



EUROCITIES RESPONSE TO THE EUROPEAN COMMISSION REPORT ON THE IMPLEMENTATION OF THE ENVIRONMENTAL NOISE DIRECTIVE

Cities continuously strive to improve the quality of life and health of their citizens. We have long worked on reducing environmental noise, and are committed to further improvement. The Environmental Noise Directive (END)¹ has been crucial in assessing the extent of noise burden all over Europe. As EUROCITIES, the network of major European cities, we welcome many of the conclusions and proposals in the Commission report on the implementation of the END². However, we would like to add some suggestions with a view to a possible review of the directive.

Effective source policies

Similar to air quality policy, noise policy can only be successful if noise is reduced at its source. The coordination between the END and other EU directives on noise sources such as vehicles, airplanes, rolling stock and machinery should be strengthened, and source policies must become more effective. It is particularly important that noise limits for lorries, two-wheelers, passenger cars and vans as well as for the tyres of these vehicles, are strengthened and that test cycles reflect real-world driving conditions³. The International Council of Academies of Engineering and Technological Sciences (CAETS) has confirmed that measures at source lead to the highest overall noise reduction⁴. This is all the more important as motorised road traffic will grow in the EU27 over coming decades. Parliament and Council should consider this in the current negotiation of the regulation on the sound level of motor vehicles⁵.

No binding noise limit values should be imposed on member states until source policies, in particular on vehicle noise, are strengthened and revisions of source policies have proven their effectiveness. As we see in the case of EU air quality legislation, binding limit values for member states without effective source policies are neither cost-efficient nor do they lead to the desired results.

Improving implementation

We would like to see fewer delays in implementing the directive, in particular when it comes to reporting on implementation, publishing noise maps and noise action plans and noise action planning. More realistic two year deadlines for noise action plans, after the publication of noise maps, would help to ensure timely delivery.

¹ Directive 2002/49/EC of the European Parliament and of the Council of 25 June 2002 relating to the assessment and management of environmental noise (abbreviated END)

² (COM (2011) 321 final)

³ EUROCITIES response to the Green Paper on Urban Mobility, 2008, <http://bit.ly/KA4NSp>

EUROCITIES Working Group Noise Evaluation of the Environmental Noise Directive, 02/49/EC, 2009, <http://bit.ly/LMOpOq>

Letter from the International Council of Academies of Engineering and Technological Sciences (CAETS) to Directorate General Enterprise and Industry, 5 June 2011, www.caets.org/?ID=10463

⁴ Letter from CAETS to Directorate General Enterprise and Industry, 5 June 2011, www.caets.org/?ID=10463

⁵ Also see the EUROCITIES statement on the planned regulation on motor vehicle noise, <http://bit.ly/LOqDku>

Depending on their individual noise situation and needs, cities should be free to use a simple noise propagation model and/or more complex assessments. While a simple noise propagation model should be sufficient to produce the strategic noise maps foreseen in the directive, more complex noise assessment methods can be useful in specific cases, such as for improving the situation at noise hotspots. The new harmonised method for assessing noise developed in the CNOSSOS project should improve comparability of data through a mandatory noise calculation method, rules for modelling, requirements regarding input data and accreditation or benchmarking of commercial software.

The EU should not lower noise level reporting bands but leave it up to local authorities to use lower bands in addition to their existing reporting obligations where it is appropriate, as lowering reporting bands would not be useful for all cities. However, lower bands always mean higher costs, as more areas are concerned by the respective lower noise levels and would therefore need to be inventorised for the reporting.

Quiet and grey areas

Quiet areas should be defined more precisely and feature more prominently in the END. While green, quiet areas are particularly beneficial for health, wellbeing and liveability, they also provide added value in other policy areas. For instance, they can help adaptation to climate change by absorbing water during heavy rainfall and by reducing urban heat island effects. The results of the LIFE+ project QUADMAP⁶ will provide a guideline for managing quiet areas as defined in the END. This guideline will be published in 2014 and could also be useful for further policy development on quiet areas.

While the END tackles black areas or hotspots with high noise levels and quiet areas, future work on noise should pay greater attention to grey areas⁷ with intermediate noise levels. Otherwise there is a risk that severe noise pollution identified in black areas could shift to grey areas instead of being removed. Access restrictions have already had this effect in some cases., Authorities responsible for noise should be required to set exposure limit values to avoid such a displacement of noise. This would mean that no more than a certain number of people or a certain percentage of the population would be affected by excessive noise.

Integration of air quality and noise management

We welcome the idea of exploring closer coordination and integration of air quality and noise management. Cities are already working on this, and we would like to be involved in further reflections on the issue at EU level.

Health effects

Surveys and publications over the last five to ten years have shown that the dose response curves to assess health effects of different levels of noise need to be updated⁸. We also recommend that these dose response curves are not used as a tool to determine the absolute number of annoyed or sleep disturbed people but as a tool for comparisons. Dose response

⁶ <http://pages.quadmap.eu/>

⁷ European Commission, Green Paper on Future Noise Policy (COM(96) 540)

⁸ Henk Wolfert, Noise and Health in the Greater Rotterdam Area, ICBEN, London 2011

Van Wijk AM et al., Noise health and money, MSR report Greater Rotterdam Area, 2008

Working Group 2 Dose/Effect (formed by the European Commission), Position paper on dose response relationships between transportation noise and annoyance, 2002, bit.ly/LZptCE

Working Group 1, Indicators (formed by the European Commission), Position paper on European Noise Indicators, EU 2002, bit.ly/LMWwdN

European Commission Working Group on Health and Socio-Economic Aspects, Position Paper on Dose Effect Relationships Nighttime Noise, 2004, bit.ly/JwdEOC

H. Miedema and H.Vos, Exposure-response relationships for transportation noise

Prof. Dr. Kerstin Giering, Lärmwirkungen, Dosis-Wirkungsrelationen, UBA 2010

curves always have a certain level of uncertainty for reasons of data availability, assumptions made, conversions done, cut-off point used, scalability and more. Using the dose response curves only for comparisons is a sensible way of acknowledging this uncertainty while still using the valuable information the curves can provide.

Noise indicators

The Commission report mentions that Member States are free to use additional noise indicators other than the EU noise indicators for short events with high noise levels. Member States should use these additional indicators as recent studies⁹ show that short term events with high noise levels have significant effects on sleep disturbance during the night.

Points for investigation and discussion

We find the proposals in the Commission report on trigger or target values and enforcement very interesting and we would like to contribute to further exploring them.

The Commission should also consider the following points in more depth:

- Noise action plans should be SMART¹⁰.
- The Good Practice Guide on Noise Mapping¹¹ could be improved, for instance by including the recommendations of the NOMEp report¹², and it should also cover cross border noise pollution.
- It would be useful to produce not only noise maps on the current situation, as required by the END, but also to produce noise maps based on modelling, which would show the effects of measures on noise and of autonomous transport growth but also of other developments like densification, urbanisation, individualisation and more.
- Military sites should be included in the END because they can cause severe annoyance and sleep disturbance in surrounding areas.

⁹ Prof.Dr.B. Griefahn et al, *Autonomous arousals related to traffic noise during sleep*, 2008

Gunn Marit Aasvang et al., *Self-reported sleep disturbance due to railway noise; Exposure response relationships for nighttime equivalent and maximum noise levels*, JASA 2008;

Night Noise Guidelines, WHO 2009, ISBN 978 92 890 4173 7

¹⁰ Specific Measurable Attainable Reportable Timely

¹¹ European Commission Working Group Assessment of Exposure to Noise (WG-AEN): *Position Paper Good Practice Guide on Strategic Noise Mapping and the production of associated data on Noise Exposure*, 2006

¹² *Port Area Noise Mapping and Management*, Life project NOMEPorts, <http://nomeports.ecoport.com>