

Warszawa, 2015.04.10

The future of UHF spectrum in the 694-790 MHz ("700 band") and 470-694 MHz bands

Position of **Telewizja Polsat Sp. zo.o.** regarding the future use of the UHF (470-790 MHz) band as part of the European Commission's consultations of the future use of the UHF (470-790 MHz) band

1. Respondents' profile

I am responding as the individual company.

2. Confidentiality

Your contribution will be considered public and will be published unless you mark it as confidential. In this case your contribution will be used to provide a summary of the consultation results but will not be published individually.

Please DO NOT consider my contribution as confidential.

Your name will be linked to your contribution unless you mark it as anonymous. In this case your contribution will be published without your name.

I DO NOT prefer to remain anonymous.

3. The citizens' dimension

SOME QUESTIONS INTENTIONALLY LEFT BLANK

If part of the current TV spectrum were allocated to wireless broadband services with the aim of providing broadband coverage in more locations and higher connection speeds, the gradual shift from TV to wireless broadband use may cause temporary degradation of digital terrestrial TV (DTT) services (less channels/quality or more noise). (Please note this shift would not affect TV based on cable, satellite or fixed broadband platforms.) Would you agree to such a shift and if so for how long would you accept such a degradation?

I do not think a shift of part of the current TV to wireless broadband is necessary because
 I don't see the need for network coverage in more locations and higher connection speeds.

I see the need for network coverage in more locations and higher connection speeds but not at the expense of TV services.

I see the need for network coverage in more locations and higher connection speeds and would be ready to accept a temporary degradation of TV services for a few days.

- I see the need for network coverage in more locations and higher connection speeds and would be ready to accept a temporary degradation of TV services for a few weeks.
- I see the need for network coverage in more locations and higher connection speeds and would be ready to accept a temporary degradation of TV services for a few months.

If part of the current UHF broadcasting spectrum were allocated to wireless broadband services with the aim of providing better broadband coverage and higher connection speeds, would you accept a permanent reduction in the amount or quality (standard definition and not high definition) of free-TV channels available via DTT? (Please note this shift would not affect TV based on cable, satellite or fixed broadband platforms.)

- Yes, I would be willing to lose the availability of some free DTT channels in exchange for better wireless broadband services.
- No, I would not be willing to lose any current digital terrestrial television free DTT channels for a better wireless broadband services.**

If part of the current UHF broadcasting spectrum were allocated to wireless broadband services with the aim of providing better broadband coverage and higher connection speeds, would you be willing to purchase new TV equipment (TV set, decoder) needed to function on the adapted DTT networks. (Please note this shift would not affect TV based on cable, satellite or fixed broadband platforms.) If so within which timeframe would you be willing to do so?

The recent transition from analogue to digital signal necessitated equipment replacement expenses to be made. Another similar compulsory replacement before the end of the lifetime of the present equipment (10-15 years) would require public financing. However, such public financing would need to cover not only the main TV set but also additional TV sets (in kitchens, bedrooms and holiday homes) and antenna systems, including community aerial installations.

- No, I would not be willing to purchase new TV equipment in exchange for better wireless broadband services.**
- Yes, I would be willing to purchase new TV equipment in the next 5 years if this means having better wireless broadband services.
- Yes, I would be willing to purchase new TV equipment in the next 10 years if this means having better wireless broadband services.

4. Potential repurposing of the 694-790 ('700') MHz band

What long-term advantages and disadvantages do you see in using the 700 MHz band for wireless broadband services in the Union?

- 1) **Advantages:** a rapid and inexpensive growth in wireless data transmission network coverage that can be achieved with little investment outlays.
- 2) **Disadvantages:** limitation of development of universally accessible television broadcast, rapid saturation of coverage networks, resignation from or considerable delay in

development of more frequency-efficient and quality-stable access technologies in bands above 1GHz.

What merits do you see in a coordinated EU approach for changing the use of the 700 MHz band in the Union from broadcasting to wireless broadband services?

There are no merits in a coordinated change of the use of the 700 MHz band from broadcasting to wireless broadband services throughout the Union. The regional agreement Geneva-06 permits the operation of mobile equipment in the television bandwidth provided that a specific emission mask and parameters (generic mobile) are observed. This legal regime permits broadband access to be implemented in television bands in countries where the development of terrestrial digital television does not justify its further maintenance, and to leave this medium in countries where it is socially important.

In your opinion what should a potential EU coordination cover?

First: EU borders – implementation must be EU wide, including EU border states with implementation problems. The EU-border states such as Poland, Lithuania, Latvia, Estonia should not be treated as “no harmonized service zone” where only interferences between EU and non-EU services are managed. Territory with over 50 million of Europeans cannot be the guard band zone.

Second: Ensuring the European and Member States cultural policy as well as the equal access (which shall also ensure the basic level of freely accessible content services – provided technologically neutral)

Should there be a common EU deadline for making the 700 MHz band available for use for wireless broadband services across the EU?

- Yes
- No

Please provide justification of your answer on a common EU deadline including cost assessment.

Differences in the terrestrial television implementation times, share of this television in the content access market, licensing method and license period, geographical specificity of the Member States and various population density structure, all have such a result that appointing one date will be a compromise that will be accompanied by unreasonable social costs. The agreement Geneva-06 allows broadband access to be implemented in the countries that resign from the terrestrial television.

Which date would you propose for such a deadline [The Lamy report proposes a deadline of 2020 +/- 2 years]?

To be discussed after the review in 2025.

Should there be measures at EU level mandating use of the latest, most spectrum-efficient technologies for DTT equipment (such as DVB-T2, HEVC etc.)?

- Yes
- No

Which date would you propose to mandate such spectrum-efficient technologies?

The review of television technologies should be carried out in 2025 at earliest.

5. Ensuring regulatory certainty for current users of spectrum

Should there be a common EU deadline for safeguarding primary use of the 470-694 MHz band for DTT and further use for wireless microphones and other wireless audio equipment?

Yes

No

Which date would you propose for such a deadline [The Lamy report proposes a deadline of 2030]?

The review made in 2025 at the earliest should enable assessment of the possible date of liquidation of terrestrial television, if such liquidation is considered justifiable at all.

6. Flexibility of use of sub-700 MHz (470-694 MHz) spectrum

[The Lamy Report recommends a „flexibility option“ in the band 470-694 MHz. This means that broadcasting use would always have priority in this band, yet specific channels or locations not used for terrestrial broadcasting or wireless audio applications (PMSE) could become available for downlink-only wireless broadband applications depending on national circumstances.] Do you support flexible downlink-only use of the 470-694 MHz band also for wireless broadband services, which safeguards primary use of this band for DTT according to national circumstances?

Yes

No

What scenarios and conditions should be studied to allow flexible downlink-only use in the 470-694 MHz band? In particular, should these include primacy for the provision of audiovisual services to mass audiences?

An additional downlink for the purposes of broadband access in the UHF band could be admitted before 2030 provided that undisrupted terrestrial broadcast television service is ensured.

7. Harmonisation of use of sub-700 MHz (470-694 MHz) spectrum in the long-term, the European approach and the International Telecommunication Union (ITU) context.

Do you see merits in a common EU position on the UHF band for World Radiocommunication Conference 2015?

Yes

No

What should be the EU position with regard to the 470-694 MHz band for World Radiocommunication Conference 2015?

No change.

What should be the EU position with regard to the 470-694 MHz band for World Radiocommunication Conferences beyond 2015?

Required further flexible spectrum use options studies.

What measures would be needed at national and/or EU and/or ITU level to safeguard flexible downlink-only use in the 470-694 MHz band?

Extensive and reliable technical studies on compatibility between broadcasting and mobile service shall be conducted. The studies shall include all potential deployment scenarios, including High Power – High Tower. This flexible option for downlink-only should be only introduced in obligatory EU / ITU regulation when proved to safeguard non-interfered operation of broadcasting in this band.

8. Market review of the state-of-play of broadcasting and wireless broadband services

Should there be a common EU deadline for conducting a review exercise regarding market developments?

Yes

No

Which date would you propose for such a deadline [The Lamy report proposes a deadline of 2025]?

2025

What objectives, scope and method should such a review exercise pursue?

The objective should be to define the admission of UHF for mobile service. The review should concern the use of the UHF band by television, the spectrum use by telecommunication operators and an analysis of advancement of work on new technologies, both in telecommunications and television.

9. Other comments

Do you have further comments related to the Lamy Report?

Do you have further comments regarding relevant issues in the context of the future use of the UHF band (470-790 MHz)?

1. Digital terrestrial television is the basic form of distribution of linear content throughout Europe.

Nothing indicates that the traditional television will disappear before 2030. The High Level Group's work under the guidance of Pascal Lamy confirmed that the most likely scenario in this period is a coexistence of broadband services and traditional linear television. Therefore, it is

necessary to ensure that the television industry is able to make secure investments and develop in any foreseeable perspective.

2. Digital terrestrial television uses allocated frequencies with high efficiency, both in terms of technology and costs. As regards provision of multimedia content, this efficiency is much higher than in broadband networks.

The average cost of network is between 0.20 and 1.5 euro per month per household for 60 TV channels transmitted 24/7. No other technology makes it possible to provide so efficiently the same content to a mass recipient at the same time.

3. Terrestrial digital television is irreplaceable as an instrument for implementing a public policy, being an important medium of creation and dissemination of social, economic and cultural benefits. For these objectives to be implemented, the television industry must have space for innovation and development.

Unlike with service neutral broadband access technologies, television implements educational, cultural and other objectives imposed by European and national regulators. Due to fact that access to terrestrial television (Free-to-air) is free for everyone, it is an important factor in leveling out social inequalities in accessing the above content and its dissemination.

4. Television production is a very important source of European content that is reused in broadband networks. To ensure continuity of such production, it is necessary to ensure the possibility of using PMSE equipment, in particular wireless microphones.

The UHF band, in particular the 700 MHz band, is key to ensuring the correct operation of devices and equipment necessary to produce content, to meet growing requirements of users, creators and equipment manufacturers. In accordance with the Lamy report, no substitute band for the operation of wireless microphones and similar equipment has been found. Any decisions concerning the schedule for release of that band for other services should be made only after another band is found for such equipment.

5. Television and radio broadcasts are an irreplaceable form of communicating threats in situations of compromised public security and as such require recognition of their role that is more important than that of broadband communication.

Resilience, uninterrupted and trouble-free operation and broad coverage, even in a situation of natural disasters or bigger threats position television broadcast before broadband communication which is more prone to failure and depends on many intermediate factors (in particular atmospheric, geolocation and technological factors).

6. Any change in the use of the television spectrum will require enormous outlays to change the structure of television networks, replace equipment (e.g. PMSE), implement new compression and broadcast standards (e.g. DVB-T2) and replace user equipment (by individual

and collective users, such as housing communities using community aerals). These costs should be fully compensated without placing the television industry in a worse competitive position compared to that of other content providers.

Funds for this purpose should be defined and secured before making a decision to release the 700 MHz bandwidth. As shown by the terrestrial digitalization experience in Poland, regulations do not permit this kind of public aid at this stage. Importantly, this would require Member States to take actions having attributes of public aid which, depending on the form and channels of their distribution, should be approved for individual Member States at the European Commission level. Funds for this purpose cannot be made conditional on uncertain proceeds from the future auctions of released bandwidths. The transition period should include a period of simulcast which will require a larger resource of spectrum for television.

7. Commercial broadcasters in Poland operate on the basis of program licenses whose duration is strictly defined. At the same time, the public television has no such licenses and the spectrum allocated to it for digital broadcasting is not limited in time. A situation should not be allowed in which, as a result of an attempt at recovering the 700 MHz band and possibly the remaining part of UHF, the public television would have an unfairly privileged position compared to that of commercial broadcasters.

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