Water, water everywhere and not a drop to drink



March 2024



Robert Lambert Portfolio Manager

BlueBay Fixed Income Team

"Water scarcity currently affects more than 40% of the global population and this is set to rise."

Water scarcity is a growing concern, and a complex and costly issue to solve. With shortages mounting, the private sector will likely need to step in to tackle the problem.

Even though water covers roughly 70% of the Earth's surface, 3% of it is fresh water. And of that 3%, only 1.2% is drinkable, with the rest locked within glaciers, polar ice caps, soil, or the atmosphere, and therefore not economically extractable¹. Its growing scarcity poses a critical risk, and that not only applies to the developing world. We have continued to see acute shortages springing up across several advanced economies. France experienced its worst droughts in recorded history last year; across the pond, the US has seen nearly half of its 80,000 groundwater wells showing significant levels of depletion².

Conversely, water use is growing globally at more than twice the rate of population, and we believe that an increasing number of regions are approaching a point at which water services cannot be sustainably delivered, in terms of both reliability and consistency.

Some sobering statistics include:

- Water scarcity currently affects more than 40% of the global population and this is set to rise.
- One third of global sub-basins smaller working units of river basins which are critical sources of drinking water³ – will have severe water scarcity by 2050 due to human activity and land use⁴.
- More than 80% of wastewater resulting from human activities is discharged into rivers or sea without any treatment, impacting human as well as ecosystem health, whilst further degrading the quality of available water supplies⁵.
- By 2050, researchers estimate that some 3,061 sub-basins will be at risk of water scarcity from quantity or quality with scarcity hotspots cropping up in China, South Asia, Europe, the US and Brazil⁶.

4,5 Ibid.

¹ National Geographic Education - Earth's Fresh Water.

² Geographical.co.uk

³ UN environment programme: Half the world face severe water stress by 2030 unless water use decoupled.

⁶ Forbes - Billions facing clean water crisis by 2050.

However, it is not only the health and well-being of people that will be affected by water scarcity. A lack of water will likely also have some striking economic implications. The World Bank estimates that shortages in some regions could impact GDP growth by up to 11.5%⁷. Indeed, we believe that the scarcity of fresh water is rapidly emerging as a global economic threat that could disrupt entire industries, crimp business profits, and jeopardise economic growth. Of course, water scarcity may also affect investments from a risk-return perspective through multiple ways, including (but not limited to) restricting production, impacting profitability, disrupting supply chains, and fueling conflict.

The role of investors

Water scarcity is one of the most complex and costly issues to solve. According to the Sustainable Development Solutions Network, USD735 billion will need to be invested by 2030 to meet the United Nation's (UN) goal for water and sanitation, while the UN states that some countries experience a funding gap of approximately 60% to do so⁸.

This points to the opportunity for private funding to fill the public funding gap and will likely require new and creative financing solutions. We believe there is a big role for the fixed income market to play. One example is through securities like ESG labelled issuances, which include green and blue bonds from corporates and sovereigns alike.

Capitalising on the global water and sanitation challenge has multiple other entry points, including:

- Water treatment to promote re-use by maintaining quality.
- Water management to improve efficiency of water use, such as through smart technology, data, precision agriculture, and irrigation.
- Water infrastructure and supply to upgrade ageing infrastructure and maintain supply.

"Water scarcity may also affect investments from a risk-return perspective through multiple ways, including (but not limited to) restricting production, impacting profitability, disrupting supply chains, and fueling conflict."

Mapping the above areas to investment value chains allows investors to identify potential industries, sectors, and companies that offer the relevant products and services. Not only do such companies hold the potential to possibly contribute to real world impact, but we also believe that such operators are likely to be well positioned to gain competitive advantage and to do well financially as active participants in growing markets.

We believe that whilst many solutions will likely be technology focused, over time these could well encompass nature-based solutions (NBS), which use or mimic natural processes to enhance water availability (e.g. soil moisture retention), improve water quality (e.g. natural and constructed wetlands) and reduce risks associated with water-related disasters and climate change (e.g. floodplain restoration).

For those investors wanting to tap into the opportunities offered, certain asset managers can raise water management matters for them when they meet with issuers, and push for clearer strategies and reporting on practices. Investors can also ask that their asset manager ensures they integrate water risks and opportunities into their investment decision-making process.

Water is a valuable resource and private investors can play an important role in assessing risks and opportunities related to its continued availability and quality.

⁷ Morgan Stanley - A deep dive on the water crisis.

⁸ RBC BlueBay - How private investment can help clean up the world's water problems.

 (\mathbf{i})

Portfolio Manager Perspectives

Our experts offer their perspectives on the latest developments in global credit and the state of the markets.

LEARN MORE

This document was prepared by RBC Global Asset Management (UK) Limited (RBC GAM UK), authorised and regulated by the UK Financial Conduct Authority (FCA), registered with the US Securities and Exchange Commission (SEC) and a member of the National Futures Association (NFA) as authorised by the US Commodity Futures Trading Commission (CFTC).

In the United States, this document may also be provided by RBC Global Asset Management (U.S.) Inc. ("RBC GAM-US"), a SEC registered investment adviser. The entities noted above are collectively referred to as "RBC BlueBay" within this document. The registrations and memberships noted should not be interpreted as an endorsement or approval of RBC BlueBay by the respective licensing or registering authorities.

With respect to the investment performance presented, past performance is not indicative of future performance. Actual account performance may or will vary from the performance shown because of differences in market conditions; client-imposed investment restrictions; the time of client investments and withdrawals; tax considerations; economies of scale; portfolio turnover; the number, type, availability, and diversity of securities that can be purchased at a given time; differences in the underlying currency of the assets in the account, and other factors. Client assets managed using these strategies in separate accounts or different vehicles may be subject to restrictions, fees or expenses that are materially different than those found in the non-US funds.

This document is confidential and, without RBC BlueBay's consent, may not be (i) copied, photocopied or duplicated in any form by any means or (ii) distributed to any person that is not an employee, officer, director or authorized agent of the recipient.

Information herein is believed to be reliable but RBC BlueBay does not warrant its completeness or accuracy. This document contains information collected from independent third-party sources. For purposes of providing these materials to you, neither RBC BlueBay nor any of its affiliates, subsidiaries, directors, officers, or employees, has independently verified the accuracy or completeness of the third-party information contained herein.

The information contained herein does not constitute investment, tax, accounting or legal advice. Recipients are strongly advised to make an independent review with their own advisors and reach their own conclusions regarding the investment merits and risks, legal, credit, tax and accounting aspects of all transactions. Any risk management processes discussed refer to efforts to monitor and manage risk but should not be confused with and do not imply no or low risk. No chart, graph, or other figure provided should be used to determine which strategies to implement or which securities to buy or sell.

Copyright 2024 © RBC BlueBay. RBC Global Asset Management (RBC GAM) is the asset management division of Royal Bank of Canada which includes RBC Global Asset Management (U.S.) Inc., RBC Global Asset Management Inc., RBC Global Asset Management (UK) Limited and RBC Global Asset Management (Asia) Limited, which are separate, but affiliated corporate entities. ® / Registered trademark(s) of Royal Bank of Canada and BlueBay Asset Management (Services) Ltd. Used under licence. RBC Global Asset Management (UK) Limited, registered office 100 Bishopsgate, London EC2N 4AA, registered in England and Wales number 03647343. All rights reserved.

RBC Global Asset Management (U.S.) Inc. Minneapolis | Boston | Chicago 800.553.2143 | rbcgam.com

