


Bathing water profile:

Machrihanish

<p>Bathing water: Machrihanish</p>	
<p>EC bathing water ID number: UKS7616034</p>	
<p>Location of bathing water: UK/Scotland/Argyll and Bute (Map1)</p>	
<p>Year of designation: 1999</p>	
<p>© Copyright Leslie Barrie and licensed for reuse under this Creative Commons Licence.</p>	
<p>Bathing water description</p> <p>Machrihanish Bay is a 5 km long quiet rural sandy beach located on the Mull of Kintyre Peninsula in Argyll and Bute. It is close to the small village of Machrihanish and adjoins the Machrihanish golf course via an established sand dune system. There is a car park at either end of the bay (Map 1) and access to the beach is via a gate at Machrihanish. It was designated as a bathing water in 1999.</p> <p>During high and low tides the approximate distance to the water's edge can vary from approximately 30–100 metres. The beach slopes gently towards the water. There are powerful rip currents and submerged rocks on part of the beach. For local tide information please see: http://easytide.ukho.gov.uk/EasyTide/</p> <p>The beach is prized for its unspoilt golden sands and is popular with locals, as well as surfers and other watersports enthusiasts.</p> <p>Our monitoring point for taking water quality samples is located at the southern end of the designated area (NR 64100 20900) as shown on Map 1.</p>	
<p>Monitoring water quality</p> <p>Please visit our website¹ for details of the current EU water quality classification and recent results for this bathing water.</p> <p>During the bathing season (1 June to 15 September), designated bathing waters are monitored by SEPA</p>	

¹ <http://apps.sepa.org.uk/bathingwaters/>

for faecal indicators (bacteria) and classified according to the levels of these indicators in the water. The European standards used to classify bathing waters arise from recommendations made by the World Health Organisation and are linked to human health. More information on bathing water monitoring, health and classification can be found on our [website](#)².

Risks to water quality

In general, most natural waters will be affected to some extent during and following rainfall as pollutant loads may be increased due to run-off from agricultural or urban land in the catchment. In addition, at some locations waste water discharges from combined sewer overflows, which then drain into the bathing water and can reduce water quality.

Faecal pollutants can come from human sewage, farming activities and livestock (e.g. cattle, sheep), industrial processes, surface water urban drainage, domestic animals (e.g. dogs) and wildlife (e.g. birds) and can enter bathing waters via:

- direct discharges into the marine environment at, or in the vicinity of, the beach;
- the freshwater network draining into a bathing water, which can be prone to elevated bacterial levels as a result of diffuse pollution and/or point source inputs upstream.

The potential relevant pollution sources at, or near, this bathing water are highlighted on Map 1. There are no direct discharges to the bathing water.

It is considered likely that the principal risks and source of wet weather driven short term pollution at this bathing water arise from agricultural run-off and intermittent combined sewer overflows. These events are expected to last 1–2 days depending on the duration of the rainfall and may result in elevated bacteria levels compared to dry conditions.

Our regulatory and scientific assessment indicates that potential sources of short-term faecal indicator pollution at this bathing water can at times originate from human or animal sources.

Cyanobacteria (blue-green algae)

Marine waters are not at risk of cyanobacteria overproduction.

Algae

Current information suggests that this bathing water is not at risk of macroalgae (seaweed) or phytoplankton overproduction.

Jellyfish

There is a possibility of increased numbers of jellyfish in the water during the summer months. This is a naturally occurring phenomenon. Although there are a few stinging species common to the UK, most are harmless. The Marine Conservation Society advises to 'look but don't touch'.

Daily water quality forecasts

Machrihanish bathing water is not part of our signage network. Daily water quality predictions are not currently required for this bathing water.

² <http://apps.sepa.org.uk/bathingwaters/SamplingResults.aspx>

Map 1: Machrihanish bathing water



Map 2: Catchment draining into Machrihanish bathing water



Catchment description

The catchment draining into the designated bathing water extends to approx 66 km². The land area adjacent to the bathing water is flat and low-lying and has been subjected to extensive drainage works over the years. Beyond this low-lying area the land rises to approx 200 metres. Average summer rainfall for the region is 350 mm compared to 331 mm across Scotland as a whole.

The main river within the bathing water catchment is the Machrihanish or Backs Water.

The catchment is predominantly rural (98%) with grassland (74%) the major land use. The upland areas support mixed sheep and beef farming whilst the lowlands are used for intensive dairy farming, particularly the plains and northern part of the catchment. Most farms grow a small acreage of barley for feed and straw. Approximately 2% of the bathing water catchment comprises of bog, standing water and inland rock. Population density within the catchment is generally low. The village of Machrihanish is at the southern end of the bathing water. The area also includes Campbeltown airport and both Machrihanish and Machrihanish Dunes golf clubs (Map 2).

The bathing water includes the Machrihanish Dunes Site of Special Scientific Interest (SSSI) (Map 2). This SSSI is the largest sand dune complex in mainland Argyll and is notified for its important coastal habitat and associated flora. For more information see Scottish Natural Heritage's [information service website](#)³.

Measures to improve bathing water quality

High quality bathing waters are important so that people can enjoy Scotland's environment safely. They are also important for Scotland's tourism industry.

Recent years have seen considerable improvements in Scotland's bathing water quality, not least due to substantial investment in the sewerage system. SEPA and our partners are fully committed to continuing to improve bathing water quality.

Improving diffuse pollution from agricultural sources

Diffuse pollution from agricultural sources is normally the result of cumulative inputs of pollutants from several different sources on farms within the catchments draining to the bathing water. Consequently, tackling diffuse agricultural pollution requires concerted action across catchments. We will ensure this by working with farmers to raise awareness about the requirement to prevent and reduce pollution, and to help them identify appropriate actions for doing so.

To help co-ordinate our work to encourage and ensure action, SEPA participate in the [Diffuse Pollution Management Advisory Group](#)⁴ (DPMAG), which is a partnership of relevant authorities, land manager representatives and voluntary organisations.

The Scottish Government has also brought together nine public bodies to form [Scotland's Environmental and Rural Services](#)⁵ (SEARS). This partnership will contribute to implementing plans for tackling diffuse pollution by providing co-ordinated education and advice to rural land managers.

Additional targeted efforts will be made to improve management of diffuse pollution within catchments identified as 'priority' catchments. These are catchments where the scale of the pollution reduction needed will require planned and targeted actions to be identified and discussed with farmers concerned. Assistance will be given in these areas to identify pollution hotspots, and one-to-one advice will be provided on following the agricultural codes of good practice, which in themselves lead to compliance with these regulations. Action in priority catchments will be phased.

The Machrihanish catchment is part of the Kintyre Coastal catchment. Work in this catchment is due to be completed by 2021.

Improving pollution from sewage and other discharges

Most waste water collection and treatment services in Scotland are provided by Scottish Water. It has invested substantially in waste water collection and treatment provision over recent years to protect public health and the environment. Public investments in the sewerage network and in treatment works will continue to be co-ordinated through the national investment and planning process for Scottish Water, known as 'Quality and Standards'.

³ www.snh.org.uk/snhi

⁴ <http://www.sepa.org.uk/environment/water/river-basin-management-planning/who-is-involved-with-rbmp/dpmag/>

⁵ www.sears.scotland.gov.uk

Following diversion, in 2003, of the three significant discharges of sewage effluent from Machrihanish, Drumlemble and Stewarton to the Campbeltown network, the only remaining Scottish Water assets in the catchment are pumping stations serving the three communities. These pumping stations have provision for making screened intermittent discharges under storm or emergency conditions only.

Improving pollution from diffuse urban sources

Machrihanish bathing water is not affected by surface water run-off from urban sources.

Responding to pollution incidents

Although rare, pollution incidents affecting bathing water quality can happen. Pollution incidents tend to be unpredictable, for example a slurry spill or sewage network failure, and can result in elevated levels of faecal indicators.

To report a possible pollution incident please use our 24 hour pollution hotline (0800 807060). In response we will investigate the incident and contact other relevant organisations. That may include Scottish Ministers, Scottish Water, the local authority and the relevant health board. Where necessary measures will be put in place to resolve the problem.

Whenever our routine sampling of bathing waters identifies elevated levels of faecal indicators there is an immediate response to check all relevant potential sources and major discharges in the immediate catchment, as well as our hydrometric information to determine whether the levels may be due to high river flows. Follow-up microbiology sampling is also undertaken of the bathing water and local water courses.

If beach users or bathers are considered to be at risk the local authority will warn the public by erecting signs at the bathing water. Information will also be available on our [website](#)⁶.

Other pollutants at the beach may include plastics and litter. Beach users are encouraged to use the bins provided or to take litter home. Beach cleaning and litter clean-up is maintained for this bathing water by Argyll and Bute Council and the GRAB Trust.

Contact details and sources of more information

SEPA Lochgilphead office

Kilbrandon House
Manse Brae
Lochgilphead
Argyll
PA31 8QX
01546 602876
www.sepa.org.uk

Argyll and Bute Council

Kilmory
Lochgilphead
Argyll
PA31 8RT
01546 602127
enquiries@argyll-bute.gov.uk
www.argyll-bute.gov.uk

Pollution Hotline

0800 80 70 60
24 hours per day, seven days per week

Keep Scotland Beautiful

01786 471333
beach@ksbscotland.org.uk
www.keepsotlandbeautiful.org

GRAB Trust

c/o Argyll and Bute Council
Kilmory
Lochgilphead
Argyll
PA31 8RT
01546 604227
info@grab.org.uk
www.grab.org.uk/beaches.htm

Scottish Government

Victoria Quay
Edinburgh
EH6 6QQ
0131 244 0396
egcat@scotland.gsi.gov.uk
www.scotland.gov.uk/Topics/Environment/Water/15561/bathingwaters

⁶ <http://apps.sepa.org.uk/bathingwaters/Predictions.aspx>

Further information about the condition of our water environment and the actions needed to deliver improvement can be found in:

- the Scotland river basin management plan
<http://www.sepa.org.uk/environment/water/river-basin-management-planning/>
- the Argyll and Lochaber area management plan
<http://www.sepa.org.uk/environment/water/river-basin-management-planning/who-is-involved-with-rbmp/area-advisory-groups/argyll-and-lochaber/>

Good Beach Guide: www.goodbeachguide.co.uk

Blue Flag and Seaside Awards: www.keepsotlandbeautiful.org/coastal

Version Control

Version number:	Date:	Next review due:
1.0	Oct 2010	
1.1	March 2014	
1.2	June 2015	