European Parliament
2019-2024

Committee on Petitions

8.6.2021

NOTICE TO MEMBERS

Subject: Petition No 0698/2020 by Francisco Javier González Martin (Spanish) on a moratorium on the implementation of 5G technologies

1. Summary of petition

The petitioner calls for a moratorium on the deployment of 5G technology until scientific reports prove no risks to humans of5G technology. He calls for the prevention thresholds for indoor EMF exposure to be reduced to 0.2 V/M.

2. Admissibility

Declared admissible on 30 September 2020. Information requested from Commission under Rule 227(6).

3. **Commission reply**, received on 8 June 2021

'The Commission would like to thank the petitioner for expressing his views regarding the deployment of 5G[1].

When balancing potential risks and the benefits of 5G to society and economy, the whole range of promising applications should be considered. These include not only, for example, the Internet of Things or automotive driving, but also a plethora of new perspectives in the area of public health, such as remote surgery, monitoring of patients, handling of big data to help with new treatments and diagnostics as well as the protection of the environment. In this context, the Commission believes that 5G is crucial for the EU's economic recovery and long-term prosperity, especially in this period where digital technologies are extremely valuable in keeping the EU economy and health systems operational. The digital transition is at the centre

[1] 5G = The fifth generation technology standard for broadband cellular networks.

of the economic recovery plans after the COVID-19 crisis.

The protection of public health is of paramount importance and the Commission takes it as an utmost priority in all its proposals and initiatives, including on 5G mobile communications technology. Protection with regard to exposure to electromagnetic fields (EMF) is based on Council Recommendation 1999/519/EEC[2]. That Recommendation foresees at the European level strict limits for exposure of the public to EMF following a precautionary approach in line with the guidelines of the International Commission on Non-Ionizing Radiation Protection (ICNIRP). These limits are, for example, currently 50 times lower for the general public than the levels that have been identified, based on scientific assessment, to have an effect on health. These cover all wireless/mobile technologies.

The ICNIRP guidelines have been under evaluation in consideration of technological evolution and were slightly modified in March 2020, in order to take into account the latest 5G technology evolution. The Commission is currently assessing whether an update of the above-mentioned Council Recommendation is therefore necessary. This is done in collaboration with the Scientific Committee on Health, Environmental and Emerging Risks[3], and, if needed, with the Scientific Advice Mechanism[4]. This will include an in-depth review of the scientific evidence currently available.

The Commission, in addition to risk assessment and research projects[5], has recently funded an independent 'Study on using millimetre waves bands for the deployment of the 5G ecosystem in the Union'. The report, which is publicly available[6], concludes that the shift to 5G and small cells is likely to cause only a very modest increase in exposure of the population. This important finding is broadly in line with measurements conducted by the French National Frequency Agency, which found an increase in exposure to electromagnetic fields associated with the move to small cells of only 0.1 volt per metre (V/m) to a maximum of 0.5% of the limit recommended by the International Commission. These results are also confirmed by studies undertaken by the Australian Radiation Protection and Nuclear Safety Agency.

These experimental measurements have shown that even if in a 5G setting mobile communication is operated at maximum level of capacity, the level of exposure of the test persons only reaches a tiny fraction of the recommended maximum exposure levels. The Commission will keep abreast of future developments in view of safeguarding the health of the European citizens at the highest level possible and in line with its mandate.

Halting the distribution of 5G products would be a disproportionate measure based on the available scientific evidence. It needs to be taken into account how this new technology will be applied and how the scientific evidence will evolve. In addition, it is scientifically impossible to carry out meaningful epidemiological studies at this stage since 5G is not yet

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[2] 1999/519/EC: Council Recommendation of 12 July 1999 on the limitation of exposure of the general public to electromagnetic fields (0 Hz to 300 GHz), *OJ L 199, 30.7.1999, p. 59–70.*

[3] https://ec.europa.eu/health/scientific_committees/scheer_en

[4] https://ec.europa.eu/research/sam/index.cfm?pg=about

[5] The Commission so far has supported risk assessment and has invested EUR 49 million on research projects on electromagnetic fields through its Framework Programmes of Research and Innovation. The Health cluster of the new Horizon Europe programme is expected to support research on potential health risks of emerging technologies and digitalisation. Currently, there is work ongoing to support a study that will look at any potential links between electromagnetic fields of mobile phone networks and cancer.

[6] https://op.europa.eu/en/publication-detail/-/publication/68f2074c-af4f-11e9-9d01-01aa75ed71a1/language-en

widely put in place.

Conclusion

The Commission will keep abreast of future developments in view of safeguarding the health of European citizens at the highest level possible and in line with its mandate.’