The purpose of these expectations is to express how Norges Bank Investment Management, as a financial investor, expects companies to manage the challenges and opportunities surrounding water resources. Our expectations are primarily directed at company boards. The expectations serve as a starting point for our interaction with companies on the topic of water management.

Boards should understand the broader environmental and social consequences of business operations. Boards should ascertain that relevant water challenges and opportunities are integrated in corporate strategy and investment planning, risk management, and reporting. They should ensure that responsibilities are clearly defined within the organisation and they should effectively guide, monitor, and review the company’s management in these efforts.
Norges Bank Investment Management is responsible for managing the assets of the Norwegian Government Pension Fund Global. We work to safeguard and build financial wealth for future generations. We will, as a starting point and where appropriate, base our practices on internationally recognised standards such as the UN Global Compact, the OECD Principles of Corporate Governance, and the OECD Guidelines for Multinational Enterprises.

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RELEVANCE OF WATER MANAGEMENT
The point of departure for our water management expectations is our investment mandate and long-term financial objective of safeguarding the fund’s assets. The fund is a financial investor and diversifies its investments across a large number of markets and securities. Water challenges may give rise to risks and opportunities for companies. How companies manage water risks and capitalise on opportunities, may drive long-term returns for the fund as a shareholder.

The fund holds a diversified portfolio across a large number of industries and markets. For the fund, externalities from unsustainable water use may in itself present a risk to the portfolio’s long-term value. Water resources for industry are rarely priced to reflect scarcity value. All else equal, we do not expect such implicit subsidies to be sustainable in the long term. To address this type of risk, the fund has a general interest in sustainable water management and efficient water regulation across different sectors and geographies.

Reports have highlighted achieving sustainable water use to be amongst the foremost global economic, social and environmental challenges1. Economic and population growth are expected to increase future water demand from agriculture, households and industry. This may put water resources under increasing stress. Water pollution2 and climate change3 may introduce additional challenges.

Water is an input in a number of processes for many sectors. Companies depend on water in their direct operations or through their supply chains or

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1 See for example the annual United Nations World Water Development Report and IMF Staff Discussion Note, June 2015.
2 Although the responsibility to protect the environment rests with governments, companies must be aware of the impact their activities have on the natural environment, take due account of the need to protect the environment, and be guided by the principle of sustainability.
3 See also Norges Bank Investment Management’s Expectations to companies on Climate Change Strategy.
products’ lifecycle. Water stress\(^4\) may affect business profitability through operational disruptions, reduced product life, loss of market access or capital expenditure risks. It may also change the competitive landscape or market demand.

Demand for water-efficient products and technologies may, for example, increase. Providing solutions to water challenges could prove a future strategic advantage. Companies with the best governance, systems and technologies to deal with water challenges, could be better positioned to mitigate water risks and identify new market opportunities\(^5\).

Companies can seek guidance from relevant international principles, guidelines, or industry initiatives, on how to address these. Unilateral water management has limitations and may present companies with dilemmas. Collective impact assessments and action from various water users in a basin may play an important role to reduce risks and capitalise on opportunities.

Our expectation documents provide high-level guidance for companies. Our expectations are directed at companies with operations or value chains in sectors with high water dependency and in regions exposed to water scarcity, water pollution and other water-associated risks. We expect companies to address sustainable water management in a manner meaningful to their business models and wish to support them in their efforts to manage the risks and pursue the opportunities.

As investors, we analyse opportunities and risks to our investments. Data availability and quality is a requirement for this. We encourage companies to be transparent about the topics raised in this document. Norges Bank Investment Management uses such information to identify how water challenges may affect companies’ performance and prospects, and to assess whether the company board and management are taking relevant steps to develop a long-term business strategy addressing such challenges.

**EXPECTATIONS TO COMPANIES**

Boards should understand the broader environmental and social consequences of business operations. Boards should ascertain that relevant water challenges and opportunities are integrated in corporate strategy and investment planning, risk management, and reporting. They should ensure that responsibilities are clearly defined within the organisation and they should effectively guide, monitor, and review the company’s management in these efforts.

**A. Integrate relevant water management challenges and opportunities in strategy and investment planning.**

- Companies should recognise the business’ water impact, commit to sustainable water management and, as relevant, have a clear water management strategy.

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\(^4\) For example due to high water use, pollution, low water quality, droughts or excess water due to floods.

\(^5\) Strategic responses typically address water security, water efficiency, water pollution, and, as relevant, legal compliance and post-closure considerations and investments in research and development and stakeholder relationships.
• Companies should take a long-term approach to the issue of water, and understand the potential business, social and environmental implications of corporate water needs, dependency and strategic response, including in supply chains and products’ life cycles.

• Companies should incorporate relevant water challenges, opportunities and water sustainability considerations in investment planning and execution, and, where relevant, consider the sensitivity of their long-term business strategy and profitability to water stress and regulation, for example through scenario analysis. Analysis should reflect that water stress is region-specific, and include local hydrological, environmental, social, economic and regulatory factors as appropriate.

• Companies should, where relevant, consider research and development to reduce company water dependency, reduce water use or discharge, improve water quality and resource management, or deliver new processes, products and services to enhance company competitiveness under changing market conditions.

• Companies should regularly consider whether their remuneration, incentive systems, and wider company culture integrate sustainable business practices appropriately and support the long-term profitability of the business. Employees and contractors should be made aware of company policies in this regard.

• Companies could consider putting in place a mechanism for third-party expert input to company water management strategy.

B. Integrate material water risk in risk management.

• Companies should identify and incorporate material water risk in a robust and integrated framework. Risk management efforts should include appropriate systems for monitoring, reporting and regular reassessment.

• Companies should quantify the financial impacts of material water risk. Applying a shadow price – reflecting underlying cost dimensions - for water may aid in the integration of water risk with financial risk metrics or in scenario analysis.

• Companies should monitor water use and quality, and identify and consider relevant adaptation and mitigation measures to prevent and reduce risks.

• Companies should adopt, where relevant, industry standards and best practices in sustainable water management.

6 For example, when deciding on capital expenditures, siting of facilities, mergers and acquisitions or product development.

7 For example, regulatory changes or changes in water supply, quality or prices.

8 For example, improved water efficiency through the use of less water-intensive raw materials or improvements in the environmental quality of discharge, recycling practices, or products’ life cycle water dependency.
• Companies should identify and monitor material water risk in their supply chains\(^9\), including in agriculture, implement relevant procurement policies for products and services, engage with relevant strategic suppliers, and share best sustainable water management practices.

C. Disclose strategy and report material risks.
• Companies should disclose their water management strategy, challenges, and opportunities, reflecting both short-term and long-term investor concerns.

• Company reporting should reflect that water challenges are region-specific, and include basin-level hydrological, environmental, social, economic and regulatory information as appropriate.

• Companies should, when relevant, develop a framework to monitor and set relevant benchmarks, key performance indicators and targets, for direct and indirect company water consumption, conservation and reuse, waste water discharge, and environmental quality. They should report on progress against such targets.

• Companies should report relevant physical, regulatory or reputational water risks and responses to these, at the appropriate level of detail. Companies should strive to communicate how they define materiality and business relevance in this regard.

• Companies should report sufficiently granular data to internationally recognised reporting initiatives. This will better enable investors to analyse water data at the portfolio level. Companies should be transparent on data reported to regulators, and strive to report such data across operations.

• Where material risks and opportunities exist, companies should strive to report the above data for supply chains and products and services.

D. Transparency on interaction with policy makers and regulators, and engagement with other stakeholders.
• Companies should, when relevant, have policies or guidelines for engaging with policy-makers, regulators and relevant stakeholders on water management and be transparent about associated spending and activities.

• If they engage with regulators, companies should publicly outline their position on specific water regulation relevant to their business and outlook. Companies should consider promotion of policies supporting the efficient use of water, and promote long-term, sustainable, outcomes.

• Companies should understand their social and environmental impact on, and the associated needs of, the communities surrounding their direct operations and supply chains, as well as on the users of their products and services. They should seek to contribute to local populations retaining necessary access to water.

\(^9\) For example, water use and discharge, water dependency of raw materials, and supplier reporting.
• Companies should consider engaging in collective river basin management efforts and, as appropriate, consult and/or collaborate with communities, NGOs and other relevant organisations for procuring necessary information and research, and in building on-the-ground water sustainability programmes.