



COMMISSION OF THE EUROPEAN COMMUNITIES

Brussels, 01.04.2009
COM(2009)156 final

**REPORT FROM THE COMMISSION TO THE EUROPEAN PARLIAMENT AND
THE COUNCIL**

**in accordance with article 18.3 of the Water Framework Directive 2000/60/EC on
programmes for monitoring of water status**

[SEC(2009)415]

REPORT FROM THE COMMISSION TO THE EUROPEAN PARLIAMENT AND THE COUNCIL

in accordance with article 18.3 of the Water Framework Directive 2000/60/EC on programmes for monitoring of water status

1. INTRODUCTION

The EU Water Framework Directive (WFD)¹, adopted in 2000, laid the foundation for a modern, holistic and ambitious water policy for the European Union and defined a clear implementation calendar to achieve its objectives, with intermediate deadlines for the achievement of specific tasks, among them:

1. December 2003: transposition of the WFD into national law (article 24), identification of river basin districts and set up of administrative arrangements (article 3)
2. December 2004: pressure and impact analysis of river basin districts, and economic analysis of water uses (article 5)
3. December 2006: establishment of the monitoring programmes for the assessment of water status (article 8)
4. December 2008: publication of the draft river basin management plans for consultation (article 14)
5. December 2009: adoption of the river basin management plans (article 13)
6. December 2012: programme of measures operational at the latest (article 11)
7. December 2015: achievement of good status for surface and groundwater (article 4) and first update of the river basin management plan

The Communication from the Commission to the European Parliament and the Council “Towards sustainable water management in the European Union - First stage in the implementation of the Water Framework Directive 2000/60/EC” and the accompanying Staff Working Document² gave, in March 2007, an overview of the aims of the Directive and summarised the results of the implementation of the first two steps identified above.

This Report and the accompanying Commission Staff Working Document³ responds to WFD Article 18(3) which requires the Commission to publish a report on the progress of implementation of the WFD related to Article 8 on monitoring of water status. This report is based on the information submitted by Member States in accordance with WFD article 15(2), due on 22 March 2007.

2. MONITORING REQUIREMENTS OF THE WATER FRAMEWORK DIRECTIVE

The environmental objectives laid down in Article 4(1) WFD require Member States to prevent deterioration of the status of all bodies of surface water and groundwater and to achieve good status as a rule by 2015. In addition, pollution from priority substances has to

¹ Directive 2000/60/EC, OJ L327 of 22.12.2000, as amended

² COM(2007)128 final and the accompanying document SEC(2007) 362

³ SEC(2009)415

progressively be reduced, emissions of hazardous substances shall be ceased or phased out, and any significant upward trend in pollution in groundwater has also to be reversed by appropriate measures.

In accordance with Article 8(1) WFD Member States have to establish monitoring programmes for the assessment of the status of surface water and of groundwater in order to establish a coherent and comprehensive overview of water status within each river basin district. These requirements include monitoring of protected areas as far as the status of surface water or groundwater is concerned. Based on Article 8(2) WFD the monitoring programmes were to be operational by 22 December 2006. The results of monitoring will play a key role in determining whether the water bodies are in good status and what measures need to be included in the river basin management plans in order to reach good status as a rule by 2015. Precise and reliable monitoring results are therefore a prerequisite for sound planning of investments in the programme of measures.

This report and its accompanying Commission Staff Working Document present the results of the analysis of the information on WFD monitoring programmes received from the Member States.

3. METHODOLOGY FOR THE COMPLIANCE CHECK

The Commission has carried out an analysis of the information received with the help of a number of compliance indicators. The methodological approach and the detailed results of the analysis are described in the accompanying Commission Staff Working Document.

4. FACTS AND FIGURES ON MEMBER STATES' MONITORING PROGRAMMES

The monitoring reports of the Member States show that there are around 57,000 monitoring stations established for WFD monitoring on surface waters and around 51,000 for groundwater. On surface waters, by far the largest number of monitoring stations is located on rivers, followed by equally high numbers for lakes and coastal waters.

For surface waters, more than 26,000 monitoring stations serve the purpose of surveillance monitoring and more than 41,000 for operational monitoring of ecological and/or chemical status. For groundwater, there are about 31,000 stations for surveillance monitoring of chemical status, about 20,000 stations for operational monitoring, as well as almost 30,000 monitoring stations for groundwater level monitoring.

A view across EU27 shows the highest number of monitoring stations in the United Kingdom (12,807 stations), Italy (8,311 stations), Germany (6,688 stations) and Denmark (6,085 stations). When standardising these numbers per 1,000 km² area, the United Kingdom (52 stations) and Ireland (44 stations) show by far the highest density of monitoring stations, whereas the Nordic countries such as Finland (less than 1 station) and Sweden (5 stations) show very low numbers. The numbers vary largely between Member States. This is in part related to differences in natural characteristics, in population densities, in water uses as well as the exerted pressures, but different concepts in the design of the monitoring programmes, e.g. in the selection of the monitoring stations have influenced these numbers as well. The technical assessment carried out by the Commission has identified a number of gaps and deficiencies in the design of the monitoring programmes which are summarised below.

5. CONCLUSIONS

5.1. Reporting

All Member States have reported on the establishment of monitoring programmes in accordance with Article 8 and Annex V WFD, with the exception of Greece which has not reported and Malta, which has not reported on surface water monitoring programmes. In addition, gaps were detected in individual river basin districts or individual water categories.

For the first time ever, Member States have reported electronically through WISE, the Water Information System for Europe⁴. The electronic submission of reports through WISE has proven to be successful with a total of 24 Member States having reported through this channel to date. WISE provides for a more effective and streamlined reporting and is already bringing benefits in terms of avoiding double reporting of monitoring stations.

However, there are still some improvements needed to ensure that the reports submitted are clear and comprehensive. Clear and comprehensive reporting is a pre-requisite to enable the Commission to carry out a proper analysis of the implementation. Good practice examples of clear reporting include the reports of Austria, the Czech Republic, Hungary and the Netherlands.

5.2. Monitoring

In general terms, there is a good monitoring effort across the European Union. More than 107,000 monitoring stations were reported for monitoring of surface water and groundwater under the Water Framework Directive. On surface waters, by far the largest number of monitoring stations is located on rivers (75%), followed by lakes (13%), coastal waters (10%) and transitional waters (2%).

In general, it appears that the provisions of Annex V to the WFD and the existing guidance documents on monitoring of surface water and groundwater have been applied, although there is room for improvement in some Member States to improve the understanding and application of the basic concepts of surveillance, operational and investigative monitoring.

The reports from Austria, Czech Republic and Hungary can be cited as examples of good practice, showing a clear approach to the development of WFD monitoring programmes. In addition, the reports from Ireland and the United Kingdom show a significant monitoring effort to ensure confidence in the monitoring results. Finally, the efforts of the countries joining the EU 2007 should also be acknowledged. Whilst the development of methods to assess ecological status is far from being completed in Bulgaria and Romania, the monitoring programmes have been established in accordance with the concepts of the WFD and, particularly in Romania, provide for comprehensive monitoring.

One of the key elements of the WFD is that it sets a framework to take into account all pressures and impacts in the aquatic environment and integrates the requirements of other key existing EU water legislation as minimum basic measures. The WFD requires specific monitoring of protected areas, in particular in water bodies used for the abstraction of drinking water and in water dependent habitat and species protection areas. However, in many cases these specific requirements have not been clearly incorporated into the WFD monitoring programmes. The programmes adopted in Ireland can be cited as a positive example of an approach to meet these requirements through specific monitoring sub-nets. The integration of monitoring requirements from other Directives into the monitoring programmes under the

⁴ See <http://water.europa.eu/>

WFD should bring benefits for planning and allocating resources for monitoring more efficiently.

Despite international coordination mechanisms being in place in many international river basin districts only a few Member States such as Germany, Ireland, the Netherlands, Romania and United Kingdom have reported using them in establishing their monitoring programmes. In order to ensure a targeted and sound planning of the programme of measures in international river basin districts, Member States need to coordinate monitoring programmes within the river basin district in order to provide an integrated assessment of the existing pressures and impacts.

The main aim of monitoring is to assess the status of water with the assessment of ecological status of surface waters being of central importance. As has already been seen in the intercalibration exercise⁵, there remain quite a number of gaps in the development of biological assessment methods for determining ecological status. The analysis of the information provided on monitoring programmes shows that there are still many river basin districts where the necessary assessment methods for biological quality elements are not yet in place. This is particularly true in the countries that joined the EU in 2004 and 2007. It is very important that Member States conclude the development of their national methods and continue the work on intercalibration to finalise the exercise by 2011 as agreed by the Water Framework Directive Committee (Intercalibration Work Programme 2008-2011). There are several research programmes on-going which are expected to bring valuable information for the completion of the intercalibration exercise, one of the main ones being WISER⁶.

Little information was delivered on the levels of confidence and precision of the overall monitoring programmes and in particular of the assessment methods for ecological status. It is therefore difficult to assess whether the monitoring programmes will deliver a sufficient level of confidence and precision for the purpose of providing a coherent and comprehensive overview of the status of water bodies across the river basin districts and to inform the decision making in relation to the programme of measures. The river basin management plans due at the end of 2009 will provide the whole picture of the river basin districts in terms of pressures, impacts, status assessment and measures and this will enable the Commission to assess comprehensively the results delivered by the monitoring programmes.

⁵ See Commission Decision 2008/915/EC of 30 October 2008 establishing, pursuant to Directive 2000/60/EC of the European Parliament and of the Council, the values of the Member State monitoring system classifications as a result of the intercalibration exercise, available at <http://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:L:2008:332:0020:0044:EN:PDF>

⁶ <http://www.wiser.eu>