

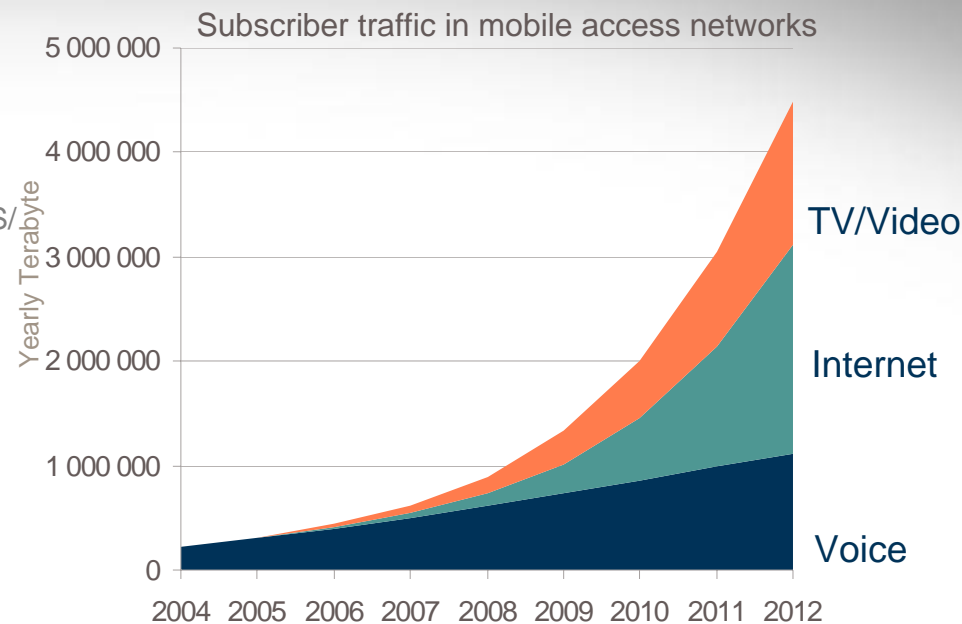
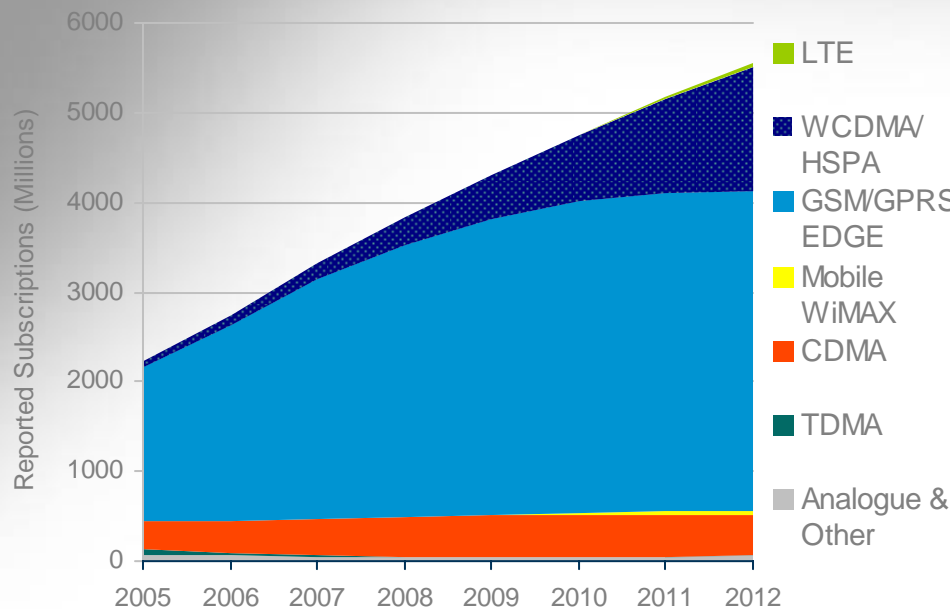


“La pianificazione delle frequenze televisive”

Mercoledì 23 aprile 2008

Mobile subscriptions & usage

- exceptional growth, twofold subscriptions and tenfold traffic



- International roaming GSM/WCDMA/HSPA, Now also Japan, Korea, etc.
- GSM passed 2.7 billion subs/718 nets.
- 197 WCDMA networks/87 countries of which 166 HSPA networks launched. User throughput 800 kbps to 7Mbps now, increasing
- More than 403 HSPA devices
- 1026 million subs GSM/WCDMA/HSPA

- Connected laptops/Enterprise
- Messaging/Communities
- Internet adapted for mobiles
- Music/Mobile TV
- Flat rate experience

Source: Internal Ericsson

3GPP LTE Performance Targets

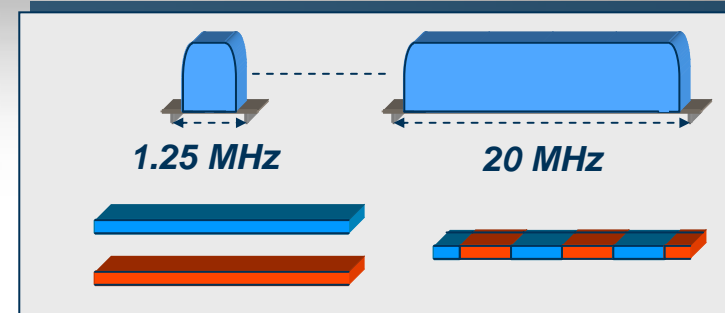
- **High data rates**
 - Downlink: >100 Mbps
 - Uplink: >50 Mbps
 - Cell-edge data rates
2-3 x HSPA Rel. 6
- **Low delay/latency**
 - User plane RTT: <10 ms
 - Channel set-up: <100 ms
- **High spectral efficiency**
 - Targeting 3 X HSPA Rel. 6
- **High Performance Broadcast services**
- **Cost-effective migration**



3G LTE – *Key radio-access features*

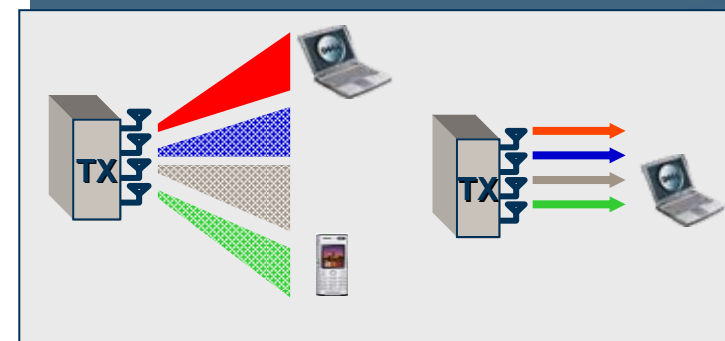
- **Spectrum flexibility**

- *Flexible bandwidth*
- *Duplex flexibility*



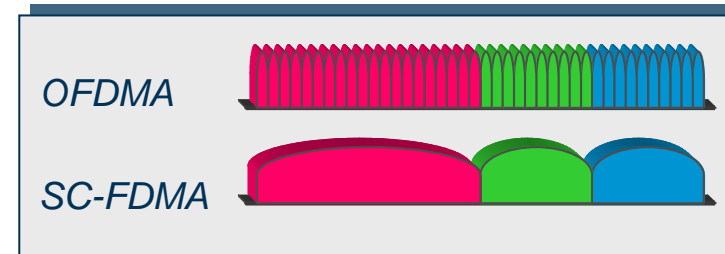
- **Advanced antenna solutions**

- *Diversity*
- *Beam-forming*
- *Multi-layer transmission (MIMO)*



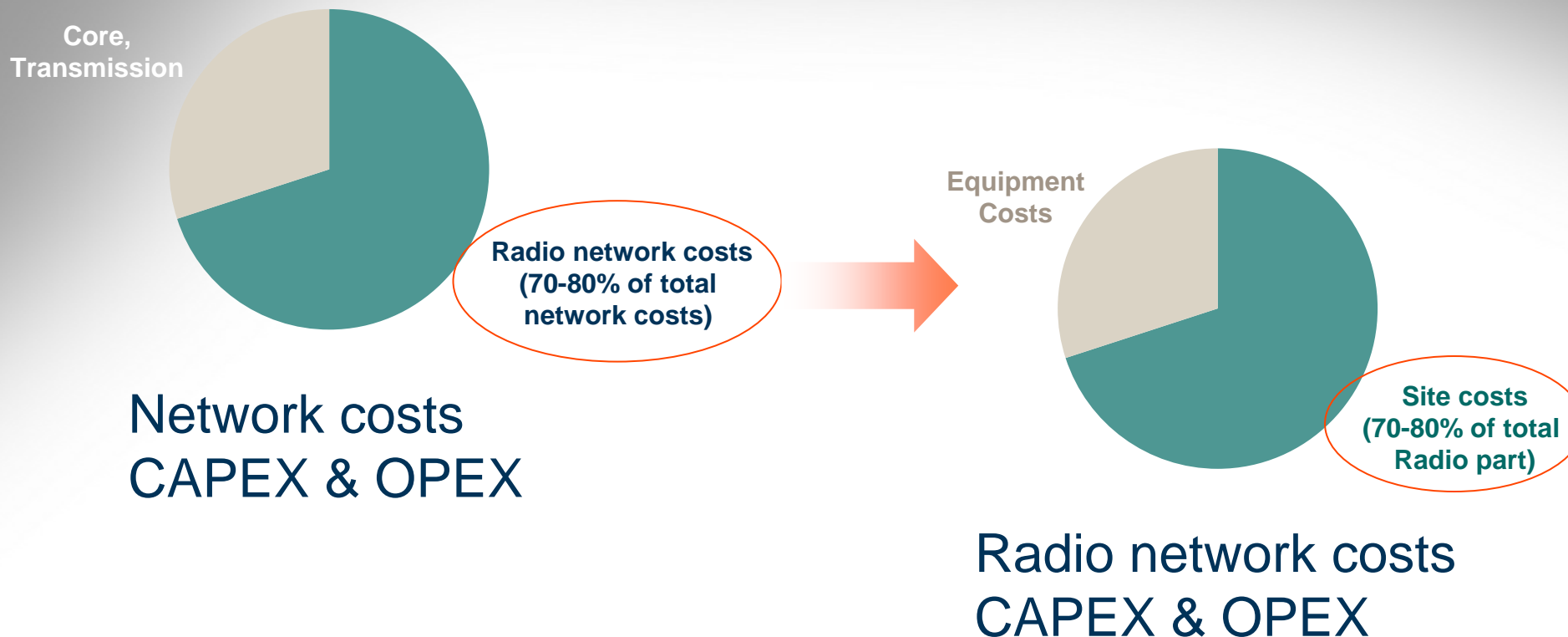
- **LTE radio access**

- *Downlink: OFDM*
- *Uplink: SC-FDMA*



Number of sites main cost driver

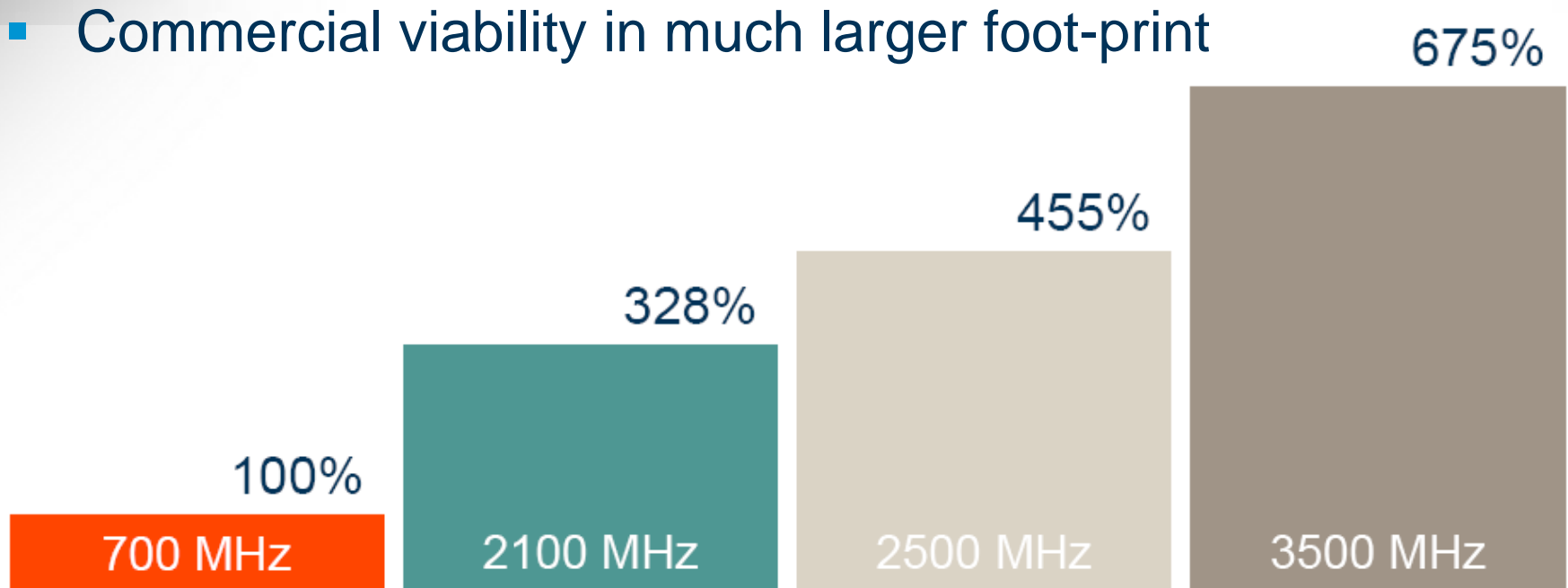
Less sites impacts direct site costs, energy consumption, HW investments,...



Reduced number of sites is essential to lower the costs

Why is this spectrum so important? Cost of wireless coverage – relative CAPEX/OPEX

- Reaching out to all with broadband comes at a cost
- Public support funds reach much further at lower frequencies, or
- Commercial viability in much larger foot-print



UHF-spectrum is key for cost efficient coverage

ITU WRC decisions on UHF

Region 1 (EMEA)



Mass market and momentum

Region 2 (Americas)



Region 3 (APAC)



*50 country declaration, ** 9 countries, including China and India

Harmonized spectrum available in due time is key to enable a mass market

Broadband benefits society

Individuals, public services and enterprises



Universal need for services & efficiency gain

ERICSSON



TAKING YOU FORWARD