

# Coherence without uniformity

## A shared architecture for maritime decarbonisation

The Carbon Basel Accord proposes a shared architecture for maritime decarbonisation: comparable measurement, interoperable carbon pricing and coordinated supervision. Its purpose is to connect the evidence, incentives and institutions on which the transition depends, while preserving the authority of existing regulators.

## The problem the framework addresses

A fuel claim, an emissions report and a compliance decision can move through different institutions without a common interpretation of the underlying evidence. The book argues that this fragmentation creates uncertainty for operators, fuel suppliers, investors and authorities. Adding obligations alone cannot resolve disagreements over measurement boundaries, recognition of fuel claims or responsibility for a discrepancy. The proposed response is a framework that makes these interfaces explicit.

## Three pillars. One architecture.

- I Global Measurement**

Align emissions measurement, life-cycle assessment and verification around traceable evidence. Digital fuel passports would connect a fuel batch to its production pathway, supplier identity, emissions methodology and verification record. Tank-to-wake and well-to-wake values remain distinguishable, so different regulatory boundaries can be mapped without confusing the quantities being compared.
- II Interoperable Carbon Pricing**

Develop transparent ways to compare the effects of distinct carbon markets and fuel standards. The proposal explores carbon translation, equivalence and cross-border settlement while retaining regional policy choices. Recognition would depend on agreed rules, eligible evidence and competent authorities; a shared dataset does not itself create an offset, allowance or transferable compliance value.
- III Coordinated Supervision**

Connect flag administrations, port State control, classification societies, verifiers and relevant regulators through defined information-sharing and escalation arrangements. Supervisory colleges and common risk indicators are proposed ways to address inconsistent findings and suspicious records. Each participant acts within its mandate, with responsibility for investigation, correction and closure clearly assigned.

# From framework to practice

## A proposed sequence for implementation

The book describes a progression from limited pilots to wider institutional coordination. These are proposed stages, not an announced programme or a guaranteed timetable.

- 01 Prototype integration.** Test common data definitions, fuel passports and verification interfaces in a bounded pilot.
- 02 Pathway consolidation.** Assess whether participating suppliers, ports and verifiers can consistently use the same evidence.
- 03 Institutional embedding.** Agree responsibilities, recognition conditions and escalation procedures across participating bodies.
- 04 Wider coherence.** Extend arrangements only after their technical performance and institutional acceptance are demonstrated.

## What a first pilot should demonstrate

A useful first pilot would follow one fuel batch through measurement, commercial interpretation and supervisory review. Its success should be judged against evidence:

- **Traceability:** can reviewers reconstruct the source, methodology, version and verification status of each material value?
- **Comparability:** are emissions boundaries, units and reporting periods explicit, with disagreements recorded?
- **Accountability:** does every unresolved discrepancy have an owner, an escalation route and a closure record?
- **Practical value:** does the pilot reduce repeated data work or disputed claims without weakening verification?

Implementation would require agreement on data access, confidentiality, verifier competence, recognition rules and resources. Capacity-building and proportionate participation are central to the book's equity argument. A digital signature can identify a record's issuer and reveal later alteration; it cannot establish that the original claim was accurate.

## Status and source

The Carbon Basel Accord is an independent policy proposal. This companion brief does not establish an adopted international accord, regulatory endorsement or a new compliance obligation. Expected benefits depend on implementation and evidence; existing requirements continue to govern actual compliance decisions.

Based on *The Carbon Basel Accord: A Global Blueprint for Maritime Decarbonisation, Digital Integrity & Regulatory Coherence*, by Stylianos N. Mourtzanos (December 2025). Principal source sections: Chapters 4-7 and 13. Paperback ISBN: 9798278211402. The pilot evaluation questions are companion guidance derived from the framework.

Read the worked example: [carbonbaselaccord.com/worked-example/](https://carbonbaselaccord.com/worked-example/)