



RIPE NCC
RIPE NETWORK COORDINATION CENTER

Introduction to CAPIF

What will we talk about?



- The RIPE community and the RIPE NCC
- RIPE Policy Development Process
- CAPIF meetings
- CAPIF 4 programme
- Logistics
- Social events

About me



- Community Development Specialist
- At the RIPE NCC for 12 years
- Before
 - Organised the RIPE, ENOG and SEE meetings
 - RACI (the RIPE Academic Cooperation Initiative)
- Now part of the Community Development team
 - SEE, MENOG, CAPIF, RIPE NCC Days
 - Community events, NOGs
 - Internet governance
- Bulgarian, lives in Spain





RIPE and the RIPE NCC



- A community
- Formed in 1989
- No legal entity or formal membership
- Open, inclusive, bottom-up, transparent
- Sharing information and best practices
- Policy development

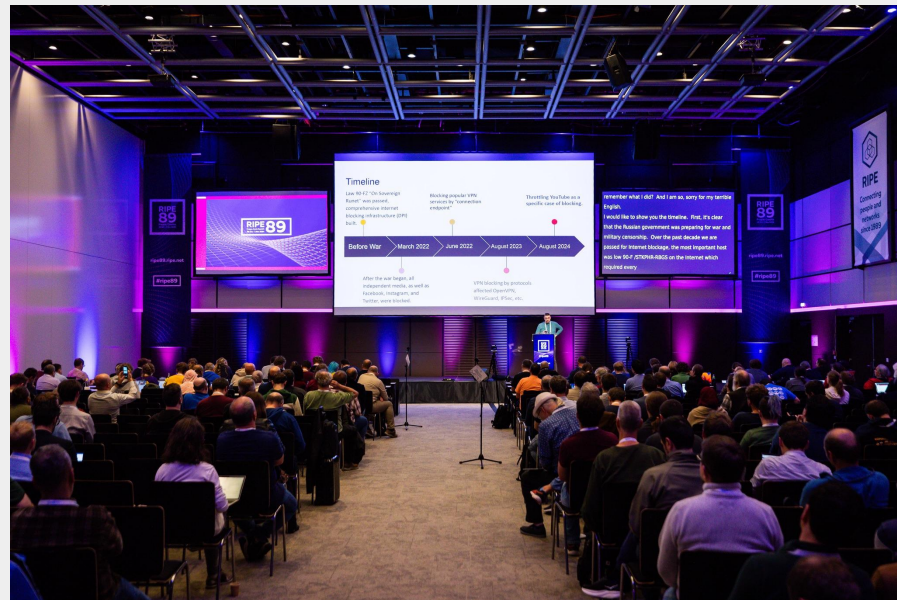
- Secretariat
- Formed in 1992
- Non-profit, membership organisation
- Neutral and independent
- Over 190 staff in offices in Amsterdam and Dubai
- Provides services
- Implements policies

What is RIPE?



Réseaux IP Européens

- French for "European IP Networks"
- Public archives
- Work is structured around:
 - Working Groups (WGs)
 - Task Forces (TFs)



Join the mailing list!

ripe.net/mailman/listinfo/ripe-list

Working Groups



- Address Policy
- Connect
- Cooperation
- Database
- DNS
- IPv6
- Measurements, Analysis and Tools (MAT)
- Open Source
- The Internet of Things (IoT)
- RIPE NCC Services
- Routing
- Security

All Working Group and Task Force mailing lists:

ripe.net/participate/mail/ripe-mailing-lists

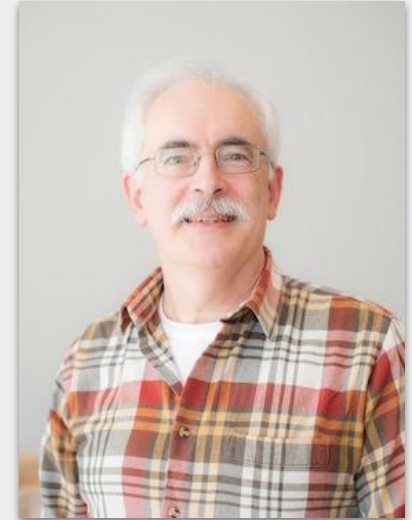
RIPE Chair Team



- The role of the RIPE Chair is to ensure the smooth functioning of the RIPE community
- There is a RIPE Chair and RIPE Vice Chair



Mirjam Kühne
RIPE Chair



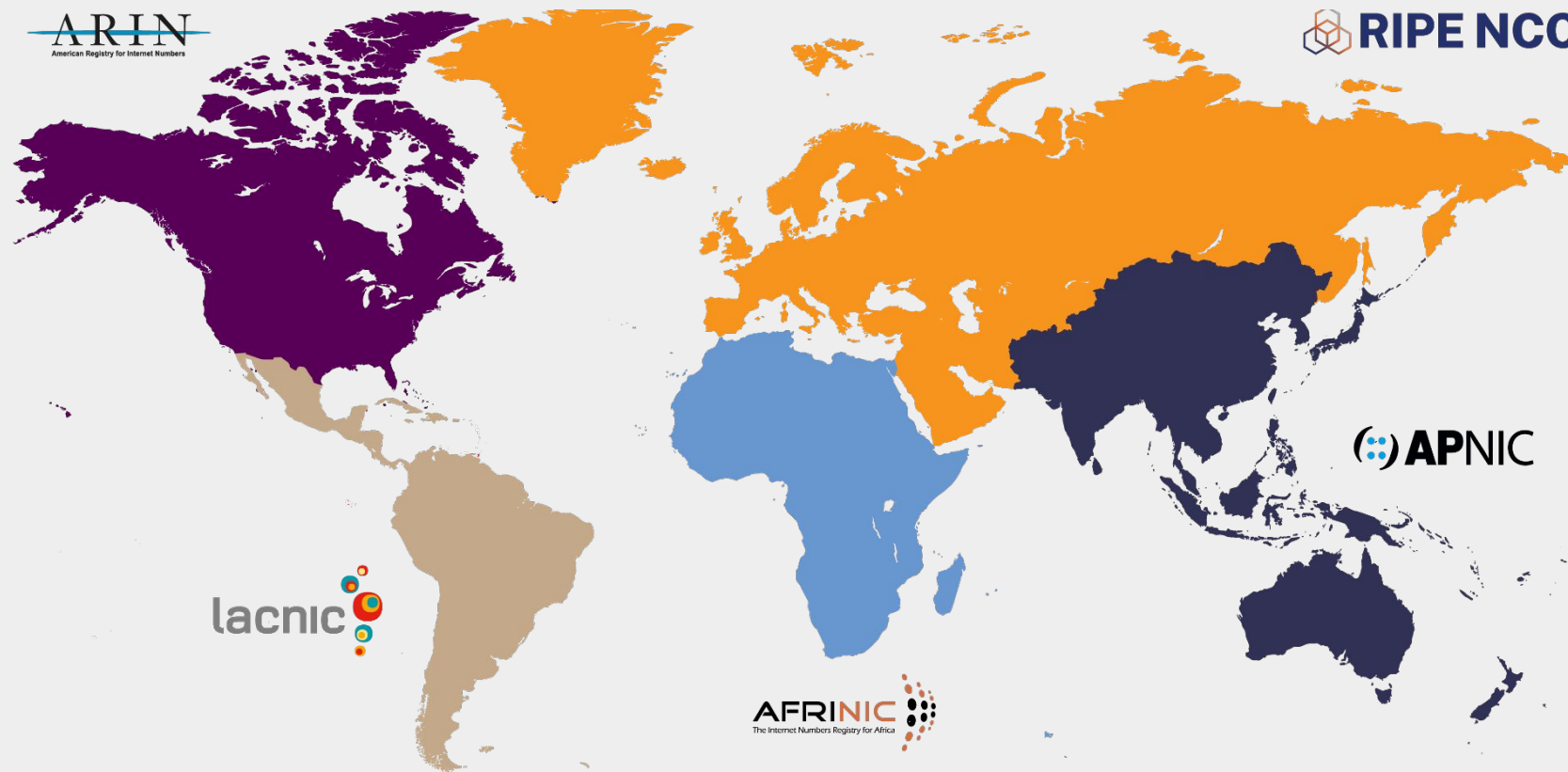
Niall O'Reilly
RIPE Vice Chair

The RIPE NCC



- One of five Regional Internet Registries in the world:
 - Allocates and registers blocks of Internet number resources to ISPs and other organisations
- Provides a number of technical services and tools
 - K-root, RIPE Atlas, RIPEstat, RIS
- Involved in public policy discussions and Internet governance

Where are the RIRs?



The RIPE NCC Executive Board



From left to right:

STANDING

- Raymond Jetten
- Harald. A Summa
- Ondřej Filip
- Sander Steffann
- Piotr Strzyżewski

SEATED

- Remco van Mook
- Maria Häll



The RIPE Policy Development Process

The RIPE Policies



- Developed by and for the RIPE community
- Specify how Internet number resources (IPv4, IPv6 addresses, AS Numbers) are distributed, managed, registered and transferred
- Apply only to the RIPE NCC service region

The RIPE Policy Development Process



- Proposals can be discussed on
 - Mailing lists / Forum / Social Media / Meetings
- Decisions based on
 - RIPE WG Mailing list discussions
- 'Rough Consensus'
 - Properly address all concerns and objections
 - Work out differences
 - **No** voting or counting
- ripe.net/participate/policies

Participate in the RIPE PDP



- Sign up for the Policy Development Process Announcements mailing list
 - ripe.net/policy-announce
- Join discussions about policy proposals
- Stay up-to-date with new policies
 - ripe.net/publications/docs/ripe-policies
- Propose a new policy





Who does what?

- The RIPE community:
 - Creates and discusses proposals
 - Seeks consensus
- RIPE Working Group (WG) chairs:
 - Accept proposals
 - Chair the discussions
 - Decide if consensus has been reached
- The RIPE NCC:
 - Acts as the secretariat to support the process
 - Publishes policy documents and implements them



CAPIF Meetings

What is CAPIF?



Central Asia Peering and Interconnection Forum

- Regional platform to promote Internet traffic exchange and improve Internet service quality in Central Asia
- Free and open to:
 - ISPs, network operators, academics, regulators and other interested parties
- Platform to:
 - Exchange technical knowledge
 - Share best practices
 - Negotiate interconnection agreements

What is CAPIF?



Key Topics

- Legislative and regulatory issues
- Regional and international connectivity opportunities
- Funding and resources for IXPs
- Hosting CDNs
- Security, stability and resilience (MANRS, RPKI)
- Internet measurement tools

What is CAPIF?



Impact

- Encourages growth of local Internet communities
- Supports local content & applications
- Promotes cost-effective local Internet exchanges
- Strengthens Internet development & connectivity in Central Asia
- Contact the team: peeringdays@ripe.net

What is CAPIF?



Past Meetings

Event	Location	Year
RIPE NCC Days	Tashkent, Uzbekistan	2022
CAPIF 1	Almaty, Kazakhstan	2022
CAPIF 2	Tashkent, Uzbekistan	2023
CAPIF 3	Bishkek, Kyrgyzstan	2024

Regional Meetings



ripe.net/see



ripe.net/capif



menog.org



- At regional meetings 30-50% of the attendees are newcomers
- We want to hear from you:
 - Come to the mic
 - Talk to us during the coffee breaks
- Why participate?
 - Engage with experts in network operations, Internet measurements, research and more
 - Build your professional network
 - Be part of a community that helped build the Internet
 - Contribute to discussions and help others learn from your experience
 - Help shape the Internet



CAPIF Programme



- Aziz Akhundjanov, Telecom X, BCC GROUP, Uzbekistan
- Bakhrom Nasirjanov, Megafon, Tajikistan
- Bijal Sanghani, Euro-IX
- Milad Afshari, co-founder of IRNOG, Iran
- Nishal Goburdhan, PCH
- Oleg Emelyanov, Founder of KZKOC, Kazakhstan
- Saber Mesgari, Arvan Cloud, Iran
- Salavat Ormoshev, Association of Internet Operators, Kyrgyzstan
- Shavkat Sabirov, Internet Association of Kazakhstan, Kazakhstan
- Yolandi Cloete, DE-CIX, Germany
- Hisham Ibrahim, RIPE NCC
- Oleksiy Semenyaka, RIPE NCC
- Vahan Hovsepyan, RIPE NCC

Before we start



Monday 22 and Tuesday 23 September | 09:00 - 18:00

Advanced IPv6 Training Course

Wednesday, 24 September | 09:00 - 18:00

IPv6 Security Training Course

- There still available slots, but might run out soon
- Separate registration is required:
ripe.net/meetings/regional-meetings/capif/capif-4/training-courses

Day 1: Thursday, 25 September



- Introduction to Peering and Peering Forums
- **Peering Personals:** Anyone can take 1-2 minutes for an announcement/introduction - see Vahan
- Official Opening: High-Level Statements and Updates
- Next Generation IPv6: Unlocking Kazakhstan's Digital Future
- **Peering Bilateral Meetings:** Participants to hold meetings between parties interested in peering; use **Swapcard** to connect with attendees and schedule meetings
- Connectivity in Central Asia and Beyond
- Measuring connectivity and pathways

Day 2: Friday, 26 September



- IXP Day: Opening and Introduction
- Space Internet: Beyond the Last Mile
- IXP Panel
- Measuring and Securing the Internet, IPv6 implementation in the region
- RIPE Community Talk
- IPv6: The Network for the AI Era

Languages and Archives



- Live interpretation in English, Russian and Farsi
- Sessions are recorded and archived
- Live streaming not available
- You can find the presentation archives at:
<https://www.ripe.net/participate/forms/apply/capif-4-presentation-archive/view>
- The session recordings will be available about two weeks after the event on the CAPIF YouTube channel:
<https://www.youtube.com/@RIPE-NCC-Regional-Meetings/playlists>

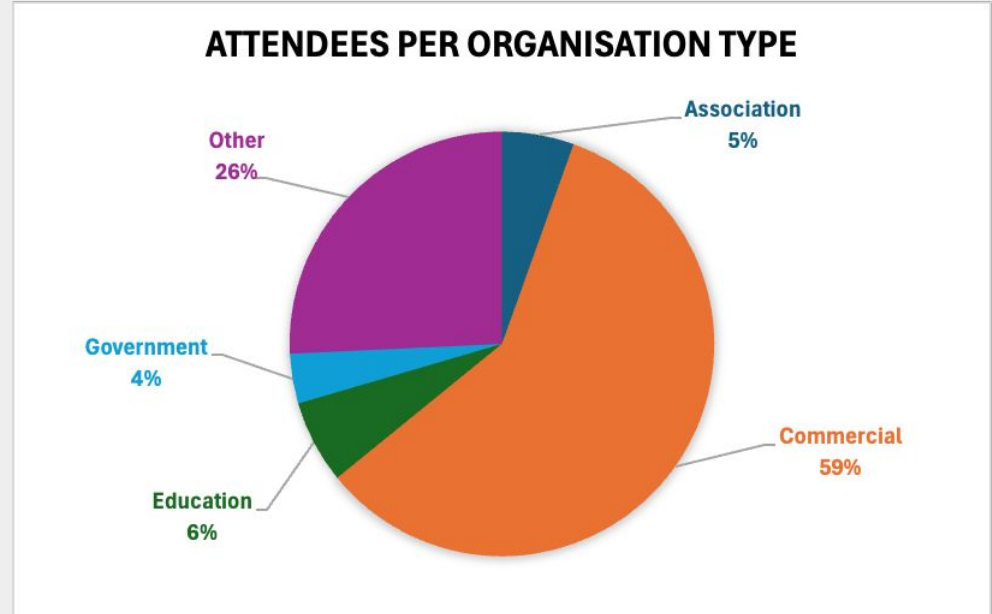


Logistics

Registration Stats



- 334 registrations
 - 166 newcomers
 - 43 members
 - 17 staff
 - 23 countries
- Check the attendee list:
ripe.net/s/capif4-attendees



RIPE NCC Staff at CAPIF 4



Hisham Ibrahim
Chief Community Officer



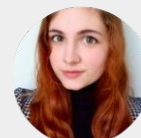
Sandra Gijzen
Events



Hafsa Bou-eddine
Events



Vahan Hovsepyan
Community Development



Kjerstin Burdick
Communications



Laura Lorenzo
Fellowship



Valentin Berman
Tech Team



Anastasiya Pak
Communications



Ani Oganessian
Communications



Olivia Mijnaals-Ruimwijk
Events and Training



Ties de Kock
Software Engineer



Mahesh Aggarwal
Software Engineer



Dmitriy Melnik
Learning & Development



Alex Semenyaka
Community Development



Tatiana Orlova
Registry Services



Rosanna Sentito
Member Services

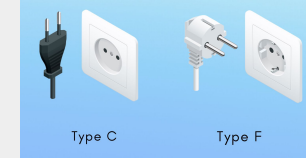


Sjoerd Oostdijk
Systems Engineer

Country and Venue



- Currency: ₸ tenge
- Electricity socket type C and F
- Dialing country code: +7
- Swissôtel Wellness Resort Alatau
- Tausamaly 50A, Almaty 050067
- Tel: +7 727 391 0101
- Free parking at venue
- Off-site options such as nearby parking lots or private garages









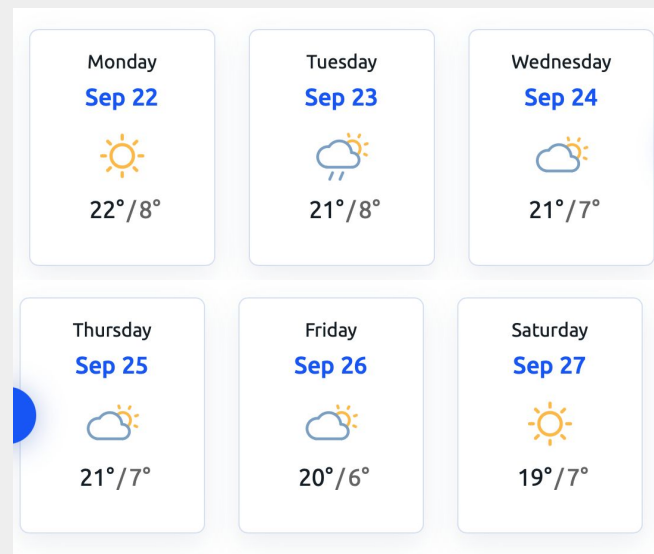
Getting to the Venue

- Yandex Go, Bolt, Maxim, Qazaq Taxi available
- From airport:
 - 30 min drive when no traffic or 1h30min+ with traffic
 - ~30km = ₸9,000 fixed rate or ₸7,000-10,000 via apps
- From Railway station:
 - ~ 25km
- From city centre
 - ~9km
- ripe.net/meetings/regional-meetings/capif/capif-4/travel-and-useful-information

About Almaty



- UTC+5 time zone
- Debit card payments are common - ask if places accept credit cards and cash
- Mostly safe, the usual big city, common sense safety rules apply
- Emergency numbers
 -  Police: 102
 -  Ambulance/Medical emergencies: 103
 -  Fire service: 101
 -  Unified emergency number: 112





Social Events

Social Events



Welcome Reception

Thursday, 25 September
18:00-19:00

Foyer Area, Swissotel

Networking Dinner

Thursday, 25 September
19:30 onwards

NurTau Restaurant

Closing Reception

Friday, 26 September
18:20-21:00

Foyer Area, Swissotel

Certified Professionals Exams at CAPIF



- Register in advance: ripe.net/meetings/regional-meetings/capif/capif-4/certified-professionals
- Prepare: <https://academy.ripe.net/>
- Slots available on a first-come, first-served basis
- ~ 60 minutes, arrive ~15 minutes prior; bring a photo ID



LIR Fundamentals

This exam certifies the ability to manage an LIR's Internet number resources as an LIR administrator.



IPv6 Fundamentals - Analyst

An IPv6 Fundamentals –Analyst is proficient in calculating IPv6 subnets according to current best practices and creating IPv6 addressing plans.



RIPE Database Associate

A RIPE Database Associate is proficient in searching for and interpreting data in the RIPE Database. Candidates who hold this certification have demonstrated the ability to update and register data in the RIPE Database.



BGP Security Associate

A BGP Security Associate can choose the appropriate security measures to protect networks against common threats. They contribute to global routing security by making Internet routing more secure and reliable.



IPv6 Security Expert

An IPv6 Security Expert is capable of designing a high-level strategy to protect an IPv6 network against common threats. A holder of this badge has demonstrated the ability to identify and analyse common IPv6 security threats and their impact, and create a plan to counter them.

To Do: Set Your Personal Goals



- Get to know the RIPE Chair, the RIPE NCC Executive Board
- Read about the RIPE NCC Policy Development Process (PDP)
- Make a list of your goals for the event
- Which sessions interest you? Check the agenda.
- Who would you like to connect with? Check the attendee list.
Activate Swapcard
- Plan your trip
- Register in advance if you want to take a RIPE NCC Certified Professionals exam



Newcomers' Survey

Please help us improve the meeting.
Fill this in by **22 September**



THANK YOU FOR JOINING US



gpetrova@ripe.net

peeringdays@ripe.net