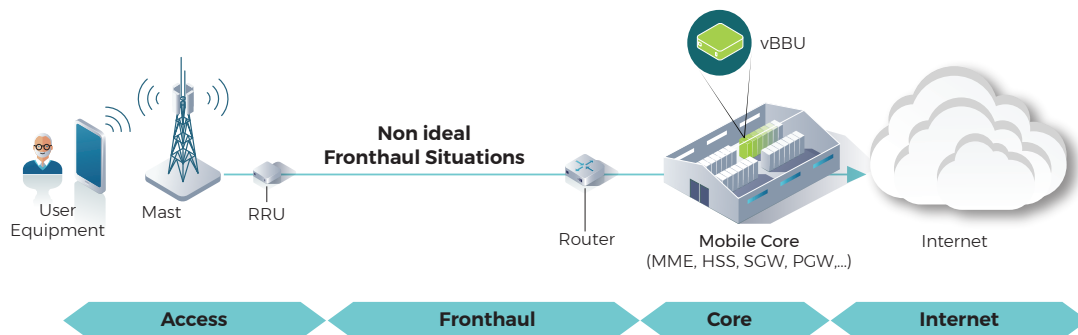


vRAN Fronthaul at a glance

vRAN Fronthaul is an initiative to define and build virtual RAN solutions based on non-ideal fronthaul technologies with no dependency on Common Public Radio Interface (CPRI) and costly fiber rollout.



Why vRAN Fronthaul

- **Need for better fronthaul options where fiber is not available or affordable:** CPRI (Common Public Radio Interface), the de-facto standard used for most 4G fronthaul, is overlaid and dependent on dark fiber.
- **Current install base not ready for 5G:** CPRI offers mainly point-to-point transport and requires precise time synchronization, a configuration that can't support nondeterministic packetized networks, or the centralized and virtualized RAN architectures that will be the basis of 5G.

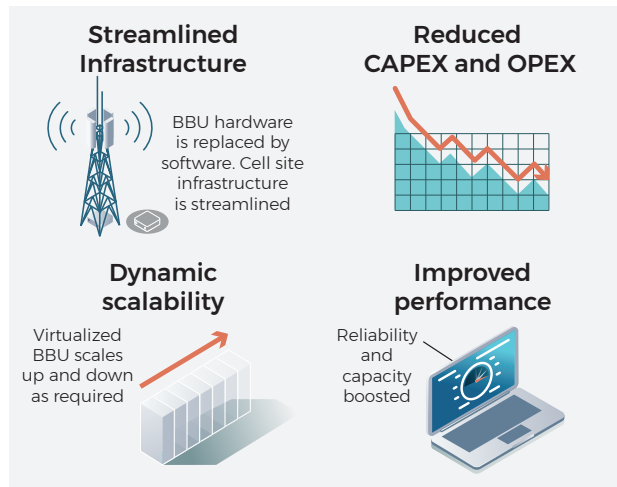
Until now

- **CPRI is considered a de-facto standard** for connecting the remote radio units (RRUs) and baseband units (BBUs).
- **Fiber becomes the bottleneck for scaled vRAN deployments.**

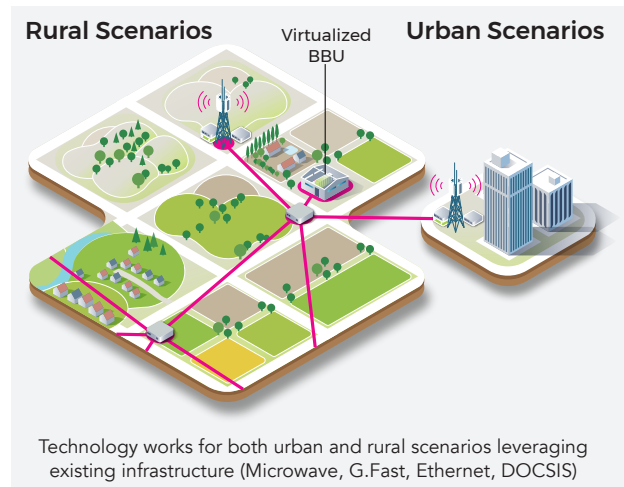
With vRAN Fronthaul

- The network can perform over non-ideal transport, allowing an operator to utilize its existing infrastructure with vRAN solutions across a broader range of use cases.

The developments



Use cases



With vRAN Fronthaul, continued

- A wide range of vendors can provide innovative, best of breed RRUs and vBBUs compatible with non CPRI based fronthaul options for a diverse set of deployment scenarios.
- The vRANs can be managed and dynamically reconfigured using a virtualized infrastructure with standardized data models.

Benefits

- **Can run different non-ideal fronthaul options** ranging from ethernet, microwave, G.Fast to DOCSIS
- **Can use pluggable modules from other vendors**
- **More cost-effective** than traditional solutions

What next

- **Learn more about Telecom Infra Project** telecominfraproject.com
- **Join the vRAN Fronthaul Project Group** vran.telecominfraproject.com/ to learn and contribute
- **Contact us** with questions or comments: vRANFH-info@telecominfraproject.com