The 2nd Annual CIS and CEE Spectrum Management Conference
Covering CIS and Central and South-Eastern Europe

19 – 20 September
Almaty, Kazakhstan

DAY 1

Session 1: Welcome and Keynotes

09:00 – 09:20   **Welcome and introduction**
Dauren Abayev, Minister of Information and Communications, Kazakhstan (Confirmed)
Kirill Oparin, Head of office for CIS region, ITU (Confirmed)

09:20 – 09:35   **Keynote Presentation**
Victor Strelets, Member, Radio Regulations Board (RRB) (confirmed)

09:35 – 09:50   **Keynote Presentation**
Frank Kruger, Vice Chair, RSPG (tbc)

09:50 – 10:05   **Keynote Presentation**
Representative, **APEC, Telecommunications & Information Working Group. (TEL)** (tbc)

10:05 – 10:50   **Fire-side chat with keynote speakers: Co-ordination and co-operation on spectrum policy between CIS, Europe and Asia**
The CIS region borders both Europe and Asia, and as such, co-ordination between the regions is key to ensure a coherent and efficient spectrum policy and the avoidance of interference in border areas. In addition, the large markets in Europe and Asia can offer significant advantages in terms of economies of scale to countries in the CIS region.

- What work is being done to co-ordinate spectrum policy between the CIS, Europe and Asia?
- To what extent are bandplans in CIS countries in line with those in Europe and Asia respectively, and where do they differ?
- Is there scope for an even greater level of co-operation and harmonisation in the future, and what benefits could this bring for both CIS and CEE regions?

Discussions will involve above keynote speakers plus:

Almira Gataulina, Secretary of the Republican Council for Radiofrequencies, Ministry for Development of Information Technologies and Communications of the Republic of Uzbekistan (tbc)

10:50 – 11:10   **Morning Coffee**

Session 2: Preparing for WRC-19 – ensuring the best results for all users
With WRC-19 now only just over a year away, this session will provide the opportunity to hear from key representatives from within the RCC and CEPT on the work that is being done in the build-up to this. It will look at where there is consensus and where there is likely to be disagreement; and will discuss what needs to be done to ensure common positions that are for the benefit of stakeholders and citizens throughout the regions.

- What are the key agenda items up for discussion by RCC, CEPT and other regional bodies?
- What positions are starting to emerge?
- What challenges and opportunities are appearing for different stakeholders?
- Where are there early signs of consensus, and where is there disagreement?
- How is the RCC working towards maximising the influence of the region in the WRC-19 process, and what needs to be done in the build-up to the conference?

Moderator:

11:10 – 11:25   **RCC positions and preparation for WRC-19**
Albert Nalbandian, Chairman, RCC WG on WRC-19 (Confirmed)

11:25 – 11:40   **CEPT positions and preparations for WRC-19**
Alexandre Kholod, Vice Chair for WRC-19 preparation, CEPT (Confirmed)

11:40 – 13:00   **Panel Discussion: Ensuring a successful outcome at WRC-19 for the benefit of stakeholders and citizens everywhere**
Albert Nalbandian, Chairman, RCC WG on WRC-19 (Confirmed)
Alexandre Kholod, Vice Chair for WRC-19 preparation, CEPT (Confirmed)
Konstantin Savin, Senior Technology Officer, GSMA (Confirmed)
Vadim Belov, Director General, Intersputnik (tbc)
Representative**, Facebook** (tbc)

13:00 – 14:00   **Lunch**

Session 3: Developing regional and national roadmaps for the future release of spectrum
One of the key factors that mobile operators will point to when looking at justifying investment in new technologies and networks is the need for regulatory certainty. If regulators and governments are able to provide a good indication of the spectrum that is going to be made available over the next few years and how and when then is going to happen, it is argued that this leads to an environment that encourages investment and ultimately improves consumers services and reduces the prices that they pay. This session will look at the situation in the region with regards to the development and co-ordination of 'roadmaps' in this way, and what can be done to improve things going forward.

- What examples of spectrum roadmaps are currently being seen in countries across the CIS and CEE regions, and what impact are these likely to have in encouraging operators to invest in next generation networks?
- What impact does it have on mobile operators and markets more generally when a plan for future release of spectrum is not readily available or understood?

- What can regulators in those countries that do not yet have a spectrum roadmap in place do to create certainty for operators and help them understand when spectrum will become available?
- To what extent should plans for the release of spectrum be co-ordinated with plans that are formulated in Europe and Asia, and what work is being done in this area?
- What bands should regulators be looking at prioritising when it comes to planning for spectrum release to meet current and growing needs?

Moderator: **Farid Nakhli**, Programme Officer, ITU Regional Office for CIS (confirmed)

14:00 – 15:20 **Panel Discussion**
Dzmitry Korzun, Head of the Radio Frequency Spectrum Regulation Department, Ministry of Communications and Informatization of the Republic of Belarus (confirmed)
Vadim Poskakukhin, co-author of strategy for 5G, LTE Union (Confirmed)
Eric Fournier, Chairman, ECC, CEPT (tbc)
Representative, **Mobile** (tbc)

15:20 – 15:40 **Afternoon Coffee**

Session 4: Replanning the Digital Dividend – progress and plans ahead
Work in countries across the region continues on the digital switchover, and the replanning of the 700MHz and 800MHz 'digital dividend' bands. This session will look at the current status in different countries, the likely timeframes ahead and the work that is being done to ensure co-ordnation and the protection against interference.

Moderator:

15:40 – 15:55 **Presentation: Current situation in countries across the region and an overview of the work**
Andrey Lashkevich, Head of Laboratory, Radio Research and Development Institute (FSUE NIIR) (tbc)

15:55 – 16:10 **Lessons learnt in navigating the digital dividend process across SEDDIF countries, and challenges ahead for others**
Dr Akli Maria Kissne, Chairperson, South-Eastern Digital Dividend Implementation Forum (tbc)

16:10 – 16:25 **Case Study: Digital broadcasting development and effective use of digital dividend in the Republic of Azerbaijan based on ITU decisions**
Gulam Abdullaev, Senior Advisor, Sector of Telecommunication, Ministry of Transport, Communication and High Technologies of the Republic of Azerbaijan (confirmed)

16:25 – 16:40 **Presentation: The broadcast perspective**
Peter MacAvock, Head of Delivery, Platform and Services, Technology and Development, European Broadcasting Union (tbc)

16:40 – 17:15 **Room wide discussion**

09:00 – 09:20 **Opening Presentation: Delivering the potential of 5G**
Ulrich Rehfuess, GSA (Confirmed)

09:20 – 09:40 **Case Study: Delivering the required spectrum for vertical markets in Kazakhstan**
Representative, **Ministry of Information and Communications of the Republic of Kazakhstan (tbc)**

Session 5: A focus on the 3.4GHz - 3.6GHz C-Band – balancing the requirements of all users
Across most of Europe and Asia, the 3.4GHz - 3.6GHz portion of the C-Band is seen as a pioneer band for 5G, as well as a good option to deliver additional 4G capacity. In some countries across the CIS region however (including Russia), the spectrum in this lower portion of the C-Band is currently being heavily used by satellite, which would cause additional challengers when looking at clearing the band for mobile broadband. This session will look at the future shape of the band in the region, whether it can be cleared for 5G rollout in a similar way to other regions, and at how the requirements of all users in the band can be taken care of.

- How widely is the 3-4GHz – 3.6GHz band currently used in countries across the CIS and CEE regions and by which stakeholders?
- What challenges would this create when looking to clear the band for 5G services, and what role will this band going to have in the roll-out of 5G services in the CIS region?
- What is the situation in the C-Band across CEE countries, and how may the direction taken in the CIS influence any decisions made there?
- Are there other bands in the mid-range frequencies that could provide viable alternatives for the roll-out of 5G?
- How can it be ensured that any realignment of the band can deliver the most efficient and optimal conditions for 5G usage as well as meeting the requirements of current incumbent users?

10:00 – 10:55   **Panel Discussion**
Vincenzo Lobianco, Chief Technology and Innovation Officer, Agcom (Confirmed)
Stanislav Kizima, FGUP NIIR, Russia (Confirmed)
Representative, **NMHH, Hungary** (tbc)
Representative, **Mobile**
Representative, **Satellite**

10:55 – 11:15   **Morning Coffee**

Session 6: 5G in the mmWave bands - What is the likely direction across CIS and CEE countries?
The issue of mmWave spectrum for 5G and developing a globally harmonised approach for this is one of the key areas for discussion at WRC19. Alongside these ITU discussions, other countries (including the US and South Korea) are pushing ahead with the rollout of 5G networks in the 28GHz band, which is not included in the candidate bands at WRC. This session will look at the different approaches that are emerging for the mmWave bands around the world. With many countries in the CIS and CEE regions yet to adopt a formal position in this area, it will look at how close the 'mmWave future' is in countries across the region, and the likely direction that the region is going to take in this area.

- What are the regional views on the mmWave bands to be prioritised for 5G ahead of the WRC-19 meeting next year?
- What is the situation in other countries around the world, and what consensus are starting to emerge?
- Which are the key bands that are being considered, and to what extent is a globally harmonised approach a reality?
- How close is the 'mmWave future' in countries across the CIS and Central Eastern Europe region, and when realistically are most likely to look at awarding spectrum in these bands?
- What are the pros and cons for countries in the region to be looking at following the European approach and concentrate on the 26GHz band and others identified at WRC-19; and at following the approach seen in the US and across some Asian countries of concentrating on the 28Ghz band?

11:15 - 12:30 Panel Discussion
Ulrich Rehfuess, Head of Spectrum Policy, Nokia (confirmed)
Mikhail Kaigorodov, Global Spectrum & Policy Regulator, ESOA (tbc)
Representative, South Korea (tbc)
Chris Woolford, Director of International Spectrum Policy, Ofcom (UK) (Confirmed)

12:30 – 13:30 Lunch

Session 7: Breaking down the digital divide – technologies and solutions
One of the key outcomes of last year's edition of this conference was that *'a comprehensive solution for bridging the "digital divide" can be achieved only through the use of different technologies and systems…'*. Building on this outcome, this session will explore some of these different technologies that are being considered, and at the mix of different solutions that will help deliver connectivity throughout the hugely varied geographic, social and economic environments across the region.

13:30 – 13:45 Presentation title tbc
Huawei, Speaker tbc (tbc)

13:45 – 14:00 Presentation – mobile broadband

14:00 – 14:15 Presentation – (title tbc)
Timur Kadyrov, Engineer in the Space Services Department (SSD) at the Radiocommunication Bureau, ITU (Confirmed)

14:15– 14:30 Presentation – HAPS
Sergio Bovelli, Manager, Market Access and Regulation, Airbus (tbc)

14:30 – 15:00 Room Wide Discussion

15:00 – 15:20 Afternoon refreshments

Session 8: Designing a licence award process to ensure a competitive and sustainable market: options and best practices

Across the CIS region, spectrum licences are typically awarded using the process of a beauty contest or direct award, whilst in CEE countries, a number of countries have gone down the route of using spectrum auctions. This session will look at the pros and cons of these different approaches, and more generally at the best practise in ensuring a spectrum award process that delivers a competitive and sustainable market.

- What objectives should regulators have when looking at planning spectrum awards; and what tools are available to help them deliver on these?
- What are the advantages and disadvantages of the different spectrum award techniques?
- What affect can a regulators choice of licence award technique have on aspects such as mobile penetration, network deployment and overall level of competition?
- Is it time for CIS countries to start considering the use of spectrum auctions or is the current approach of beauty contests and direct awards still the best approach for the region?
- What examples of successful spectrum auctions have been seen in the CEE region, and what effect has this had on the overall market?
- How is 5G set to change how spectrum is licenced and awarded, especially relating to different vertical users?

Moderator: **Matthew Fried**, Senior Manager, aetha Consulting (Confirmed)

15:20 – 15:50   **Best practice in spectrum awards masterclass**
Stefan Zehle, Co-founder and CEO, Coleago (confirmed)

15:50 – 16:05   **Case Study: The use of spectrum auctions in Romania**
Sorin Grindeanu, President, ANCOM Romania (tbc)

16:05 – 16:20   **Case Study: Title tbc**
Dzmitry Korzun, Head of the Radio Frequency Spectrum Regulation Department, Ministry of Communications and Informatization of the Republic of Belarus (tbc)

16:20 – 16:35 **Spectrum Assignment- a perspective from the MENA region**
Mohammad Alta'ani, Advisor for the Executive Office of the Telecommunications Regulatory Authority in the Sultanate of Oman**.** (tbc)

16:35 – 17:10   **Room Wide Discussion**