

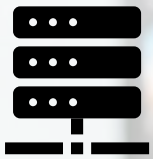
Cable 4K Challenges: Network and Devices

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Cable 4K

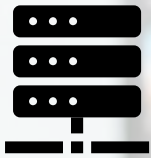


Network



Devices

Cable 4K



Network



Devices



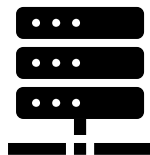
4K needs broadband

Up to 35Mbps in H.265/HEVC

Cable Network for 4K

IP-based Streaming

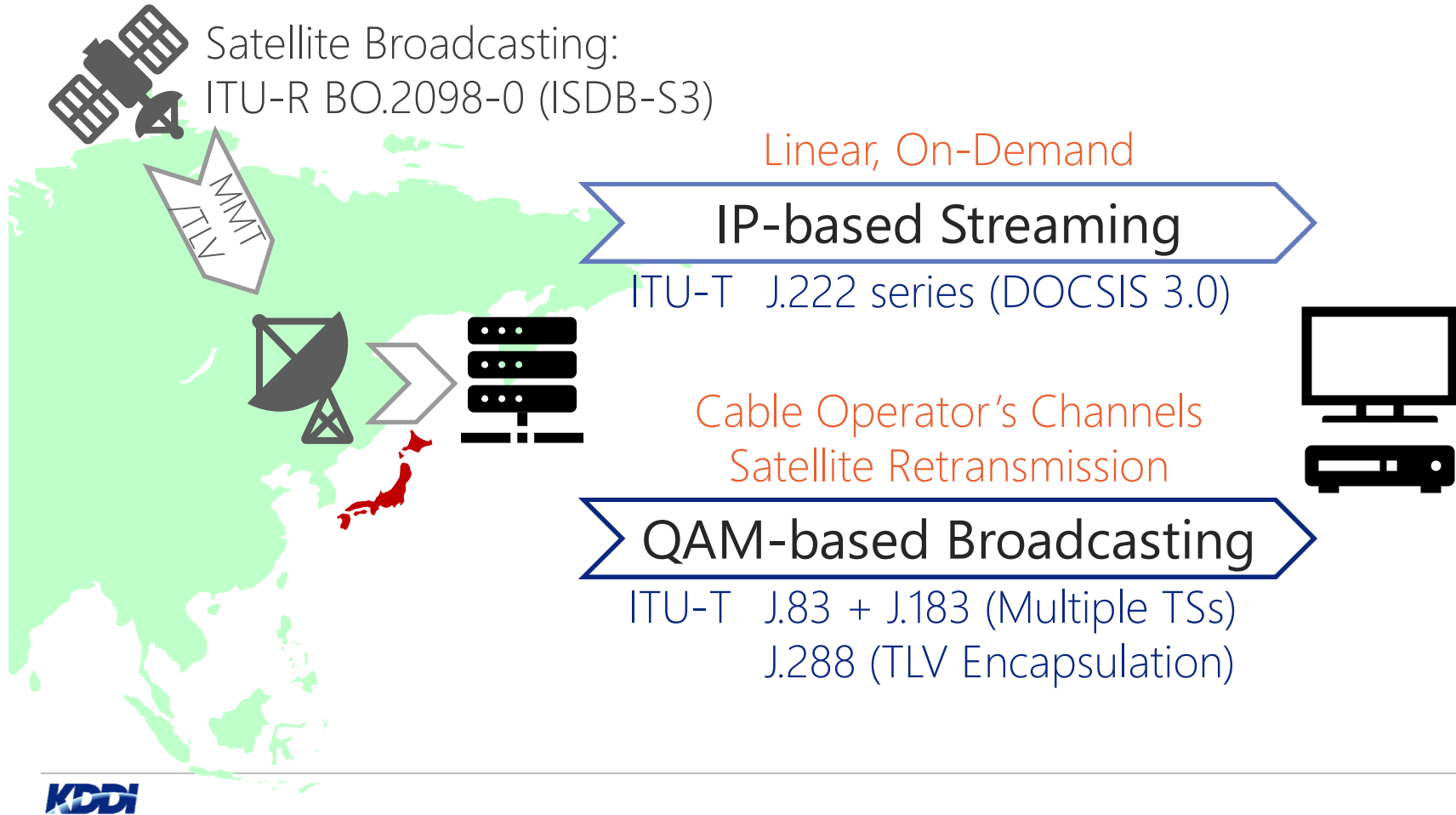
ITU-T J.222 series (DOCSIS 3.0)
J.223 series (C-DOCSIS)
J.5GDOCSIS (DOCSIS 3.1 Full Duplex)



QAM-based Broadcasting

ITU-T J.83 + J.183 (Multiple TSs)
J.382 (ETSI DVB-C2)

Cable Network for 4K: Japan





4K is **ready** over cable network

Cable 4K

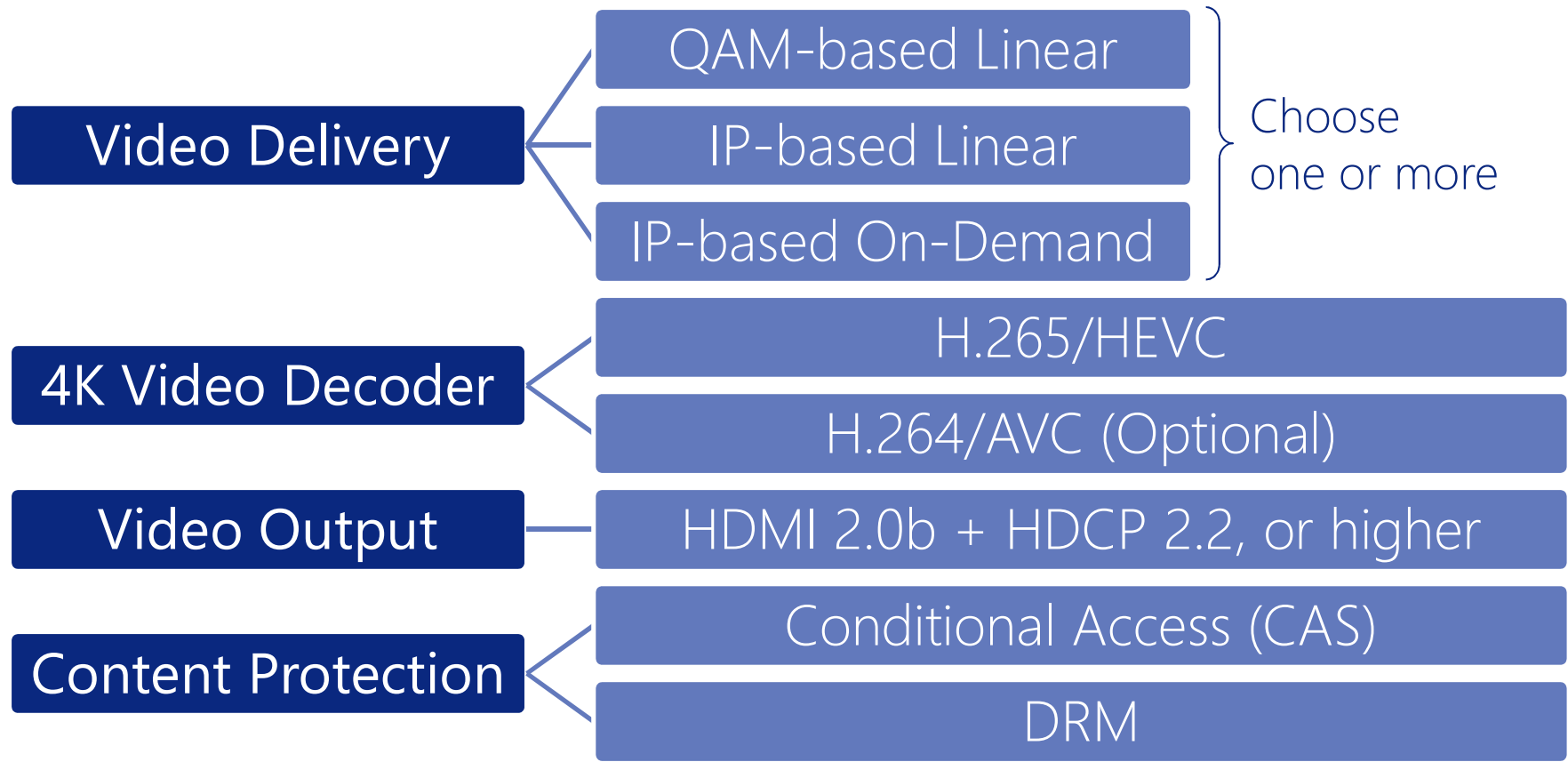


Network



Devices

ITU-T J.297: 4K Cable STB Requirements



Cable Plus STB-2 by KDDI



4K Cable STB: Cable Plus STB-2 by KDDI



Approx. 240 mm x 172 mm x 33 mm
(9.45 in x 6.77 in x 1.30 in)

4K Broadcasting

4K Video on Demand

Android TV 8.0 + Google Play

Bluetooth LE Remote Control

Voice Search and Control

4K Video Content

QAM-based Linear



Cable Operator's Channels
MPEG-2 TS



Satellite Retransmission
MMT/TLV

IP-based On-demand
(including OTT)



... and more

Voice Search and Control

Google Assistant (Built-in)

Voice-enabled remote control



Google Home (Optional)

Voice control by "Ok Google"

Voice Search and Control



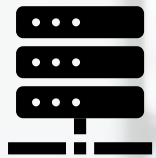
Ok Google, show me some popular anime movies



Record tomorrow's TV drama



4K-enabled Cable Services



Network



Devices



OTT



AI

Thank you

Designing The Future

KDDI