

International Shipping Regulations

Afsl – Acronym for Agreement on the Facilitation of International Maritime Trade. Related terms: customs simplification, port state control. This UN-initiated framework streamlines documentation and reduces delays at ports. Example: A vessel using electronic cargo manifests under Afsl experiences faster clearance. Challenge: Varying national adoption rates can limit uniform benefits.

Arctic Shipping Guidelines – Set of best-practice recommendations for navigation in polar waters. Related terms: Ice Class, Polar Code. The guidelines address hull reinforcement, crew training, and emergency response in icy conditions. Practical application: A bulk carrier transiting the Northern Sea Route must meet ice-strength standards. Challenge: Rapid climate change creates unpredictable ice patterns, demanding constant updates.

Ballast Water Management Convention (BWMC) – International treaty adopted by the IMO to control invasive species transfer via ballast water. Related terms: Ballast water treatment system, IMO D-2 standard. Vessels must obtain a discharge certificate after treatment. Example: A container ship installs a UV-based system to comply. Challenge: High retrofitting costs for older fleets.

Berth Allocation System (BAS) – Computer-based procedure used by ports to assign docking slots. Related terms: Port Call Optimization, Turnaround Time. BAS improves berth utilization and reduces vessel waiting time. Practical use: A terminal operator integrates vessel ETA data to allocate berths dynamically. Challenge: Inaccurate ETA forecasts can cause congestion.

Berth Reservation – Pre-booking of a specific dock for a scheduled vessel arrival. Related terms: Port Call Notice, Slot Booking. Allows shippers to coordinate cargo handling and labor. Example: A liner service reserves a deep-water berth for a 10,000-TEU ship. Challenge: Last-minute changes in weather may force reallocation.

Charter Party – Legal contract between shipowner and charterer outlining freight terms. Related terms: Voyage Charter, Time Charter, Bareboat Charter. Defines responsibilities for cargo loading, payment, and demurrage. Practical example: A oil trader signs a voyage charter for a tanker to transport crude. Challenge: Clauses on force majeure can be contested after unexpected events.

Clean Shipping Act – Domestic legislation in several jurisdictions aimed at reducing emissions from vessels. Related terms: Emission Control Areas (ECAs), IMO 2020. Sets limits on sulfur oxides (SOx) and nitrogen oxides (NOx). Example: A vessel operating in the North Sea must use low-sulfur fuel or install scrubbers. Challenge: Compliance monitoring across flag states.

Coalition for Maritime Safety (CMS) – Non-governmental alliance promoting safety standards. Related terms: Safety Management System (SMS), IMO Model Regulations. CMS publishes guidelines on crew fatigue and equipment maintenance. Practical application: A shipping company adopts CMS-recommended

watch-keeping rotations. Challenge: Voluntary nature means uneven implementation.

Common Carrier Clause – Provision in a charter party that obligates the shipowner to transport cargo without discrimination. Related terms: Freight Forwarder, Non-Discrimination. Ensures that all cargoes receive equal treatment. Example: A liner carrier cannot refuse cargo based on origin if the clause applies. Challenge: Interpreting “reasonable” capacity limits during overload.

Commercial Invoice – Document issued by the seller detailing goods, value, and terms of sale. Related terms: Bill of Lading, Customs Declaration. Required for customs clearance and freight billing. Practical use: A exporter provides a commercial invoice to the consignee for duty assessment. Challenge: Mismatched data between invoice and manifest can trigger inspections.

Compliance Monitoring Program (CMP) – System used by flag states to verify that vessels meet regulatory standards. Related terms: Flag State Control, Port State Control (PSC). CMP includes inspections, audits, and reporting. Example: A flag state conducts quarterly hull surveys under its CMP. Challenge: Limited resources may lead to infrequent checks.

Congestion Management Plan (CMP) – Strategy employed by ports to alleviate vessel traffic buildup. Related terms: Just-In-Time Arrival, Vessel Traffic Service (VTS). Involves scheduling, rerouting, and berth reassignment. Practical application: A congested hub implements a staggered arrival schedule for feeder ships. Challenge: Unpredictable weather can disrupt the plan.

Container Safety Convention (CSC) – International agreement governing the safe transport of containers. Related terms: CSC Plate, Periodic Inspection. Requires containers to be inspected every five years. Example: A logistics provider records CSC compliance before loading a 40-foot box. Challenge: Aging container pools may fail inspection, causing cargo delays.

Customs Bond – Financial guarantee posted to assure customs authorities of payment of duties. Related terms: Import Bond, Surety. Used when cargo is transported under bond without immediate duty payment. Practical scenario: A freight forwarder secures a customs bond for imported machinery. Challenge: Bond limits may be insufficient for high-value shipments.

Deadweight Tonnage (DWT) – Measure of how much weight a ship can safely carry, including cargo, fuel, provisions, and crew. Related terms: Gross Tonnage (GT), Net Tonnage (NT). Determines cargo capacity and port fees. Example: A vessel with 70,000 DWT can transport roughly 70,000 metric tons of bulk cargo. Challenge: Miscalculating DWT can lead to overloading penalties.

Designated Port State Control (DPSC) – List of ports authorized to conduct inspections on behalf of a flag state. Related terms: Mutual Recognition Agreement (MRA), Inspection Regime. DPSC enhances efficiency by reducing duplicate checks. Practical use: A vessel flagged to Country X receives a DPSC inspection in Port Y. Challenge: Varying inspection standards among DPSC members.

Double-Hull Requirement – Structural mandate that oil tankers must have two layers of hull plating. Related terms: Oil Pollution Act (OPA) 90, Segregated Ballast Tank. Reduces risk of oil spillage in case of hull breach. Example: A VLCC built after 1995 complies with double-hull rules. Challenge: Retrofitting older single-hull

vessels is costly.

Electronic Data Interchange (EDI) – Standardized electronic communication of shipping documents between parties. Related terms: ANSI X12, UN/EDIFACT. Enables rapid transmission of bills of lading, manifests, and customs data. Practical application: A carrier submits EDI messages to a port authority for berth allocation. Challenge: Mismatched EDI versions can cause data loss.

Emission Control Area (ECA) – Sea zones where stricter limits on sulfur and nitrogen oxides are enforced. Related terms: IMO MARPOL Annex VI, Low-Sulfur Fuel. Vessels must comply with $\leq 0.10\%$ Sulfur fuel or install scrubbers. Example: A cargo ship entering the Baltic Sea switches to marine gas oil. Challenge: Fuel availability and price volatility within ECAs.

European Union Shipping Regulation (EUSR) – Set of directives governing safety, environmental, and labor standards for vessels operating in EU waters. Related terms: EU MRV, EU ETS. Requires annual emissions reporting and compliance with safety directives. Practical use: A shipowner files an EU MRV report for CO₂ emissions. Challenge: Aligning national laws with EU directives can be complex for non-EU flag vessels.

Flag State – Country under whose laws a vessel is registered and whose authority is responsible for enforcement. Related terms: Flag of Convenience, Port State Control (PSC). Determines regulatory regime, inspections, and tax obligations. Example: A vessel flying the Marshall Islands flag follows that state's safety code. Challenge: Flag states with limited oversight may face scrutiny from PSC authorities.

Freight Forwarder – Intermediary that arranges transportation, documentation, and customs clearance for shippers. Related terms: NVOCC, Consolidator. Provides door-to-door logistics services. Practical application: A forwarder consolidates several LCL shipments into a full container load. Challenge: Liability exposure if cargo is damaged during handling.

General Average (GA) – Maritime principle where all parties share the loss incurred from sacrificing part of the cargo or vessel to save the whole. Related terms: Salvage, Adjuster. GA is declared after a peril such as grounding. Example: After jettisoning cargo to refloat a ship, the shipowner files a GA claim. Challenge: Calculating each party's contribution can be contentious and time-consuming.

Global Maritime Distress and Safety System (GMDSS) – International communication protocol for ship-to-shore and ship-to-ship distress alerts. Related terms: EPIRB, SART. Requires specific radio equipment based on voyage area. Practical use: A vessel transmits a GMDSS distress call after a collision. Challenge: Equipment maintenance and crew training must be up-to-date.

Hazardous Materials (HazMat) Declaration – Document detailing the nature, quantity, and handling instructions for dangerous cargo. Related terms: IMDG Code, Safety Data Sheet (SDS). Required for customs and carrier safety. Example: A chemical exporter submits a HazMat declaration for a tanker load of sulfuric acid. Challenge: Misclassification can lead to fines and transport bans.

International Convention for the Safety of Life at Sea (SOLAS) – Core maritime treaty establishing minimum safety standards for ships. Related terms: Ship Safety Certificate, Fire Protection. Covers construction, equipment, and emergency procedures. Practical application: A vessel must carry a SOLAS-approved fire

detection system. Challenge: Periodic amendments require continuous compliance updates.

International Convention on Standards of Training, Certification and Watchkeeping for Seafarers (STCW) – Global framework governing seafarer qualifications and training. Related terms: Certificate of Competency, Basic Safety Training. Ensures uniform competence levels. Example: A deck officer holds an STCW-endorsed master's license. Challenge: Differing national implementation can cause gaps in crew readiness.

International Maritime Organization (IMO) – United Nations specialized agency responsible for regulating shipping. Related terms: Maritime Safety, Environmental Protection. Develops conventions such as SOLA, MARPOL, and the Polar Code. Practical role: IMO adopts amendments to reduce greenhouse-gas emissions. Challenge: Achieving consensus among 170 member states can be slow.

International Maritime Satellite Organization (IMSO) – Entity that manages satellite communications for maritime safety, including the Inmarsat system. Related terms: GMDSS, Marine Satellite Service. Provides voice and data services to vessels worldwide. Example: A ship uses IMSO-approved satellite phones for distress alerts. Challenge: Subscription costs and equipment compatibility for older vessels.

International Maritime Transport Association (IMTA) – Industry group representing shipping lines and operators. Related terms: Freight Rate Index, Policy Advocacy. Engages with regulators on trade facilitation. Practical use: IMTA submits position papers on bunker fuel standards. Challenge: Balancing member interests across diverse market segments.

International Ship and Port Facility Security (ISPS) Code – Security framework adopted after 9/11 to protect ships and ports. Related terms: Ship Security Plan (SSP), Port Facility Security Officer (PFSO). Requires security assessments and designated officers. Example: A container vessel submits its SSP to the port authority for approval. Challenge: Maintaining updated threat assessments and crew awareness.

International Standard Maritime Communication Code (ISMCC) – Set of standardized phrases for shipboard communication to avoid misunderstandings. Related terms: Standard Marine Communication Phrases (SMCP), Bridge Resource Management. Used in training and daily operations. Practical example: Bridge crew uses ISMCC during a maneuver to ensure clarity. Challenge: Language proficiency variations among multinational crews.

International Ship Registry (ISR) – Database that records vessels registered under a particular flag. Related terms: Flag State, Ship Identification Number (IMO No.). Provides transparency for ownership and compliance status. Example: A charterer checks the ISR to verify a ship's flag and safety record. Challenge: Data may be outdated if updates are not promptly entered.

International Trade Classification (ITC) – System for categorizing goods for customs and statistical purposes. Related terms: HS Code, Tariff Schedule. Determines duty rates and eligibility for trade agreements. Practical use: A exporter classifies a product under HS 8703 for motor vehicles. Challenge: Frequent revisions to the HS nomenclature require continuous monitoring.

International Transport Workers' Federation (ITF) – Global union federation representing seafarers. Related terms: Collective Bargaining, Seafarers' Rights. Advocates for fair wages, safe working conditions, and

repatriation. Example: ITF negotiates a standard employment agreement for crew on container ships. Challenge: Enforcement of agreements across multiple flag states.

International Union of Marine Insurance (IUMI) – Association of marine insurers that develops standard policy wording. Related terms: Hull & Machinery (H&M) Insurance, Protection & Indemnity (P&I) Clubs. Provides model clauses for loss coverage. Practical example: A shipowner purchases a hull policy based on IUMI's standard form. Challenge: Local legal variations may affect policy applicability.

Joint Inspection Programme (JIP) – Collaborative arrangement where two or more flag states share inspection responsibilities. Related terms: Mutual Recognition, Inspection Reciprocity. Reduces duplicate surveys and improves efficiency. Example: Flag A and Flag B agree to accept each other's hull inspections. Challenge: Aligning inspection criteria and quality assurance across jurisdictions.

Korean Register of Shipping (KR) – Classification society that sets technical standards for vessel design and construction. Related terms: Class Notation, Survey. Issues certificates confirming compliance with international rules. Practical use: A new LNG carrier obtains KR class for hull integrity. Challenge: Maintaining consistent standards with IMO amendments.

Laytime – Period allowed for loading or unloading cargo without incurring demurrage. Related terms: Demurrage, Free Period. Calculated based on charter party terms. Example: A charterer has 48 hours of laytime to discharge a bulk cargo. Challenge: Delays due to weather or port congestion can trigger costly demurrage.

Letter of Credit (L/C) – Bank instrument guaranteeing payment to the seller upon presentation of compliant documents. Related terms: Documentary Credit, Negotiation. Common in international trade to secure financing. Practical scenario: An exporter presents a bill of lading and commercial invoice to receive payment. Challenge: Strict document compliance can lead to discrepancies and payment delays.

Marine Environmental Protection Committee (MEPC) – IMO subsidiary body that develops policies on pollution prevention. Related terms: MARPOL Annexes, Ballast Water Management. Issues resolutions on oil, garbage, and air emissions. Example: MEPC adopts a new amendment limiting VOC emissions from tankers. Challenge: Translating resolutions into enforceable national legislation.

Marine Insurance – Coverage protecting shipowners against loss or damage to vessels and cargo. Related terms: Hull & Machinery, Protection & Indemnity. Policies may be underwritten by P&I clubs. Practical use: A shipowner purchases a hull policy for a newly built vessel. Challenge: Assessing risk for high-value cargoes in piracy-prone regions.

Marine Pollution (MARPOL) Convention – International treaty regulating ship-generated pollution. Related terms: Annex I (Oil), Annex VI (Air). Establishes discharge limits for oil, chemicals, sewage, and garbage. Example: A bulk carrier must retain oil residues in its onboard tank for 72 hours before discharge. Challenge: Enforcement varies among port states, leading to uneven compliance.

Maritime Labour Convention (MLC) 2006 – Comprehensive set of rights and protections for seafarers. Related terms: Seafarer Certificate of Employment, Living Conditions. Covers wages, hours of work, health,

and safety. Practical example: A ship must provide adequate accommodation as per MLC standards. Challenge: Verifying compliance during short-notice port inspections.

Maritime Safety Committee (MSC) – IMO body responsible for safety standards and technical regulations. Related terms: SOLAS Amendments, Ship Construction. Issues guidelines on stability, fire safety, and life-saving appliances. Example: MSC adopts a new rule on shipboard fire detection for passenger vessels. Challenge: Ensuring timely adoption by all flag states.

Merchant Shipping Act – National legislation governing registration, operation, and enforcement of ships. Related terms: Flag Registration, Port State Control. Provides legal framework for domestic maritime activities. Practical use: A shipowner registers a vessel under the national act to obtain a certificate of registration. Challenge: Outdated provisions may conflict with newer international conventions.

Minimum Safe Manning (MSM) – Requirement that a vessel maintains enough qualified crew to operate safely. Related terms: STCW, Watchkeeping. Determined by vessel size, type, and operating area. Example: A tanker must have a minimum crew complement of 12 officers and 24 ratings. Challenge: Crew shortages can pressure operators to reduce manning, raising safety concerns.

Multimodal Transport – Movement of goods using two or more modes of transport under a single contract. Related terms: Combined Transport, Intermodal. Facilitates seamless logistics from origin to destination. Practical application: A shipment travels by truck, rail, and vessel under one bill of lading. Challenge: Coordinating regulations across different transport sectors.

Naval Architecture – Discipline of designing ship hulls and structures to meet performance, safety, and regulatory criteria. Related terms: Stability, Hydrodynamics. Informs classification society approvals. Example: Naval architects calculate the metacentric height to ensure adequate stability. Challenge: Integrating new eco-design features while complying with existing standards.

National Maritime Policy (NMP) – Government-issued strategy outlining objectives for maritime development, security, and regulation. Related terms: Port Development, Maritime Transport. Guides investment and legislative priorities. Practical use: A country adopts an NMP to expand its container terminal capacity. Challenge: Aligning the policy with international obligations and market realities.

Navigation Safety Management System (NSMS) – Structured approach to ensure safe navigation through procedures, training, and monitoring. Related terms: Bridge Resource Management, Risk Assessment. Implemented as part of a vessel's SMS. Example: A ship's NSMS includes regular ECDIS updates and crew drills. Challenge: Maintaining system effectiveness amid crew turnover.

Neutral Flag – Flag of a country that does not participate in a conflict, offering protection from belligerent actions. Related terms: Flag of Convenience, International Neutrality. Used historically to avoid seizure during wartime. Practical example: A vessel registers under a neutral flag to transit a war zone. Challenge: Neutrality may be questioned if the flag state is perceived to support one side.

Non-Detention Clause – Provision in a charter party that limits the shipowner's liability for cargo damage caused by external factors. Related terms: Force Majeure, Limitation of Liability. Protects owners from

unforeseen events. Example: A clause excludes liability for damage caused by extreme weather. Challenge: Interpreting the scope of “non-detention” during disputes.

Notice of Arrival (NOA) – Formal notification sent by a vessel to the upcoming port indicating ETA, cargo details, and crew list. Related terms: Port Call Notice, Berth Request. Enables port authorities to prepare services. Practical use: A ship submits an NOA 24 hours before docking. Challenge: Inaccurate ETA can cause berth conflicts and congestion.

Ocean Carrier – Shipping line that provides vessel space for cargo across oceanic routes. Related terms: Liner Service, Tramp Service. Operates scheduled or non-scheduled voyages. Example: An ocean carrier offers weekly services between Asia and Europe. Challenge: Fluctuating freight rates affect capacity planning.

Operational Readiness Review (ORR) – Assessment conducted before a vessel commences a voyage to verify compliance with safety and regulatory requirements. Related terms: Pre-Departure Inspection, Compliance Check. Ensures all certificates, equipment, and crew are in order. Example: A ship’s master signs off an ORR after completing a hull survey. Challenge: Time pressure may lead to incomplete checks.

Overboard Accident Reporting System (OARS) – Mandatory reporting mechanism for crew members who fall overboard. Related terms: Search and Rescue (SAR), Safety Management System. Facilitates rapid response and investigation. Practical scenario: A deckhand is reported missing; OARS triggers a SAR alert. Challenge: Delayed reporting reduces rescue chances.

Port State Control (PSC) – Inspection regime where a port authority verifies foreign vessels’ compliance with international conventions. Related terms: Flag State Control, Detention. Conducts checks on safety, pollution, and crew qualifications. Example: PSC in Rotterdam detains a ship for inadequate fire-extinguishing equipment. Challenge: High inspection volume can strain resources.

Port Facility Security Plan (PFSP) – Document that outlines security measures for a port, including access control, surveillance, and emergency response. Related terms: ISPS Code, PFSO. Required for ports handling high-risk cargoes. Practical use: A PFSP details procedures for screening containers entering a terminal. Challenge: Keeping the plan current with evolving threat intelligence.

Port Call Notice (PCN) – Communication from a vessel to a port authority indicating intended arrival, cargo operations, and required services. Related terms: NOA, Berth Allocation. Enables coordination of pilots, tugs, and stevedores. Example: A ship sends a PCN 48 hours before arrival to request a pilot. Challenge: Last-minute changes can disrupt port schedules.

Port Congestion Index (PCI) – Metric measuring the level of traffic and delay at a port. Related terms: Turnaround Time, Vessel Queue. Used by shippers to assess reliability. Practical application: A logistics firm monitors PCI to select alternative ports during peak seasons. Challenge: Sudden weather events can cause rapid spikes in the index.

Port Reception Facilities (PRF) – Infrastructure at ports for receiving ship-generated waste, such as oily water, garbage, and sewage. Related terms: Port Reception Facility (PRF) Code, Pollution Control. Required

under MARPOL. Example: A vessel discharges sludge at a certified PRF to comply with Annex V. Challenge: Limited PRF capacity in remote ports may force ships to retain waste longer.

Port Reception Facility (PRF) Code – IMO guideline that classifies ports based on the types of waste they can accept. Related terms: PRF, Waste Management. Helps shipmasters identify suitable discharge locations. Practical use: A tanker checks the PRF code to find a port that can receive its oily sludge. Challenge: Outdated data may mislead operators.

Port State Control Detention (PSC Detention) – Action taken when a vessel fails inspection and is barred from sailing until deficiencies are corrected. Related terms: Deficiency List, Rectification. Often results from serious safety or pollution violations. Example: A ship is detained for faulty fire pumps. Challenge: Detention can cause significant commercial losses and reputational damage.

Port Terminal Operator (PTO) – Company responsible for managing cargo handling, storage, and vessel services at a port. Related terms: Stevedoring, Terminal Operating System. Coordinates with shipping lines and customs. Practical example: A PTO schedules crane assignments for a container vessel's unloading. Challenge: Labor disputes can disrupt terminal operations.

Pre-Delivery Inspection (PDI) – Examination performed by a buyer or classification society before taking ownership of a new vessel. Related terms: Builder's Warranty, Sea Trial. Verifies that the ship meets contractual specifications. Example: A charterer conducts a PDI to confirm the vessel's propulsion performance. Challenge: Negotiating remedial work can delay delivery.

Pre-Installation Survey (PIS) – Inspection of equipment before it is installed on a vessel, ensuring compliance with class and regulatory standards. Related terms: Equipment Certification, Class Approval. Used for safety-critical systems like fire suppression. Practical use: A PIS verifies a new ballast water treatment unit before integration. Challenge: Supply-chain delays may pressure survey timelines.

Premises Liability – Legal responsibility of a port or terminal for injuries occurring on its property. Related terms: Negligence, Occupier's Liability. Applies to workers, visitors, and cargo. Example: A dockworker sues a terminal for a slip-and-fall accident. Challenge: Establishing causation and duty of care in complex port environments.

Pre-loading Survey – Assessment conducted before cargo is loaded to ensure stowage plans meet safety and stability requirements. Related terms: Stability Calculation, Load Line. Critical for bulk carriers and tankers. Practical scenario: A surveyor checks a grain carrier's cargo distribution to avoid shifting. Challenge: Time constraints may limit thoroughness.

Pre-sailing Checklist – List of tasks to be completed before a vessel departs, covering safety equipment, documentation, and crew readiness. Related terms: Safety Management System, Operational Readiness Review. Ensures compliance with regulations. Example: A master verifies that life-jackets are inspected before departure. Challenge: Checklist fatigue can lead to missed items.

Procurement of Bunker Fuel – Process of acquiring marine fuel that meets regulatory specifications. Related terms: IMO 2020, Low-Sulfur Fuel. Involves supplier selection, quality testing, and documentation. Practical

use: A ship's chief engineer secures a bunker supply contract for VLSFO. Challenge: Price volatility and fuel quality disputes can cause operational interruptions.

Qualified Person (QP) – Individual authorized to certify that a vessel's equipment or systems meet applicable standards. Related terms: Classification Society, Surveyor. May sign off on safety devices or ballast water systems. Example: A QP approves the installation of a new navigation radar. Challenge: Ensuring the QP's credentials are recognized across jurisdictions.

Radiation Safety Regulations – Rules governing the transport and handling of radioactive materials on ships. Related terms: IAEA, Type A Package. Require shielding, labeling, and emergency procedures. Practical scenario: A vessel carries medical isotopes in compliance with the regulations. Challenge: Limited training and specialized equipment can increase risk.

Reefer Container – Refrigerated container used to transport temperature-sensitive cargo. Related terms: Temperature Monitoring, Cold Chain. Requires power supply and continuous monitoring. Example: A fruit exporter books a reefer for a voyage from Chile to Europe. Challenge: Power failures or temperature excursions can lead to cargo loss.

Refit – Major modification or upgrade of a vessel's structure, machinery, or equipment. Related terms: Dry Docking, Conversion. May be undertaken to meet new regulations or extend service life. Practical use: A ship undergoes a refit to install scrubbers for compliance with ECAs. Challenge: Project cost overruns and schedule delays.

Regulation (EC) No 1907/2006 (REACH) – European Union regulation governing chemicals and their safe use. Related terms: Substance Registration, Safety Data Sheet. Impacts shipping of hazardous cargoes entering EU ports. Example: A chemical exporter provides REACH-compliant documentation for a shipment of solvents. Challenge: Complex registration procedures can delay cargo entry.

Regulation (EC) No 1005/2009 (EU MRV) – Monitoring, Reporting and Verification regulation for CO₂ emissions from ships. Related terms: Carbon Intensity, Emission Reporting. Requires annual emissions data submission. Practical application: A shipowner files an MRV report detailing fuel consumption for voyages to EU ports. Challenge: Accurate data collection and verification across diverse voyages.

Regulation (EU) No 2016/1628 (EU ETS) – European Union Emissions Trading System covering maritime CO₂ emissions. Related terms: Carbon Allowances, Cap-and-Trade. Ships must surrender allowances equivalent to emitted CO₂. Example: A vessel purchases EU ETS allowances to cover its emissions. Challenge: Price fluctuations and administrative burden for non-EU flag vessels.

Regulation on the Facilitation of International Maritime Traffic (AFSL) – Regional framework promoting streamlined customs procedures for maritime trade. Related terms: Single Window, Customs Clearance. Encourages electronic submission of documents. Practical use: A carrier uses the AFSL portal to submit cargo manifests. Challenge: Interoperability with other national systems may be limited.

Risk Assessment Matrix – Tool used to evaluate the likelihood and impact of hazards in maritime operations. Related terms: Hazard Identification, Mitigation Measures. Guides resource allocation for safety. Example: A

ship's safety officer employs a matrix to prioritize fire-related risks. Challenge: Subjective judgments can affect consistency.

Risk Management Plan (RMP) – Document outlining strategies to identify, assess, and control operational risks. Related terms: Safety Management System, Contingency Planning. Integrated into a vessel's SMS. Practical application: An RMP details procedures for oil spill response. Challenge: Keeping the plan updated with emerging threats.

Roll-On/Roll-Off (RoRo) Vessel – Ship designed to carry wheeled cargo that can be driven on and off the vessel. Related terms: Car Carrier, Vehicle Transport. Utilizes ramps and decks for efficient loading. Example: A RoRo ferry transports trucks between the UK and France. Challenge: Securing cargo against shifting in rough seas.

Safety Management System (SMS) – Structured approach required by SOLAS and STCW to ensure safe operation and pollution prevention. Related terms: Document of Compliance (DOC), Company Assurance. Includes procedures, training, and audits. Practical use: A shipping company implements an SMS covering emergency drills. Challenge: Achieving consistent implementation across a dispersed fleet.

Safety of Life at Sea (SOLAS) Convention – Foundational treaty establishing minimum safety standards for ships. Related terms: Life-Saving Appliances, Fire Protection. Example: SOLAS mandates the carriage of lifeboats for vessels over 500 GT. Challenge: Frequent amendments require ongoing compliance efforts.

Segregated Ballast Tank (SBT) – Dedicated tank system that separates ballast water from cargo to prevent contamination. Related terms: Ballast Water Management, Double-Hull. Required for many oil tankers under MARPOL Annex I. Practical scenario: A tanker uses SBTs to comply with discharge standards. Challenge: Retrofitting older vessels with SBTs can be technically complex.

Ship Classification Society – Organization that establishes technical standards for vessel construction and issues certificates of compliance. Examples include ABS, DNV, LR, and KR. Practical use: A ship obtains class certification to demonstrate structural integrity. Challenge: Differing societies may have varying interpretation of rules, affecting global acceptance.

Ship Inspection Report (SIR) – Document summarizing findings from a vessel's survey or inspection. Used by flag states, classification societies, and PSC authorities. Example: An SIR notes inadequate fire alarm testing on a vessel. Challenge: Timely correction of reported deficiencies is essential to avoid detention.

Ship Owner's Liability – Legal responsibility of a vessel's owner for damages caused by the ship, including collisions, pollution, and cargo loss. Related terms: P&I Club, International Convention on Civil Liability. Often covered by insurance. Practical scenario: A shipowner's P&I club pays compensation for oil spill damages. Challenge: Proving fault and apportioning liability across multiple parties.

Ship Safety Certificate – Official document confirming that a vessel complies with applicable safety conventions. Related terms: Load Line Certificate, International Load Line. Issued after successful surveys. Example: A ship displays its SOLAS safety certificate on board. Challenge: Certificates must be renewed periodically; lapses can lead to operational bans.

Ship-to-Ship Transfer (STS) – Procedure for moving cargo between vessels at sea. Related terms: Transfer Equipment, Safety Protocol. Used for oil, LNG, and bulk cargoes. Practical use: An offshore supply vessel transfers diesel to a tanker. Challenge: Weather conditions and regulatory approvals add complexity.

Ship's Logbook – Official record of a vessel's operational activities, navigation, and incidents. Related terms: Electronic Logbook, Regulatory Reporting. Required by SOLAS and flag state regulations. Example: A master records a deviation from the planned route due to hazardous weather. Challenge: Ensuring accurate entries in real time.

Ship's Oil Record Book (SOFRB) – Log documenting oil handling, storage, and discharge operations.