

BEREC Summary Report on the status of internet capacity in light of the Covid-19 crisis

In a joint statement with the European Commission on 19 March 2020 on how network operators can cope with the increased demand on network capacity, BEREC committed to setting up a special reporting mechanism to ensure regular monitoring of the Internet traffic situation in each Member State in order to be able to respond swiftly to capacity issues.

This report summarises the main findings of the ongoing, twice-weekly information gathering exercise, and includes the most recent data provided to BEREC by its constituent NRAs as of 14 April 2020. 31¹ national regulatory authorities (NRAs) have shared their data about the impact of the crisis on the telecommunications' networks and the actions taken so far.

18 NRAs² have reported no changes since the previous information gathering exercise (as of 7 April 2020). The status report will be continuously updated based on regular input from the NRAs, with the next summary report to be issued on 17 April 2020.

Key updates since previous report

- In PT, there is an agreement between the government and telecom operators for the allocation of “communication benefits” to professionals from the National Health Service dedicated to the treatment of patients with Covid-19. Those benefits will include 10,000 voice minutes for national fixed and mobile networks, 10,000 SMS for national mobile networks and 10GB of data;
- In BG a “Coordination Centre for Operational Interaction” has been set up to support the measures of the national government and to provide additional opportunities for citizens to use mobile and postal services;
- In PL, data caps have been increased and invoice payment due dates have been extended for the elderly. In addition, in PL, the NRA has produced a video on how to use telecommunications services responsibly during the Covid-19 outbreak;
- In NL, fixed networks have engaged in capacity expansions and traffic (re)balancing.

Status of network capacity

¹ The following NRAs have contributed so far to the information gathering exercises: AL, AT, BE, BG, CH, CY, CZ, DE, DK, EE, EL, ES, FI, FR, HR, HU, IE, IT, LV, LT, LU, ME, MT, NL, NO, PL, PT, RO, SI, SK, SE.

² NRAs from the following Member States having either mentioned that there are no changes or not provided an update since the previous iteration of the report: AL, BE, CH, CZ, DE, DK, EE, EL, ES, FI, HR, IE, LT, LU, LV, NO, SI, SK

Generally, overall traffic on fixed and mobile networks has increased during the Covid-19 crisis, but no major congestion issues have occurred. For more than one week, more and more NRAs (AL, BE, BG, DE, ES, FR, HU, LT, LU, MT, NL, PL, PT and SK) are reporting a stabilisation in overall traffic. One NRA (CY) reported a mobile network data volume increase by 16% compared to last week of March.

One NRA (BG) has reported that the interconnection traffic significantly decreased compared to the peak week in March 2020, however it is still slightly higher compared to April 2019.

Following Commissioner Breton's initiative, measures had been applied throughout Europe by some of the larger content providers, such as Netflix, YouTube, Amazon Prime and Facebook. Aside from this, three NRAs (FR, HU, IT) explicitly stated that content and application providers are limiting the bitrate transmission of their streaming services. Additionally, three NRAs observe the effects of the applied measures on traffic resulting in the stabilisation of traffic (AL, FR, NL). In France, the Disney streaming video platform was launched on 7 April, which has a limited transmission bitrate for delivered contents.

Regulatory actions taken

NRAs are monitoring the situation and are regularly collecting data from the ISPs and other market players about the status of their networks. The frequency of collecting data ranges from once (DE, ES, HR, ME) per day to once (BG, CY, DE, EL, LT, IT, SI), twice (FR, PL) or three (BE, LU) times a week.. One NRA (RO) reported that because of a relatively stable situation, ISPs are requested to report overall information once every fortnight. However, any major incidents must be reported as soon as possible. One NRA (MT) has reported that they have reduced the ISPs' reporting frequency from three times a week to once a week, while another NRA (ME) has reported that the reporting frequency has been reduced from daily updates to once weekly updates.

Besides the periodical reporting, ISPs are also asked to immediately notify the NRAs about any exceptional measure that are put in place. This is particularly relevant for the application of any exceptional traffic management measure and some NRAs (AT, DE HR, DK, FI, IT, LV, LT, PL, SI, SK) have informed the market players about the available exception for traffic management during congestion in Article 3(3) c) of Regulation (EU) 2015/2120 as well as about their duties in such an event.

Currently, only one NRA (BE) has assessed the compliance of the measures taken by the ISPs with Article 3(3) of Regulation (EU) 2015/2120. Six NRAs (BG, DE, FR, IT, LU and RO) have explicitly reported that they are in close dialogue with their ISPs, allowing the NRA to be immediately notified if special measures need to be taken. Similar to this, one NRA (HU) has mentioned that they are closely monitoring the situation, but that there has been no need to take any decisions so far. Another NRA (EL) has advised their ISPs to first consult with the Authority before taking any measures and yet another NRA (CH) has reported receiving information from an ISP about measures implemented for resolving traffic management problems.

One NRA (IT) adopted a first package of measures aimed at tackling the increase in the consumption of electronic communications services and of the traffic on the networks and

required operators to make every effort to manage and overcome the state of emergency. The same NRA has published a request for information on its website to set up a traffic monitoring mechanism through which to ensure a follow-up on the evolution of traffic and end-user experience. Two NRAs (AL, SI) reported that there has been no need so far for ISPs to change any traffic management practices, but ISPs are prepared to do so if need be (further elaborated under *Actions taken and communication by operators*).

One NRA (IE) proposed a mechanism for a temporary assignment of specific frequency spectrum bands as a measure to increase capacity for mobile networks.

In the case of CY, the NRA will evaluate the ISPs' data and determine if any further measures are required.

Actions taken and communication by operators

In some Member States, operators have implemented customer-friendly measures such as:

- increasing the amount of mobile data in the subscriptions for a limited period without any additional charge (AL, AT, BE, BG, CZ, DE, EE, EL, ES, FR, HU, HR, IT, ME, PL, PT, RO, SK, SI);
- zero-rating temporarily additional services or offering services free of charge, such as educational content and platforms (AL, BG, EL, HR, HU, MT) or official websites dedicated to information related to Covid-19 (CZ);
- capacity expansions and traffic (re)balancing, mainly on fixed networks (NL);
- increased data caps and extended invoice payment due date for the elderly (PL);
- increasing the bandwidth once the data cap is reached on mobile services (FR);
- increasing the upload speed to facilitate studying and working from home (ME);
- offering some TV content free of charge (AL, BG, EL, FR, HR, IT, LT, ME, MT, PT, SI);
- providing free mobile bundles comprising of free data and minutes to front line staff in the public health care sector and enforcement agencies (MT)
- distributing useful information to their customers by using different channels, such as updates on their websites, newsletters, press releases or SMS (AL, BE, BG, DE, ES, HR, DK, EL, FR, HU, IE, IT, LT, LU, LV, ME, MT, NL, NO, PL, PT, RO, SK, SI);
- offering their services online due to closed retail shops (AL, LT) or having a limited number of shops opened (BE, BG);
- allowing online payment settlements (AL, BG, IT, ME) .

One NRA (PT) reported a collaboration agreement between the government and telecom operators for the allocation of “communication benefits” to professionals from the National Health Service dedicated to the treatment of patients with Covid-19. Those benefits will include 10,000 voice minutes for national fixed and mobile networks, 10,000 SMS for national mobile networks and 10GB of data.

Although no EU Member State has faced a major traffic collapse (as explained in the section *Status on the network capacity*), some operators have increased their network's capacity (EL, IT, LT, LV, ME, MT, NL, PT and SI) to cope with the sustained traffic growth. In the case of some Member States, these network upgrades cover the links to the national exchange point (HU, IT and SI) or to the international exchange point (ME). One NRA (IE) reported that operators re-assigned network resources to deal with capacity issues. In CY, the ISPs have upgraded the speeds provided to their subscribers.

Other operators have not taken any such measures but they are closely monitoring their network's capacity (as explicitly reported by EE, FR, HU, HR, LU, LV, MT, PT and RO) to check if an increase in network capacity is necessary.

If need be, some ISPs have plans to stream VoD or CUTV in SD resolution (SI) or to allow a smooth and swift resolution with minimal throttling (AL).

In RO, an association of mobile network operators requested the NRA to take into account an ease of the application of the Regulation (EU) 2015/2120 during the national state of emergency, such as for addressing congestions or for delaying the transposition of the EECC.

Further communication towards end-users

Some entities³ (NRAs, governments or ISPs) have advised their end-users a reasonable use of the internet access services. One NRA (PL) reported that they have produced a video on how to use telecommunications services responsibly during the Covid-19 outbreak. One NRA (BG) has set up a "Coordination Centre for Operational Interaction" to support the measures of the national government and to provide additional opportunities for citizens to use mobile and postal services. One NRA (FR) informed that they have released an updated version of their guidance to teleworkers. Additionally, three NRAs (AL, PT and SI) reported that they warned end-users about an increase in fraud and in cyberattacks related to the current crisis. One NRA (LT) issued guidance for operators on guaranteeing uninterrupted provision of e-communications services as well as recommendations for schools, teachers, and students on how to organize remote learning processes smoothly in order to avoid a "breakdown" of electronic communications networks. Additionally, as all official schooling has been transferred on the Internet, one NRA (LT) drafted and published two sets of recommendations – one for teachers, and one for parents – how to ensure children's' safety during online learning process.

3 AL, AT, BG, CH, ES, FR, IT, PO, PT, RO