

INTRODUCTION

Under the Resource Management Act 1991 (RMA), Northland Regional Council (NRC) is required to monitor and report on the state of Northland's environment. Annual reports to this effect have been produced since 1999, with a comprehensive **State of the Environment (SoE)** report published every five years. The last SoE report was produced in 2007 and is available on the NRC website at – <http://www.nrc.govt.nz/Resource-Library-Summary/Environmental-Monitoring/State-of-the-Environment-Monitoring/>.

The **Annual Monitoring Report (AMR) 2007-08** details results from NRC's environmental monitoring programmes from July 1, 2007 through until June 30, 2008. This is the sixth Annual Monitoring Report to be produced by the Council, deriving from the objectives and performance targets outlined in the Northland Community Plan 2006-16 (LTCCP), which include:

To continue to develop and implement a prioritised State of the Environment monitoring programme based on the Regional Policy Statement and Regional Plans, by:

- Reporting to the Council annually on environmental monitoring activities within three months of the end of the financial year.

As in previous reports, information is presented under the following chapter headings:

- Air Quality
- Biodiversity
- Biosecurity
- Coasts
- Environmental Compliance
- Environmental Incidents
- Groundwater
- Hydrology
- Lakes
- Rivers and Streams
- Waste Management

At the beginning of each chapter, performance targets as laid out in the LTCCP are listed, along with a measure of progress against these targets.

MONITORING DEFINITIONS

Monitoring undertaken by the NRC falls into two distinct categories:

- Compliance Monitoring
- State of the Environment (SoE) Monitoring

Compliance Monitoring

Compliance monitoring relates to the interaction between people and the environment. Therefore, compliance monitoring is tied into the enforcement of resource consents, rules in regional plans and other statutory environmental standards. Compliance monitoring is a tool to

measure and thus indirectly help minimise the impact that people's actions have on the environment.

SoE Monitoring

SoE monitoring is primarily used to develop 'snapshots' of the state of Northland's environment. It is impossible to monitor all the variables that make up our environment, so select 'indicators', such as particulate matter in air or nitrate levels in water are chosen as representative markers. Using a range of indicators, it is possible to determine the quality of our general (or background) environment.

Once background information has been collected for a number of years, it is also possible to analyse environmental trends, which can impact upon regional plans and thus resource consents. This information also helps guide investigative sampling, which is used to isolate the cause of an environmental issue. Generally, this trend analysis is not discussed in the AMR but it is included where relevant.