



Methodology for Assessing Blue Bonds Eligibility in the U.S. Municipal Bond Market

1. INTRODUCTION

Blue Bonds and the Municipal Market

Blue Bonds are a thematic subset of green and sustainable finance that focus on protection, restoration, and sustainable use of marine and freshwater resources. Modeled conceptually on the ICMA Green Bond Principles (GBP), Blue Bonds apply an additional thematic lens to activities that materially support water security, healthy aquatic ecosystems, and resilient coastal and watershed systems.

The **IFC Guidelines for Blue Finance** and related guidance from the International Capital Market Association (ICMA)¹ establish a high-level, globally applicable framework intended for use across jurisdictions, asset classes, and debt instruments.² These guidelines are deliberately principles-based. As with the Green Bond Principles, interpretation and application must be tailored to specific markets.

Kestrel is interpreting the Blue Bond guidance specifically for the **U.S. municipal bond market**, where bond proceeds are typically used to finance public-purpose infrastructure and services and where strong environmental and social regulatory frameworks already exist. This methodology explains how Kestrel operationalizes Blue Bond eligibility in this context.

¹ The IFC Guidelines for Blue Finance Version 2.0 provide internationally recognized criteria and practical guidance on designing, evaluating, and reporting Blue Bonds, aligned with the Green Bond Principles and Sustainability-Linked Finance Principles. <https://www.ifc.org/content/dam/ifc/doc/2025/guidance-for-blue-finance-v2-0.pdf>

ICMA's "Bonds to Finance the Sustainable Blue Economy" offers voluntary market practice guidance for Blue Bonds, building on existing ICMA sustainable finance principles. <https://www.icmagroup.org/assets/documents/Sustainable-finance/Bonds-to-Finance-the-Sustainable-Blue-Economy-a-Practitioners-Guide-September-2023.pdf>

² Additional guidance includes the United Nations Environment Program – Finance Initiative Sustainable Blue Economy Finance Principles which were launched 2018 as the first global guiding framework for banks, insurers and investors to finance a sustainable blue economy; <https://www.unepfi.org/blue-finance/the-principles/>; and the United Nations Global Compact Practical Guidance to Issue a Blue Bond; <https://communications-assets.unglobalcompact.org/docs/publications/Practical-Guidance-to-Issue-a-Blue-Bond.pdf>

2. OVERVIEW OF THE BLUE BOND GUIDANCE FRAMEWORK

2.1 Core Objectives of Blue Finance

Across the IFC Guidelines for Blue Finance and ICMA-aligned market practice, Blue Bonds are intended to finance activities that:

- Make a **substantial contribution** to the protection, regeneration, or sustainable use of **marine and/or freshwater resources**;
- Are clearly aligned with **UN Sustainable Development Goal (SDG) 6** (Clean Water and Sanitation) and/or **SDG 14** (Life Below Water);
- **Go beyond compliance** with applicable laws and regulations, delivering measurable environmental benefits rather than merely meeting minimum standards; and
- Avoid causing material harm to other environmental or social objectives.

Blue finance is therefore best understood as a **thematic subset of green and sustainable finance**, not a standalone category. All Blue Bonds must first meet the requirements of recognized green or sustainability bond frameworks.

2.2 Environmental and Social Safeguards (“Do No Harm”)

The Blue Finance Guidelines include a strong expectation that financed activities incorporate appropriate environmental and social (E&S) safeguards. This is often referred to as a “do no harm” principle.

In practice, this means:

- Identifying potential environmental and social risks associated with the financed activity;
- Demonstrating that these risks are avoided, minimized, or mitigated; and
- Clearly stating which **E&S risk management standards** or frameworks are being followed.

Examples of acceptable safeguards referenced in the IFC Guidelines include:

- World Bank Group Environmental, Health, and Safety (EHS) Guidelines;
- International Finance Corporation Performance Standards;
- Industry-specific sustainability standards; and
- Recognized certification or product standards (e.g., MSC, ASC).

To support transparency for investors, Kestrel has mapped these IFC safeguard expectations to their functional equivalents in the U.S. municipal context, as illustrated below:

IFC Safeguard Expectation	U.S. Municipal Analogue
Identification, assessment, and mitigation of environmental and social risks consistent with recognized international good practice	Compliance with U.S. federal, state, and local environmental and social regulatory regimes, including National Environmental Policy Act (NEPA) ³ environmental assessments or Environmental Impact Statements (EIS), Clean Water Act requirements (including NPDES permitting for discharges), applicable state environmental policy acts, water quality standards, and public consultation and permitting processes; supplemented, where relevant, by industry-specific sustainability standards or third-party certifications (e.g., MSC, ASC, Salmon-Safe) that demonstrate performance beyond baseline legal compliance

2.3 Hierarchy of Eligibility in the IFC Guidelines

The IFC Guidelines for Blue Finance outline a clear hierarchy for Blue eligibility:

1. **Contribution to SDG 6 and/or SDG 14** through the use of proceeds;
2. **Limited risk of undermining progress** toward other environmental or social objectives; and
3. **Transparency around applied safeguards**, including explicit reference to the E&S standards or frameworks used.

In addition, per the IFC Guildelines:

- Blue Bonds must align with the **Green Bond Principles (GBP), Green Loan Principles (GLP), or Sustainability-Linked Bond/Loan Principles**, as applicable.
- To be labeled or verified as Blue, the bond must also align with the **IFC Blue Finance Guidance Framework**.
- The IFC framework expects **external review** as a component of credibility and market integrity.

Kestrel provides this external review through:

- **Traditional Second Party Opinions (SPOs)** for issuers; and
- **External review datasets** for investors, designed for integration into internal systems and workflows.

³ *Applicability of NEPA depends on project characteristics and federal involvement (e.g., use of federal funding, federal permits, or federal land). Where NEPA does not apply, comparable state-level environmental review statutes, such as the California Environmental Quality Act (CEQA) and other state or local environmental permitting and review processes serve an equivalent risk identification, disclosure, and mitigation function.*

3. WHY KESTREL DEVELOPED A MUNICIPAL BLUE BOND METHODOLOGY

The Blue Bond market has matured rapidly over the past several years, moving from concept to a recognized thematic segment within sustainable finance. Investor demand for credible Blue investments is growing, alongside increasing interest in water security, climate resilience, marine environments and ecosystem protection.

Kestrel reviews **all U.S. municipal bonds** for Green, Social, and Sustainability Bond eligibility as part of its core research process. Through the benchmarking of **more than 15,000 municipal bond series**, Kestrel has identified a consistent set of activities that, in our expert judgment, meet Blue Bond criteria.

This work highlights a two-fold opportunity:

1. **For investors:** The U.S. municipal market already contains a meaningful universe of bonds with Blue-eligible uses of proceeds, even when they are not explicitly labeled as such.
2. **For issuers:** Municipal issuers have an opportunity to label and market eligible bonds as Blue Bonds, potentially attracting new pools of capital and expanding their investor base.

Kestrel will periodically publish summary statistics on:

- The share of municipal bonds that are Blue-eligible;
- Common Blue-eligible sectors and issuer types; and
- Trends in issuance and market adoption.

4. BLUE BOND ELIGIBLE ACTIVITIES IN THE U.S. MUNICIPAL MARKET

4.1 Scope and Refinement for Municipal Finance

Building on the Green Bond Principles, Blue finance encompasses activities that support sustainable water management and ocean protection. The IFC Guidelines map a broad range of blue economy activities to existing GBP categories.

For this methodology, Kestrel has **refined the list of Blue-eligible activities** to reflect the realities of the U.S. municipal bond market. Certain categories, such as ocean-friendly consumer products, have been excluded because they are not typically financed through municipal debt and are not expected to be encountered.

While the IFC Guidelines include both marine and freshwater resources as Blue-eligible activities, some frameworks include only marine resources. Kestrel will initially restrict Blue eligibility to 1) bonds that finance activities that directly benefit coastal and marine ecosystems, and 2) bonds that finance activities that directly benefit the large freshwater ecosystems of the Great Lakes or the Florida Everglades. Kestrel expects to update and expand this methodology in the future.

Eligible activities may include financing or refinancing **research, design, construction, rehabilitation, or operation** of projects across multiple blue economy sectors, provided they align with the IFC Blue Finance Guidance Framework.

4.2 Expected Blue-Eligible Project Types

The table below summarizes Blue-eligible project types Kestrel expects to encounter in the municipal bond market.

Sector	Eligible Project Type ⁴	Typical Issuer Types
Water & Wastewater Management in Coastal Watersheds	Sustainable water supply systems with no overdraft and no major environmental constraints	Cities, water districts, utilities
	Water efficiency technologies and demand reduction infrastructure	Cities, utilities
	Stormwater, drainage, and flood management systems that prevent pollutants and plastics from entering water bodies	Cities, counties, flood control districts
	Rehabilitation or retrofitting of water infrastructure achieving material efficiency gains	Utilities, special districts
	Sustainable desalination plants meeting defined environmental performance criteria	Utilities, regional authorities
	Water conveyance and distribution systems achieving ≥10% reduction in water loss versus baseline	Utilities
	Wastewater treatment infrastructure and technology	Utilities, sanitation districts
	Water reuse and recycled water infrastructure	Utilities, water districts
Transport & Shipping	Port infrastructure supporting electric, wind-assisted, or other low-emission vessels	Port authorities
	Ballast water, bilge water, and other vessel-related water treatment systems	Port authorities
	Maritime noise reduction technologies	Port authorities
	Vessel recycling or repurposing facilities	Port authorities
	Spill prevention, response, and cleanup technologies	Port authorities
	Solid waste reception and treatment facilities at ports	Port authorities

⁴ IFC Guidelines Annex 1

Sector	Eligible Project Type ⁴	Typical Issuer Types
Fisheries & Aquaculture	Establishment and management of no-take zones within Marine Protected Areas	State agencies, special districts
	Sustainable land-based aquaculture	State agencies, development authorities
	Bivalve cultivation for nutrient and algae management	State agencies, utilities
	Aquaculture operations certified to ASC or equivalent standards	Conduit issuers
	Cold storage facilities supporting small and medium-scale fisheries under sustainable quotas	Port authorities, development agencies
	Fish processing facilities meeting MSC or equivalent sustainability safeguards	Public authorities, port authorities
	Traceability and monitoring systems for sustainable fisheries management	State agencies
Habitat Restoration & Watershed Protection	Ecosystem research, monitoring, and field testing	State agencies, universities
	Conservation, restoration, and ecosystem management projects	State agencies, special districts, counties, certain utilities
	Coastal and watershed restoration (e.g., reefs, wetlands, barrier islands)	State agencies, flood control districts, certain water districts
	Blue carbon ecosystem protection and restoration	State agencies, counties, special districts
	Expansion and management of Marine Protected Areas	State agencies
	Technologies to prevent illegal wildlife trade	State agencies
Tourism & Recreation	Nature-based freshwater and marine environmental education centers	Cities, park districts, water districts, nonprofit organizations via conduits
	Certified sustainable tourism infrastructure in coastal regions	Development authorities

5. KESTREL'S BLUE BOND ELIGIBILITY REVIEW PROCESS

Kestrel applies a consistent, sequential review process when assessing Blue Bond eligibility:

Step 1: Green Eligibility Screening

- The bond must meet Kestrel's Green Bond eligibility criteria.
- **100% of net proceeds** must be allocated to eligible green activities.

Step 2: Controversy and Safeguards Review

- Kestrel conducts a controversy review of the issuer and financed activities.
- Environmental and social safeguards are assessed in the context of applicable U.S. federal, state, and local regulatory frameworks.

Step 3: Blue Eligibility Determination

- Kestrel assesses whether 100% of the eligible green activities also meet Blue Bond criteria under this methodology.
- Alignment with SDG 6 and/or SDG 14 is evaluated.

For issuer-facing Second Party Opinions, Kestrel works with issuers to define **meaningful performance indicators** and reporting commitments. For data products, Kestrel monitors continued Blue eligibility as issuers return to market.

Eligible Blue Bonds are typically categorized into the following Kestrel-defined sectors.

- Wastewater
- Stormwater
- Drinking Water
- Flood Protection
- Ports
- Parks & Recreation
- Land and Water Resource Conservation

5. HOW TO ACCESS KESTREL'S BLUE BOND ELIGIBILITY REVIEW

Issuers and finance teams can request a no-cost eligibility review on any bond by contacting info@kestrelesg.com

Investors and others can subscribe to Kestrel's bond review database by contacting info@kestrelesg.com

6. ILLUSTRATIVE EXAMPLES

Kestrel will provide a set of representative examples of Blue-eligible municipal bonds, including:

- Issuer type;
- Use of proceeds;
- Blue-eligible sector;
- Alignment with SDG 6 and/or SDG 14; and
- Key safeguards and performance indicators.

A summary table of four illustrative examples will be added in a future version of this document.

This methodology will be reviewed periodically and updated to reflect market evolution, regulatory changes, and advances in Blue finance best practice.

© 2026 Kestrel 360, Inc.

Reproduction, repackaging, transmittal, dissemination, or redistribution of this content in whole or in part is prohibited without the express written approval of Kestrel 360, Inc. and is protected by copyright law.

About

Kestrel Sustainability Intelligence™ for municipal markets helps set the market standard for sustainable finance. We do this through verification and our comprehensive Sustainability Intelligence.

Kestrel is a leading provider of external reviews for green, social and sustainability bond transactions. We evaluate corporate and municipal bonds in all sectors worldwide for conformance with international green, blue and social bond standards.

kestrelesg.com | info@kestrelesg.com



For more information, contact:

Monica Reid, CEO
monica.reid@kestrelesg.com
541-399-6806

Notice & Disclaimer

Kestrel Sustainability Intelligence™, including Kestrel Sustainability Analysis and Scores™, is owned by Kestrel 360, Inc., ("Kestrel") and is designed to provide meaningful sustainability analysis to market participants.

The information produced, disseminated or delivered by Kestrel does not address financial performance of any investment, or the financial effectiveness of allocation of an issuer's proceeds. Kestrel does not make any assessment of the creditworthiness of a bond issuer, or its ability to pay principal and interest when due. Kestrel Sustainability Intelligence is not provided to recommend, endorse, approve or otherwise express any opinion regarding investments in bonds, nor is it intended to constitute investment advice or a recommendation to make (or refrain from making) any kind of investment decision, and therefore may not be relied on as such. Issuers mentioned or included in any Kestrel Sustainability Intelligence materials may include clients of Kestrel, or suppliers to Kestrel, who may also purchase research or other products or services from Kestrel.

This document and all of the information contained in it, including without limitation all text, data, graphs, charts (collectively, the "Information") is the property of Kestrel or Kestrel's licensors, and is provided for informational purposes only. Without Kestrel's express permission, the Information may not be used, modified, reverse-engineered, reproduced, disseminated in whole or in part, used to create derivative works, indexes, databases, risk models, analytics, software, or to verify or correct other data or information, or in connection with the issuing, offering, sponsoring, managing or marketing of any securities, portfolios, financial products or other investment vehicles utilizing or based on, linked to, tracking or otherwise derived from the Information or any other information, products or services offered by Kestrel.

Kestrel is not liable for consequences when third parties use this data either to make investment decisions or to undertake any other business transactions. The user of the Information assumes the entire risk of any use it may make or permit to be made of the Information. KESTREL MAKES NO EXPRESS OR IMPLIED WARRANTIES OR REPRESENTATIONS WITH RESPECT TO THE INFORMATION (OR THE RESULTS TO BE OBTAINED BY THE USE THEREOF), AND TO THE MAXIMUM EXTENT PERMITTED BY APPLICABLE LAW, KESTREL EXPRESSLY DISCLAIMS ALL IMPLIED WARRANTIES (INCLUDING, WITHOUT LIMITATION, ANY IMPLIED WARRANTIES OF ORIGINALITY, ACCURACY, TIMELINESS, NONINFRINGEMENT, COMPLETENESS, MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE) WITH RESPECT TO ANY OF THE INFORMATION.

Without limiting any of the foregoing and to the maximum extent permitted by applicable law, in no event shall Kestrel have any liability regarding any of the Information for any direct, indirect, special, punitive, consequential (including lost profits) or any other damages even if notified of the possibility of such damages.