

Bathing water results 2008 – Ireland

1. Introduction

This report gives a general overview of bathing water quality in Ireland during the 2008 bathing season.

Ireland reported 5 parameters under the Directive 76/160/EEC (1 Total coliforms, 2 Faecal coliforms, 8 Mineral oils, 9 Surface-active substances reacting with methylene blue, 10 Phenols (phenol indices)).

The parameters to be taken into account for assessment according to the assessment rules of the Directive 76/160/EEC are microbiological (1 Total coliforms, 2 Faecal coliforms) and physico-chemical (8 Mineral oils, 9 Surface-active substances reacting with methylene blue, 10 Phenols (phenol indices)).

The bathing waters are classified in the following categories:

- Compliant with mandatory values of the Directive for the 5 parameters (class CI)
- Compliant with mandatory and more stringent guide values of the Directive for the 5 parameters (class CG)
- Not compliant with mandatory values of the Directive for the 5 parameters (class NC)
- Banned (temporarily closed) or closed throughout the season (class B)

2. Length of bathing season and number of bathing waters

For all bathing areas the season lasted 3.5 months, from 16 May to 31 August 2008.

A total of 131 bathing waters were monitored in Ireland during the 2008 bathing season, of which 122 were coastal bathing waters and 9 freshwater bathing waters on lakes.

With 131 bathing waters Ireland accounts for about 0.6% of the reported bathing waters of the European Union.

The evolution of the reported number of bathing waters since monitoring of the water quality began under the Directive 76/160/EEC is presented in Table 1. The number of coastal bathing waters since the start of the reporting increased significantly from 65 in 1991 to 122 in 2001. Since then, the number of coastal bathing waters has remained the same. At the beginning of reporting in 1992, there were five freshwater bathing waters. The number of freshwater bathing waters increased to nine in 1994 and remained the same afterwards.

3. Results of bathing water quality

The results of the bathing water quality in Ireland for the period 1991-2007 as reported in 2008 report and for the bathing season of 2008 are presented in Figure 1.

The graphs show, for coastal and freshwater bathing waters separately:

- The percentage of bathing waters that comply with the guide values (class CG, blue line)
- The percentage of bathing waters that comply with the mandatory values (class CI, green line)
- The percentage of bathing waters that do not comply with the mandatory values (class NC, red line)
- The percentage of bathing waters that are banned (temporarily closed) or closed throughout the season (class B, grey line)

Table 1 and Table 2 show the same information in absolute numbers and in percentages, separately for coastal and freshwater bathing waters. Table 3 shows the bathing water quality results for 2008 season in Ireland for all bathing waters.

Map 1 shows the location of the reported bathing waters in Ireland. The location of the bathing waters is based on the geographic coordinates reported by the Irish authorities.

Figure 1: Results of bathing water quality in Ireland from 1991 to 2008

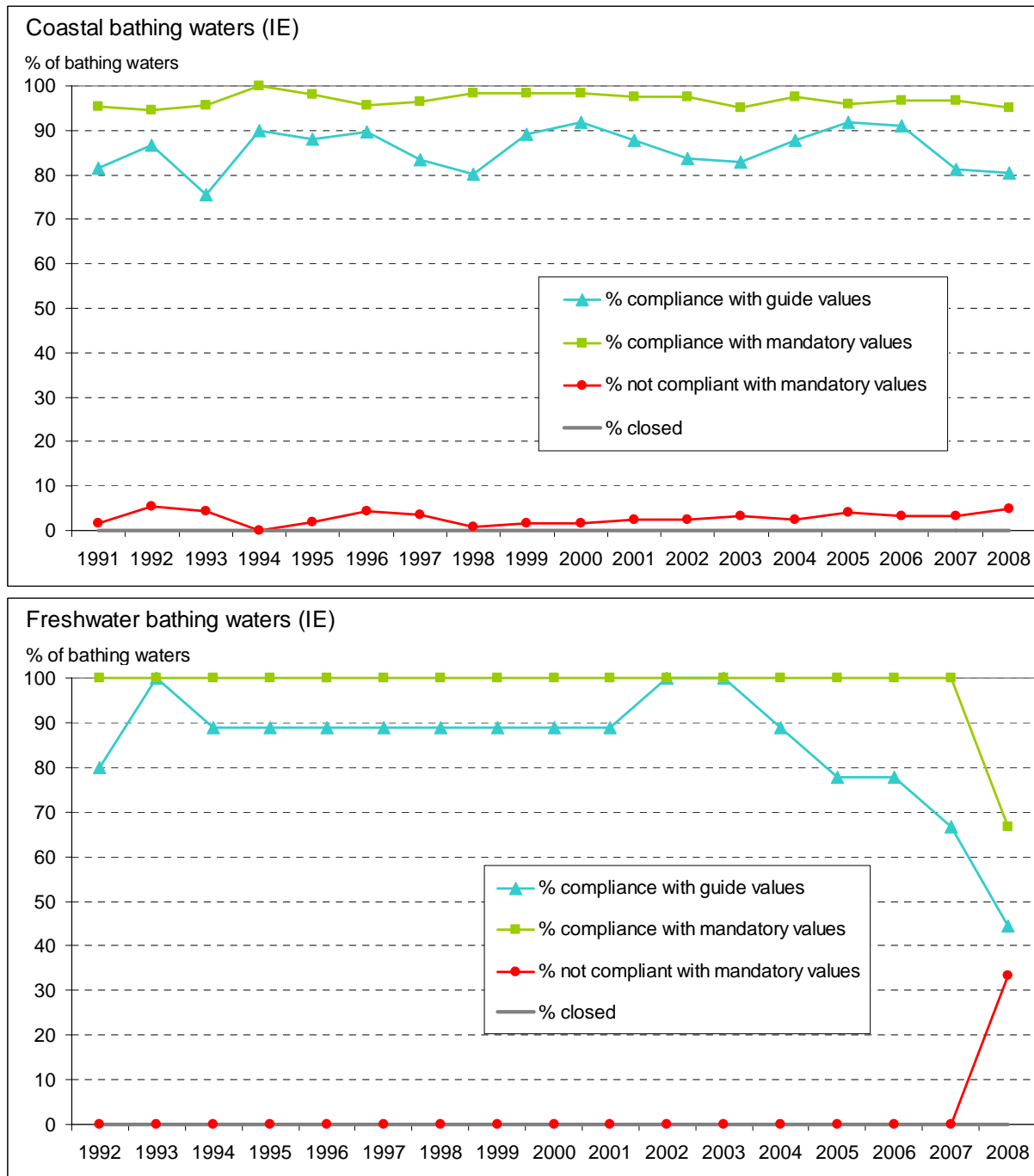


Table 1: Results of bathing water quality in Ireland from 1991 to 2008 as absolute numbers

		IE				
		Total number of bathing waters	Compliance with guide values	Compliance with mandatory values	Not compliant	Banned/closed throughout the season
Coastal bathing water	1991	65	53	62	1	0
	1992	90	78	85	5	0
	1993	90	68	86	4	0
	1994	108	97	108	0	0
	1995	108	95	106	2	0
	1996	115	103	110	5	0
	1997	115	96	111	4	0
	1998	121	97	119	1	0
	1999	121	108	119	2	0
	2000	121	111	119	2	0
	2001	122	107	119	3	0
	2002	122	102	119	3	0
	2003	122	101	116	4	0
	2004	122	107	119	3	0
	2005	122	112	117	5	0
	2006	122	111	118	4	0
	2007	122	99	118	4	0
	2008	122	98	116	6	0
Fresh water bathing water	1992	5	4	5	0	0
	1993	5	5	5	0	0
	1994	9	8	9	0	0
	1995	9	8	9	0	0
	1996	9	8	9	0	0
	1997	9	8	9	0	0
	1998	9	8	9	0	0
	1999	9	8	9	0	0
	2000	9	8	9	0	0
	2001	9	8	9	0	0
	2002	9	9	9	0	0
	2003	9	9	9	0	0
	2004	9	8	9	0	0
	2005	9	7	9	0	0
	2006	9	7	9	0	0
	2007	9	6	9	0	0
2008	9	4	6	3	0	

Note: Bathing waters which were insufficiently sampled or not sampled according to the Bathing Water Directive were not included in this table. Therefore, in some cases, the sum of the different categories will not be equal to the total number of bathing waters.

Table 2: Results of bathing water quality in Ireland from 1991 to 2008 as percentages

		IE				
		Total number of bathing waters	% compliance with guide values	% compliance with mandatory values	% not compliant	% banned/closed throughout the season
Coastal bathing water	1991	65	81.5	95.4	1.5	0.0
	1992	90	86.7	94.4	5.6	0.0
	1993	90	75.6	95.6	4.4	0.0
	1994	108	89.8	100.0	0.0	0.0
	1995	108	88.0	98.1	1.9	0.0
	1996	115	89.6	95.7	4.3	0.0
	1997	115	83.5	96.5	3.5	0.0
	1998	121	80.2	98.3	0.8	0.0
	1999	121	89.3	98.3	1.7	0.0
	2000	121	91.7	98.3	1.7	0.0
	2001	122	87.7	97.5	2.5	0.0
	2002	122	83.6	97.5	2.5	0.0
	2003	122	82.8	95.1	3.3	0.0
	2004	122	87.7	97.5	2.5	0.0
	2005	122	91.8	95.9	4.1	0.0
	2006	122	91.0	96.7	3.3	0.0
	2007	122	81.1	96.7	3.3	0.0
2008	122	80.3	95.1	4.9	0.0	
Fresh water bathing water	1992	5	80.0	100.0	0.0	0.0
	1993	5	100.0	100.0	0.0	0.0
	1994	9	88.9	100.0	0.0	0.0
	1995	9	88.9	100.0	0.0	0.0
	1996	9	88.9	100.0	0.0	0.0
	1997	9	88.9	100.0	0.0	0.0
	1998	9	88.9	100.0	0.0	0.0
	1999	9	88.9	100.0	0.0	0.0
	2000	9	88.9	100.0	0.0	0.0
	2001	9	88.9	100.0	0.0	0.0
	2002	9	100.0	100.0	0.0	0.0
	2003	9	100.0	100.0	0.0	0.0
	2004	9	88.9	100.0	0.0	0.0
	2005	9	77.8	100.0	0.0	0.0
	2006	9	77.8	100.0	0.0	0.0
	2007	9	66.7	100.0	0.0	0.0
	2008	9	44.4	66.7	33.3	0.0

Note: Bathing waters which were insufficiently sampled or not sampled according to the Bathing Water Directive are not included in this table. Therefore, in some cases, the sum of the percentages is not equal to 100%.

Table 3: Results of bathing water quality for all bathing waters in Ireland in 2008

		IE				
		Total number of bathing waters	Compliance with guide values	Compliance with mandatory values	Not compliant	Banned/closed throughout the season
Bathing Waters	2008	131	102	122	9	0

4. Development of bathing water quality

Coastal bathing waters

In Ireland, 95.1% of the coastal bathing waters (116) met the mandatory values in 2008. This is a decrease compared to the previous year (- 1.6%). 80.3% of the bathing waters (98) met the more stringent guide values, which is also a slight decrease (- 0.8%). 14.8% of the bathing waters that met the mandatory values did not meet the guide values. The number of non-compliant bathing waters increased from four (3.3%) to six bathing waters (4.9%). Since the start of the reporting in 1991, no coastal bathing water had to be closed during the season.

From 1991 onwards, the compliance with the mandatory values remained rather stable between 95 and 100%. This is an excellent result. Overall, the compliance with the more stringent guide values fluctuated between 75 and 92%, which is also a good result.

Freshwater bathing waters

Six freshwater bathing waters (66.7%) met the mandatory values in 2008. This is a decrease compared to the previous year, when all freshwater bathing waters (9) met the mandatory values. Four bathing waters (44.4%) met the more stringent guide values, which is also a decrease of two bathing waters. Three bathing waters were not compliant with mandatory values. Since the start of the reporting in 1992, no freshwater bathing water had to be closed during the season.

All reported freshwater bathing waters have been compliant with the mandatory values since 1992, except in 2008. From 1993 till 2004, the number of bathing waters that complied with the more stringent guide values remained at the same high level (88.9%), with two peaks of 100% of compliance in 1993 and from 2002 until 2003. This trend doesn't continue for the period from 2005 till 2008 as there was a slight decrease in the freshwater quality. The lower compliance rate with the guide values in 2007 and with both the mandatory and guide values in 2008 was due to the higher than usual rainfall that occurred during the summer periods.

5. General information as provided by the Irish authorities

In Ireland, the primary legislation governing the quality of bathing waters is set out in the Quality of Bathing Waters Regulations, 1992 (S.I 155 of 1992) and amendments, which transposed the EU Directive 76/160/EC concerning the quality of bathing water.

Sampling

Responsibility for sampling (or arranging the sampling) at designated bathing sites lies with the relevant local authorities. Sampling at these sites must be undertaken on a fortnightly basis during the bathing season which extends from the 1st June until the end of August each year. Monitoring commences two weeks before the start of the season. The minimum number of samples to be taken during the season is seven. Under certain circumstances, in particular where there has been a deterioration in water quality, both the frequency of monitoring and range of analytes must be increased. Similarly, where bathing water quality is found to be consistently of a very good quality, the monitoring frequency may be reduced to a minimum of four times during the bathing season.

The analytical methods used to assess compliance as listed in the Annex of Directive 76/160/EC have been transposed into the Irish Regulations. Under Irish legislation additional national standards have also been established for a number of parameters.

Local Authorities are required to report the results of sampling to the Environmental Protection Agency at the end of each bathing season. The Environmental Protection Agency is responsible for compiling the bathing water quality results and submitting this information to the European Commission in the specified formats.

Weather conditions in 2008 bathing season

Low pressure close to or over Ireland brought a succession of Atlantic frontal systems across the country during much of the summer in 2008, giving rise to significant rainfalls. Rainfall totals for June were above normal, with around twice the normal June rainfall in the south and southeast of the country. Rainfall totals for July were above normal, with more than twice the normal July rainfall in the east and south of the country. August was a month of exceptionally heavy rain over most of the country, bringing flooding in many areas.

Follow-up Actions

The Office of Environmental Enforcement within the Environmental Protection Agency has been notified of all the bathing sites, which have failed to meet the mandatory standards as prescribed in the Directive. Follow up audits will be undertaken with each of the responsible local authorities, such that a programme of improvements can be put in place to bring these sites back into compliance.

Waste Water Treatment and Regulation

Ireland's National Development Plan (NDP) 2007 - 2013 includes an investment of €4.7 billion in urban waste water infrastructure and water services. The Water Services Investment Programme 2007-2009 outlined the countrywide water and sewerage schemes to be undertaken over the next few years. It is hoped, subject to all statutory procedures being completed, that work will commence in 2009 on the provision of a new waste water treatment plant for Clifden. Some improvements to the existing Clifden waste water treatment plant have been carried out following enforcement action by the Environmental Protection Agency.

Furthermore, the Waste Water Discharge Authorisation Regulations came into effect on 27 September 2007 providing a system for the licensing or certification of all discharges to the aquatic environment from sewerage systems owned, managed and operated by local authorities. This provides a process for the Environmental Protection Agency to place conditions on the operation of such discharges to secure improvements in the quality of effluents from urban waste water treatment plants

6. More information on bathing water quality in the European Union

More information on bathing water quality in the European Member States, including the reports for 27 Member States and the EU summary report, can be found on the bathing water quality website (http://ec.europa.eu/environment/water/water-bathing/index_en.html).

By 2015, Member States will have to comply with the stricter and more ambitious requirements laid out in the new Bathing Water Directive (Directive 2006/7/EC). This Directive requires more effective monitoring and management of bathing waters, greater public participation and improved information. More information on the new Directive can be found on the bathing water quality website and on <http://eurlex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:L:2006:064:0037:0051:EN:PDF>.

Cyprus, Denmark, Estonia, Finland, Germany, Hungary, Latvia, Lithuania, Slovakia, Spain and Sweden started to report according to more stringent new requirements in 2008 bathing season, while Luxembourg already started in 2007 bathing season.

WISE - Water Information System for Europe (www.water.europa.eu) is a gateway to all water related information. Among other water related data, information on individual bathing water quality can be found in the WISE Map viewer and WISE Data viewer through interactive maps and graphs (<http://www.eea.europa.eu/themes/water/status-and-monitoring/state-of-bathing-water>).

Map 1: Bathing waters reported during the 2008 bathing season in Ireland

