



Georgian National Communications Commission

**Spectrum Expert Working Group;
Current status on Digital Broadcasting and Digital
Dividends 1 & 2 in Georgia;
Mobile market and auctions in Georgia;
Mobile Coverage Analyzer (MCA) – innovation tool
for regulator authorities and mobile operators**

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SEWG: What is it for?

- Informal group (EaPeReg 6th plenary)
- Main goals: to consider and facilitate viable approaches for the UHF band 470-862 MHz, to exchange views and experiences
- Towards a set of means supporting political decisions, individual starting positions and societal needs to be well respected
- Optimum outcome: future frequency distribution plan and transition paths per country by full integration to regional coordination approach
- Minimum: easing best possible decoupling of individual paths (“least impact approach”)

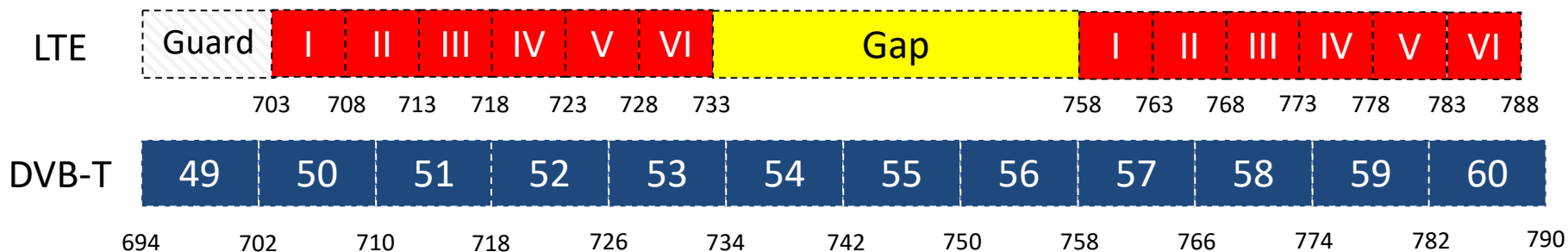


- Digital Dividend II: EU-countries will free up 700 MHz (2020/22)
- EU-countries to have necessary cross-border coordination completed by the end of 2017
- Spectrum reorganisation to be based on regional coordination approach (WEDDIP, NEDDIF, ...)
- Specific challenge: direct impact onto neighbors
- Great benefits from collaboration
- SEWG to enable EaPeReg countries to be fully integrated in regional spectrum reorganisation
- Relevant framework:
 - ❖ equitable access and mutual compatibility
 - ❖ consequential modifications to the GE-06 Plan



Band plan 700 MHz band

APT band plan to be utilized:



Several topics to be addressed to define usage conditions:

- Protection of broadcasting in channels below 49
- Usage of duplex gap
- Availability of band





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Broadcasting Technical aspects

In 2006 channels distributions was made for region 1 and region 3, 174-230MHz and 470-862MHz ranges, within ITU Geneva 06 plan.

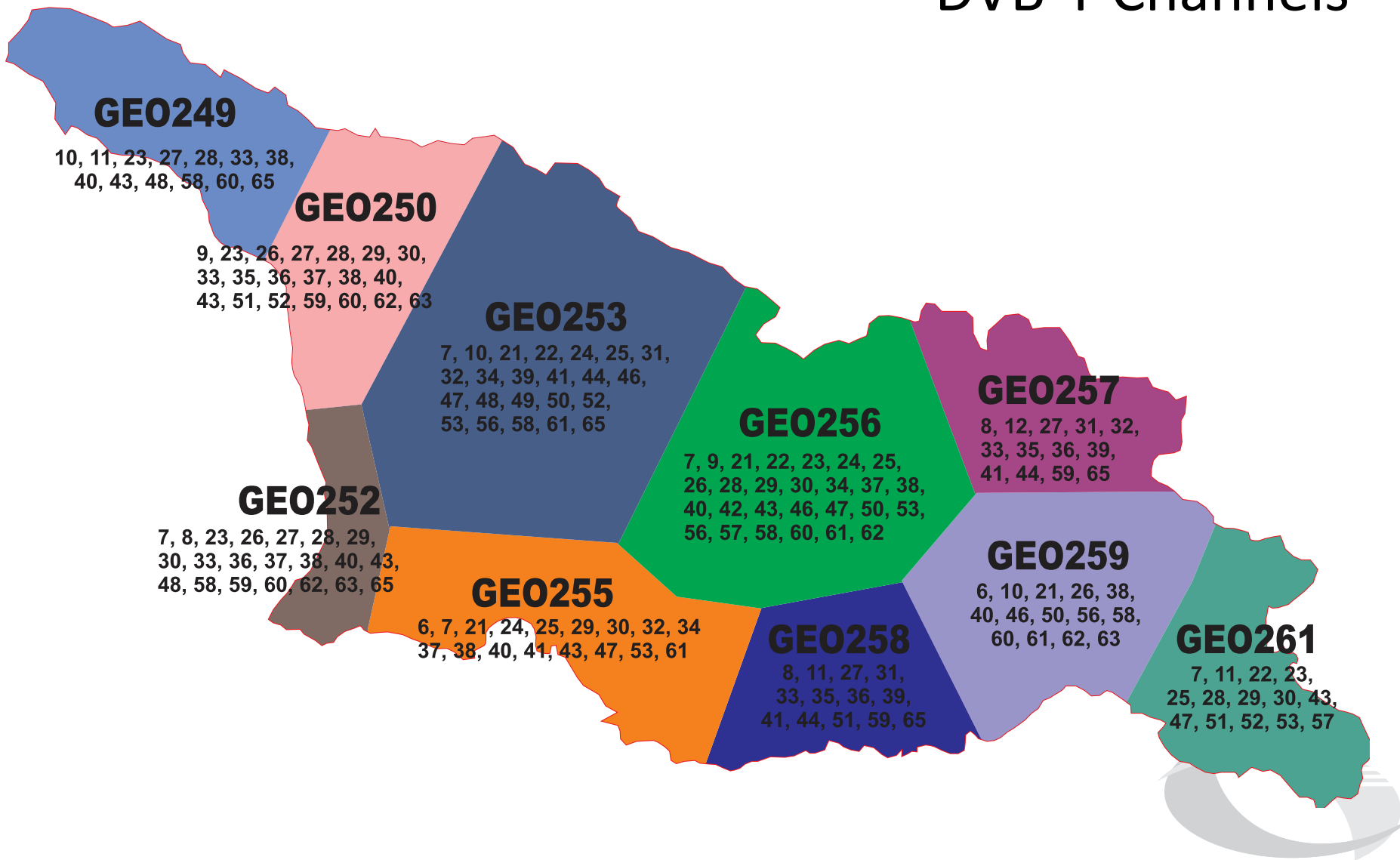
The plan's main goal was the effective usage of the spectrum on nation-wide and counties-wide level. Therefore, frequency range conversion might be the main achievement of efficient usage of broadcasting spectrum.

According to Ge06 plan, there were 175 digital channels allocated on the whole territory of Georgia in 10 zones.



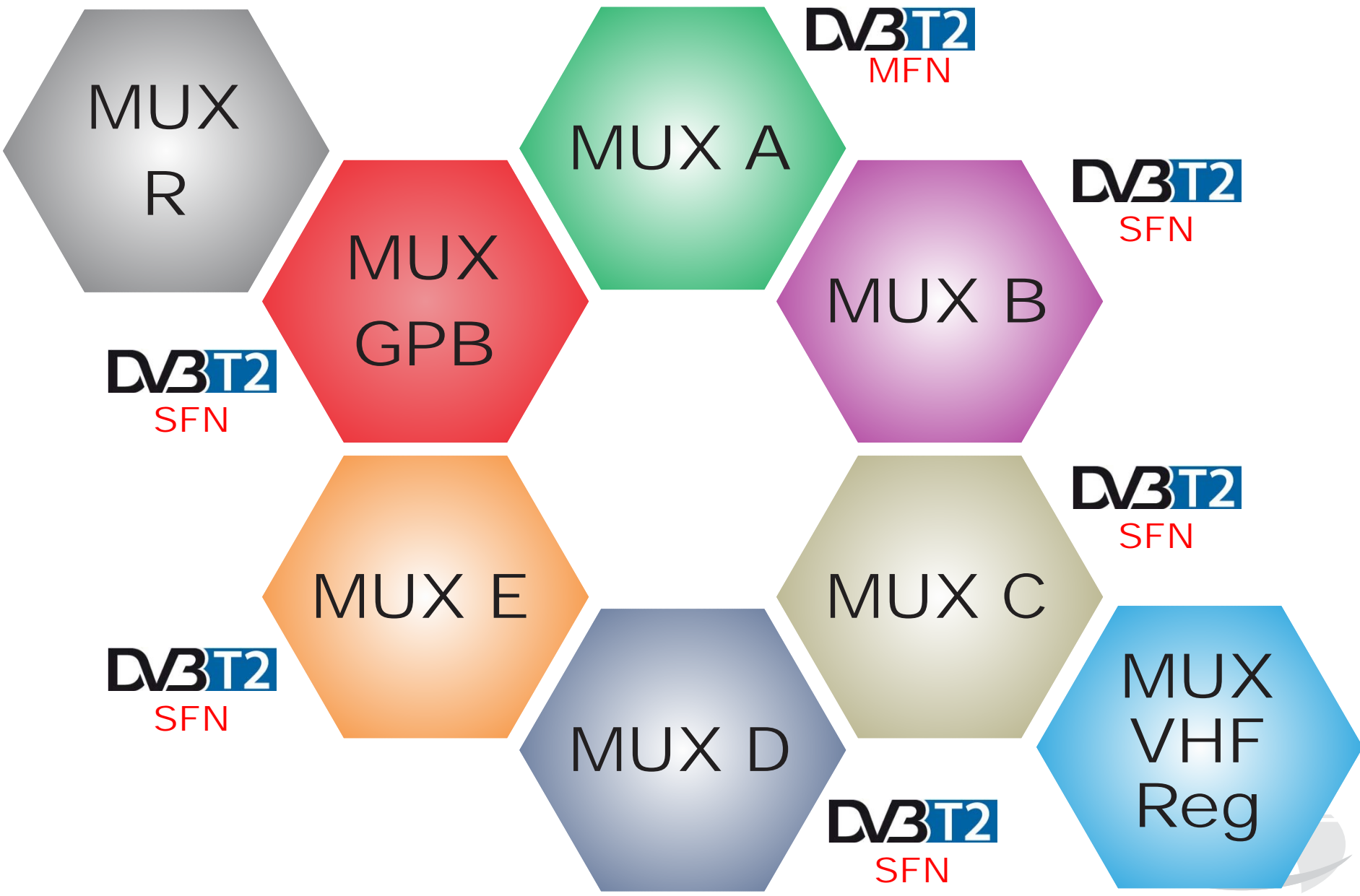


DVB-T Channels



Broadcasting Zones

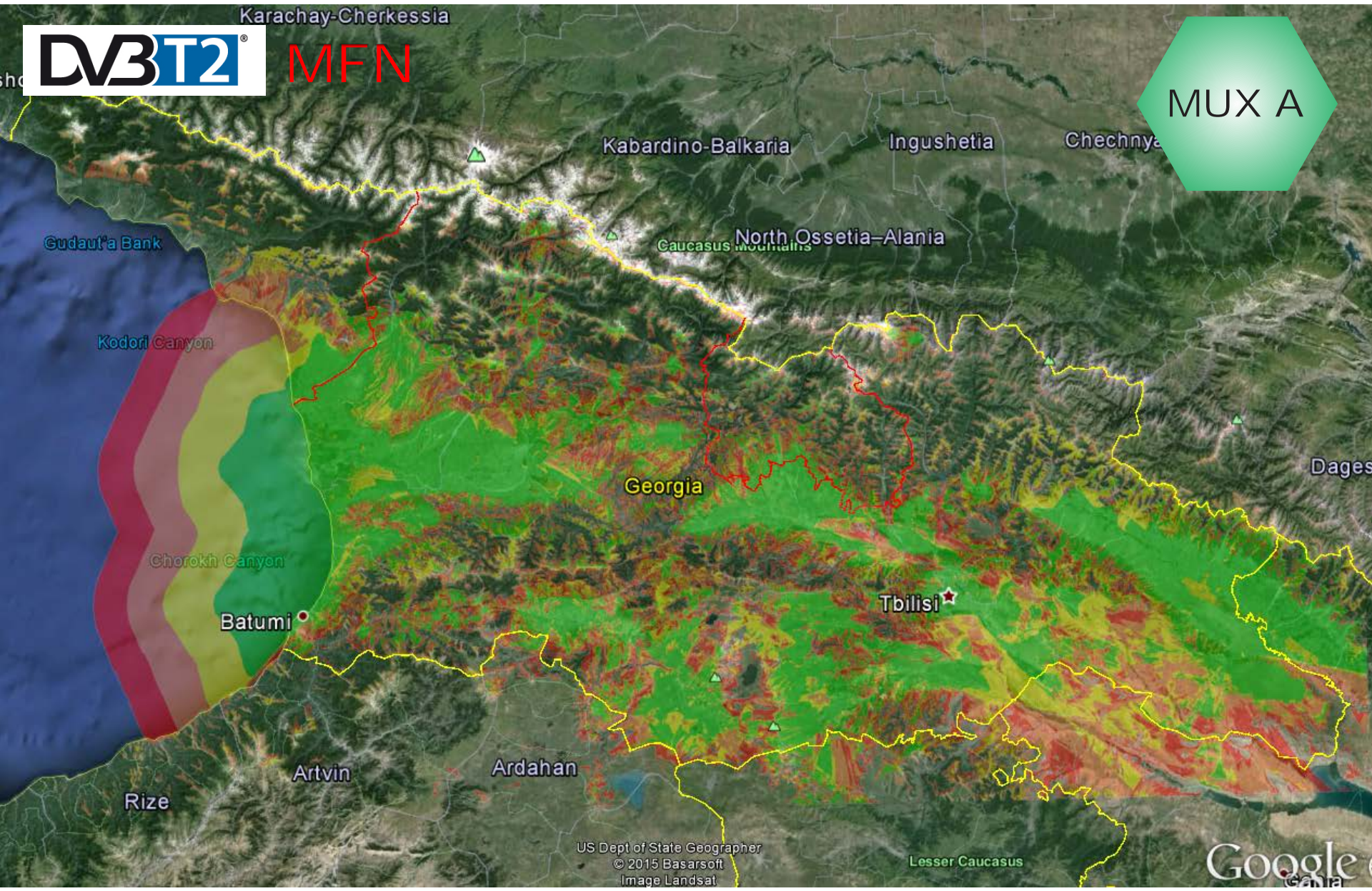




DVB-T2[®]

MFN

MUX A

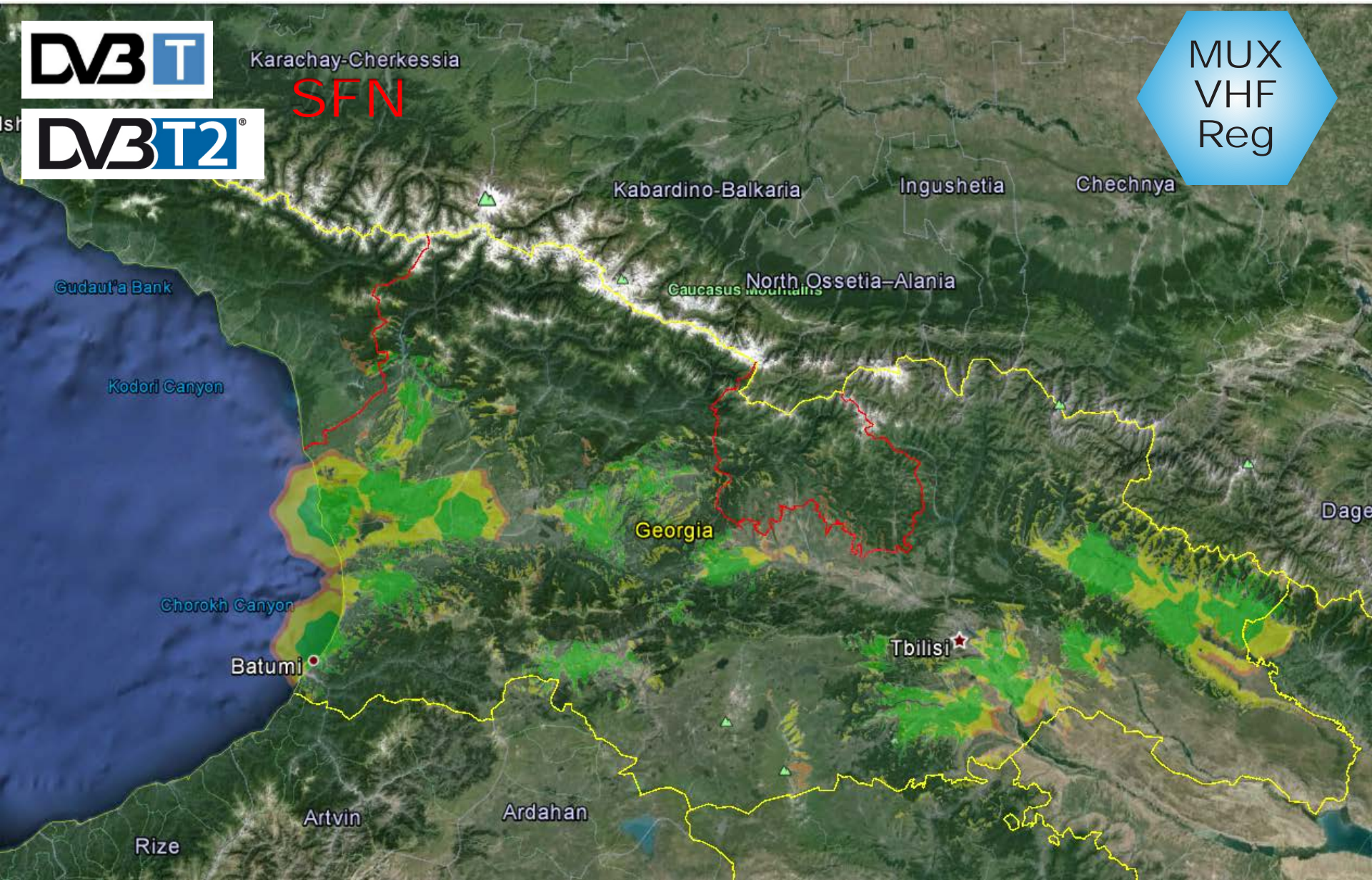


DVB-T

DVB-T2

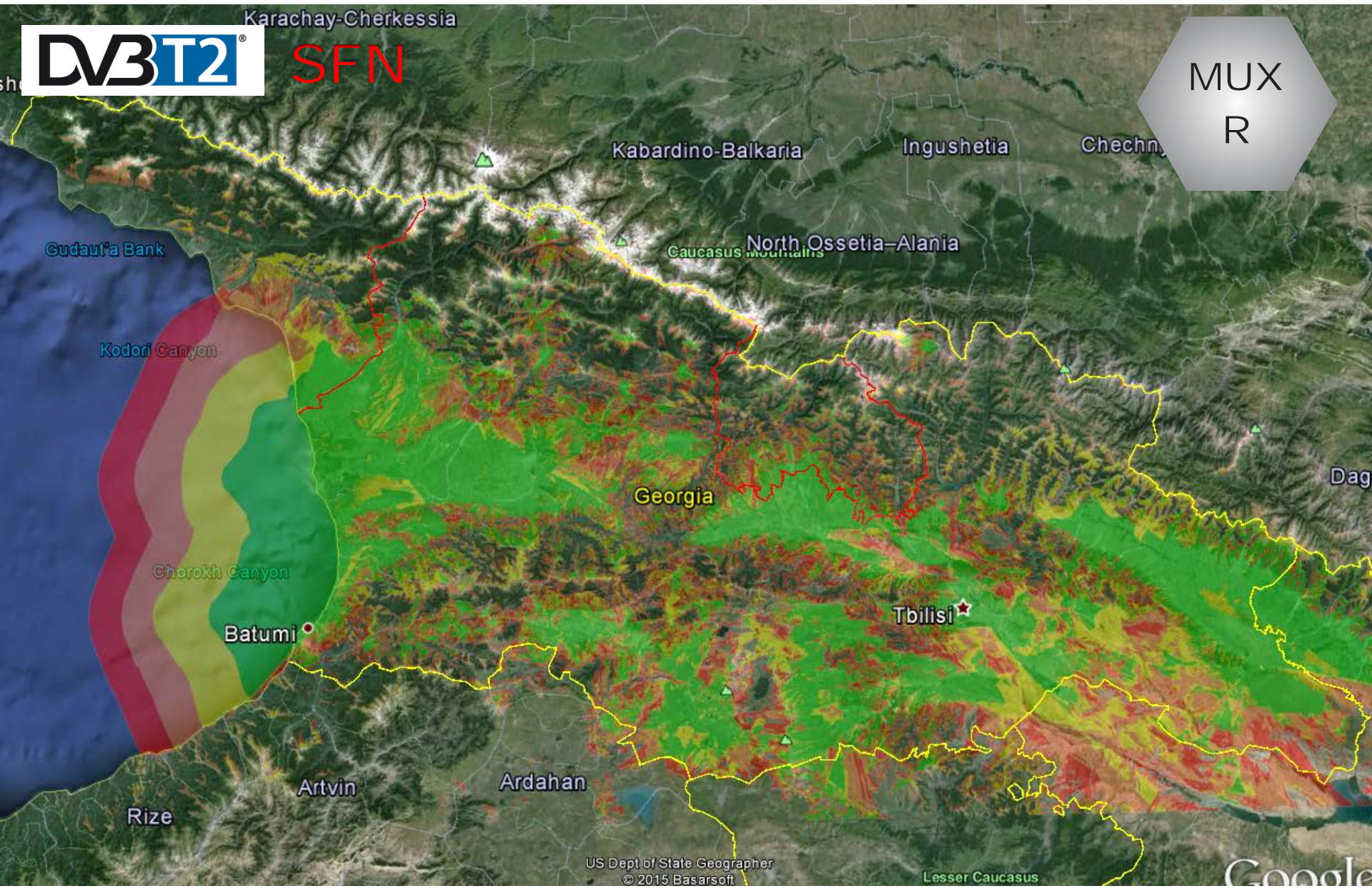
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SFN



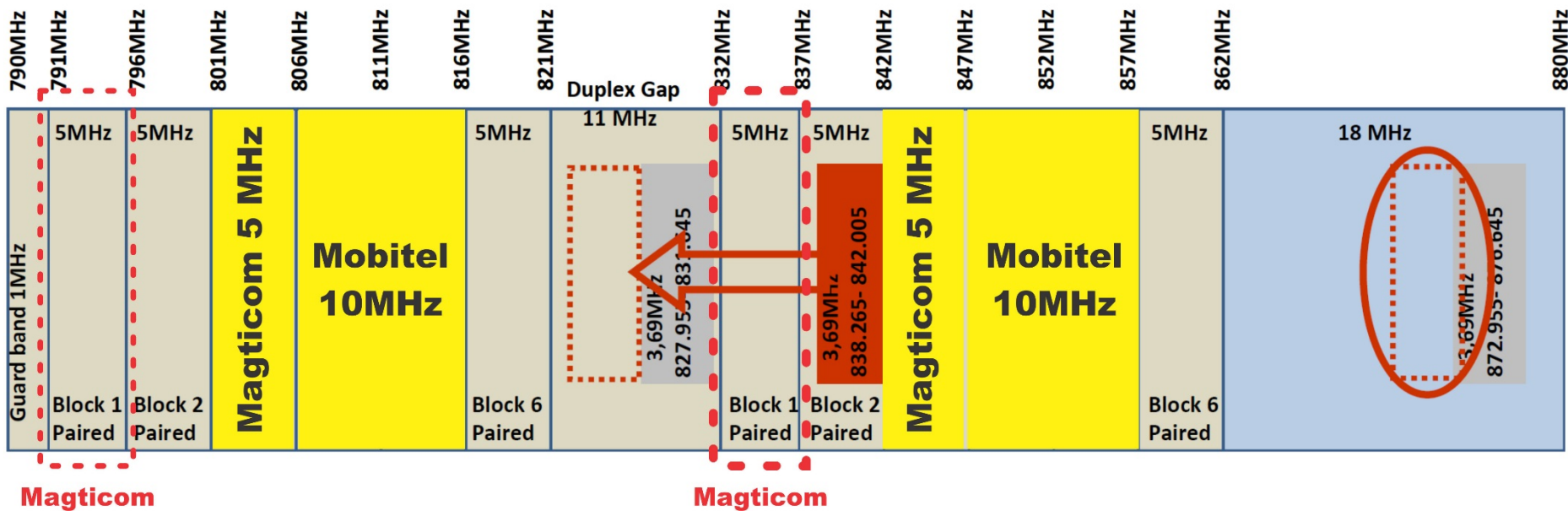
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Lesser Caucasus

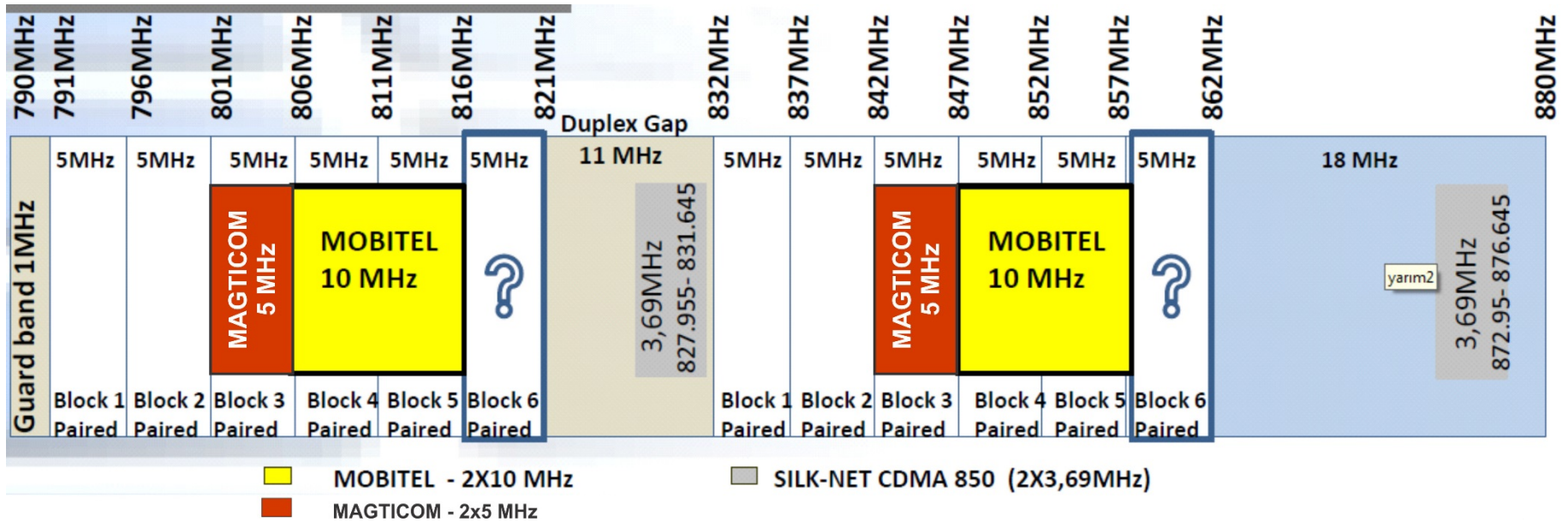
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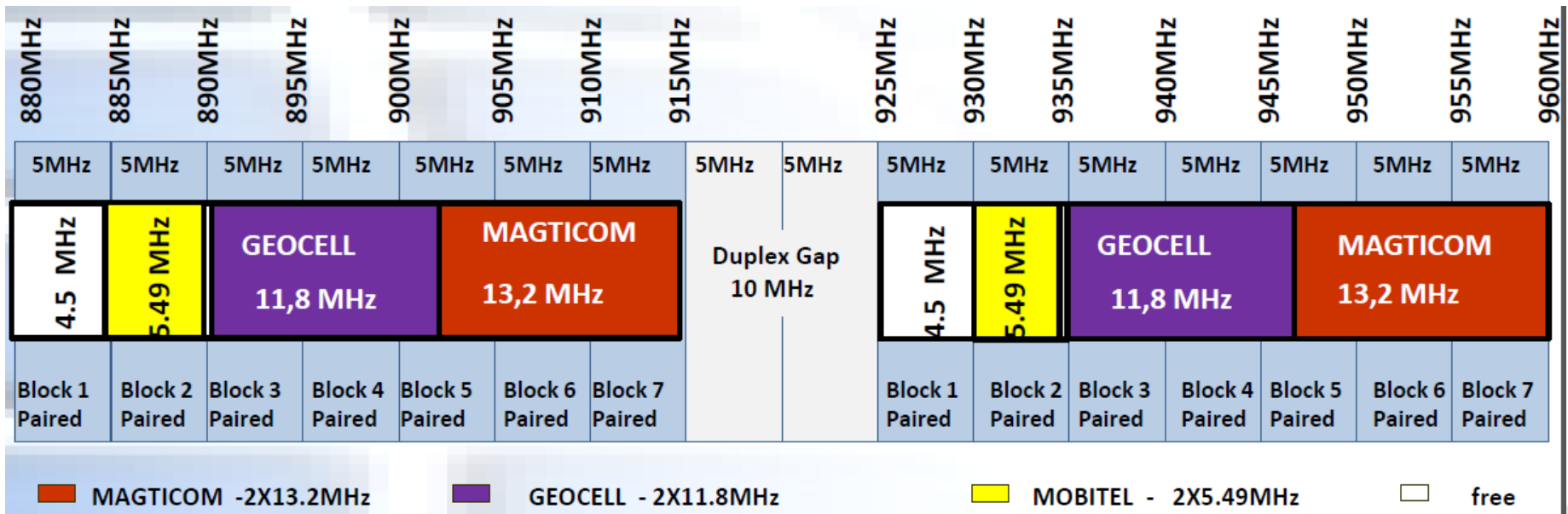
MUX A	Free	Non commercial		MFN
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MUX E				
MUX GPB	Granted	Non commercial	DVB-T DVB-T2 [®]	
MUX VHF Reg		N/C / Comm		
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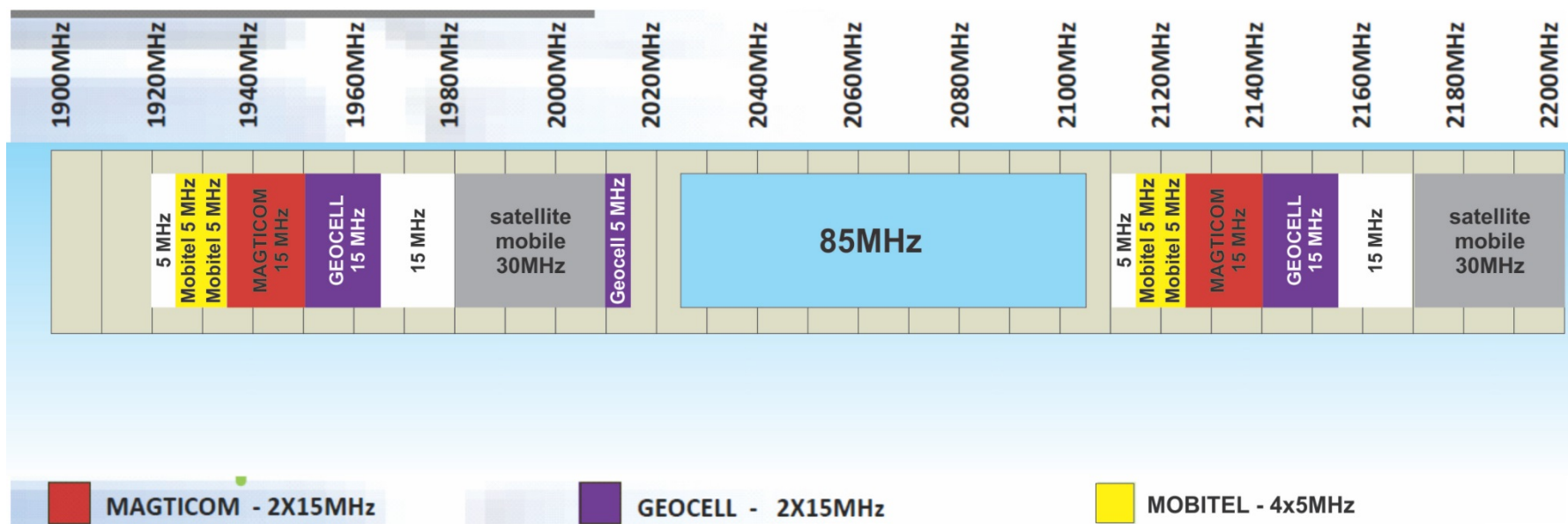
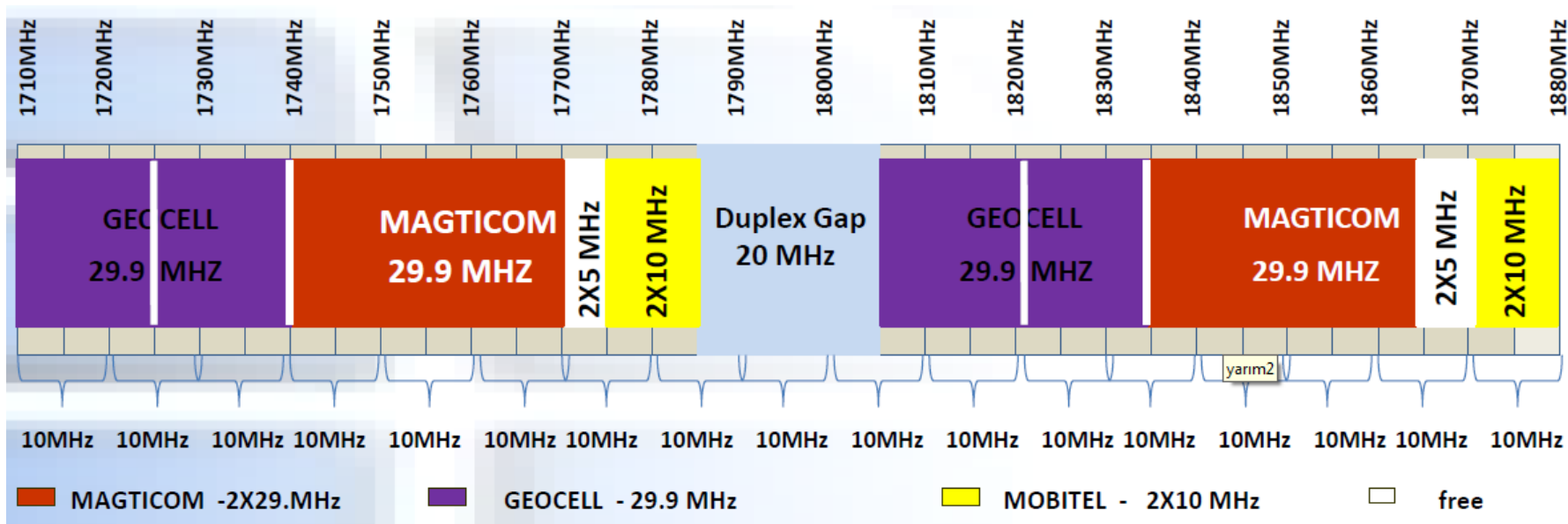


❖ 800/900/1800/2100MHz ranges liberalization / optimization;



- ❖ Possibility of auction for 700MHz range paired with 800/900/1800/2100MHz bands;
- ❖ Award blocks in 800MHz and 900/1800/2100MHz ranges as separate resources;





- ❖ Consultation Period finished on September 12, 2015;
- ❖ **Possible usage of contiguous spectrum blocks for operators in 800MHz;**
- ❖ Obligations for winners (800MHz range):
 - ✓ Geographical Coverage
 - ✓ Licence period – 15 years
 - ✓ Technical characteristics for BSs
 - ✓ In-Band EIRP
 - ✓ Out-of-band emission





MCA

MOBILE COVERAGE ANALYZER

<http://MCA.gncc.ge>



THANK YOU!



QUESTIONS?

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