



## **Session 7: Leveraging Modern Technologies for Priority Trade Facilitation Initiatives in CAREC**

*Accelerating efficiency, transparency & regional integration  
through digital customs innovation*

**Workshop on Advancing Digital and Green Trade Facilitation  
in CAREC Countries**

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# Leveraging Modern Technologies for Priority Trade Facilitation Initiatives in CAREC

*Accelerating efficiency, transparency & regional integration through digital customs innovation*

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# Executive Summary

- CAREC's location is a strategic trade bridge between Europe and Asia, yet border delays, fragmented systems & infrastructure gaps hinder competitiveness.
- Modern technologies such as Single Window, e-Customs, AI risk management, blockchain docs, IoT cargo monitoring & cloud platforms can streamline trade, cut costs & enhance transparency.
- The initiative aims to build a smart, interoperable trade ecosystem, aligned with WCO standards & CITA 2030, supported by capacity building, infrastructure modernization & PPP dialogue.

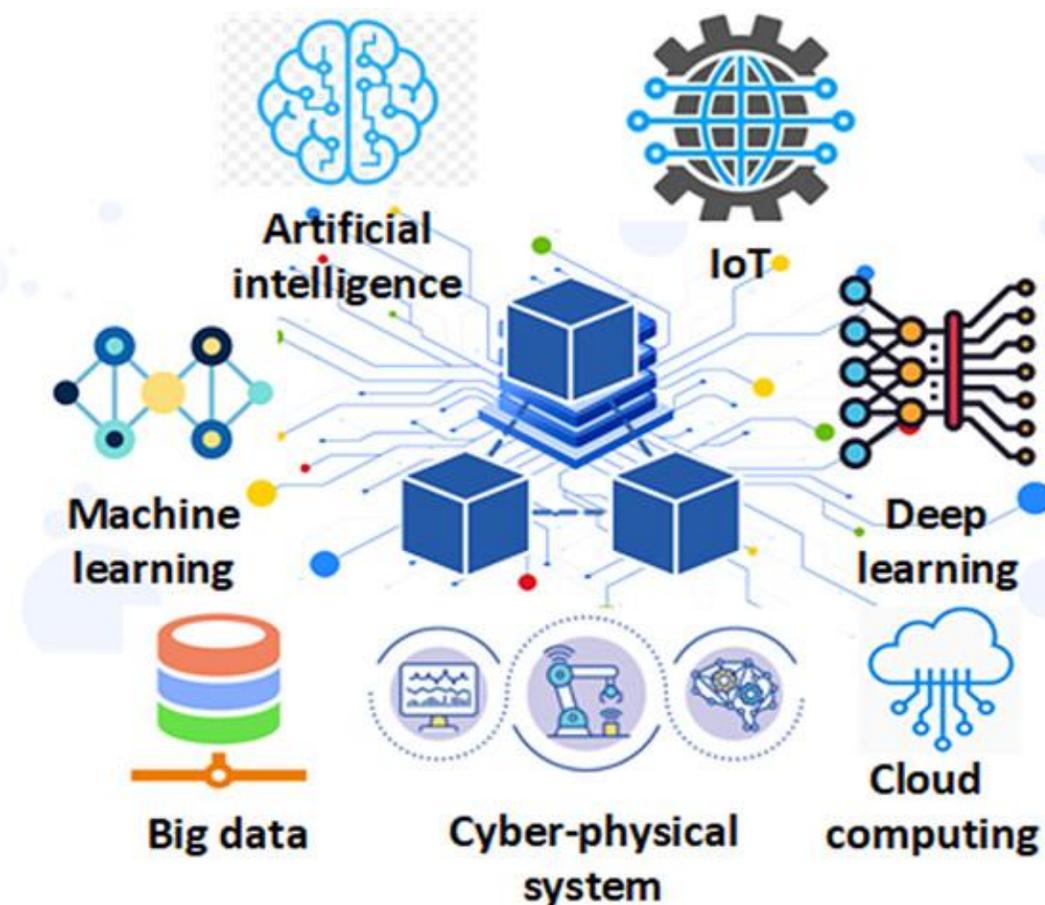
# Why Digital Trade Matters for CAREC?

- High trade costs & slow procedures limit export competitiveness.
- Fragmented systems reduce trust, predictability & interoperability.
- Digitalization enables paperless trade, risk-based controls, real-time cargo tracking & seamless data sharing.



# Technology Pillars

- Core Digital Systems: National Single Windows, e-Customs, inter-country connectivity
- Advanced Add-Ons: AI risk profiling, blockchain trade docs, IoT transit monitoring, cloud-based platforms



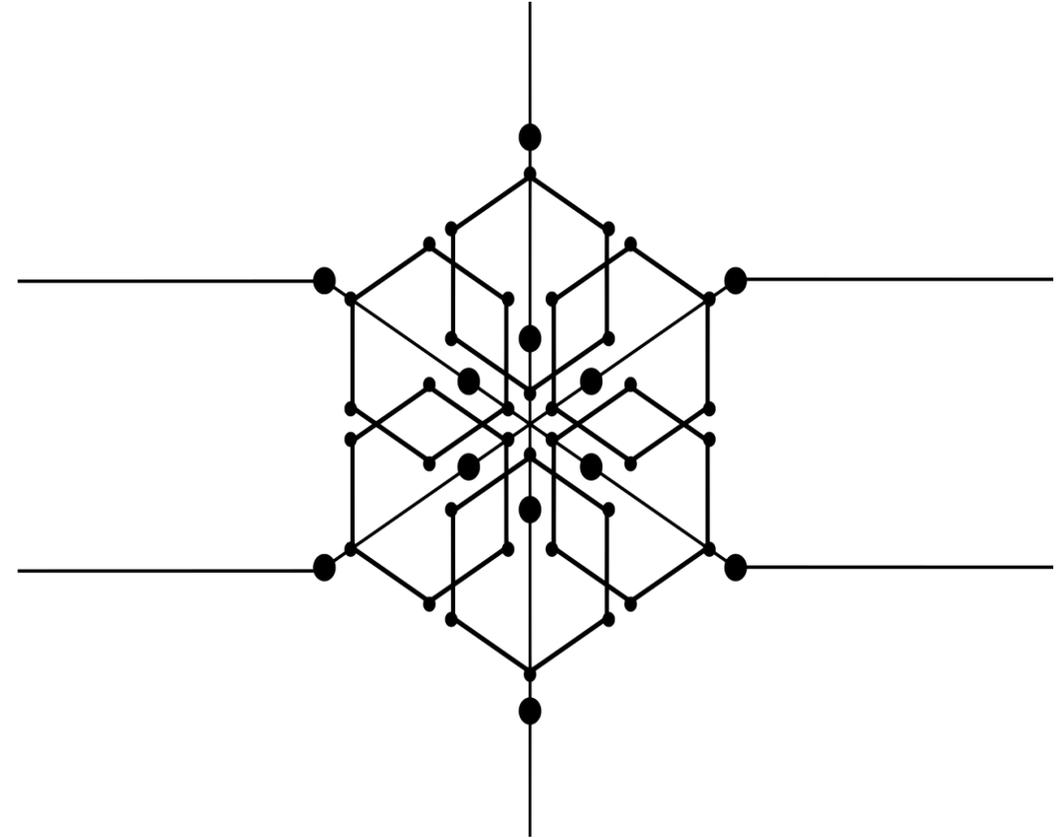
# Institutional Enablers

- Legal recognition of e-documents & signatures (UNCITRAL).
- Data privacy, cybersecurity & liability frameworks for cross-border trust.
- Capacity building aligned with WCO standards.
- Public–private dialogue to support business needs.



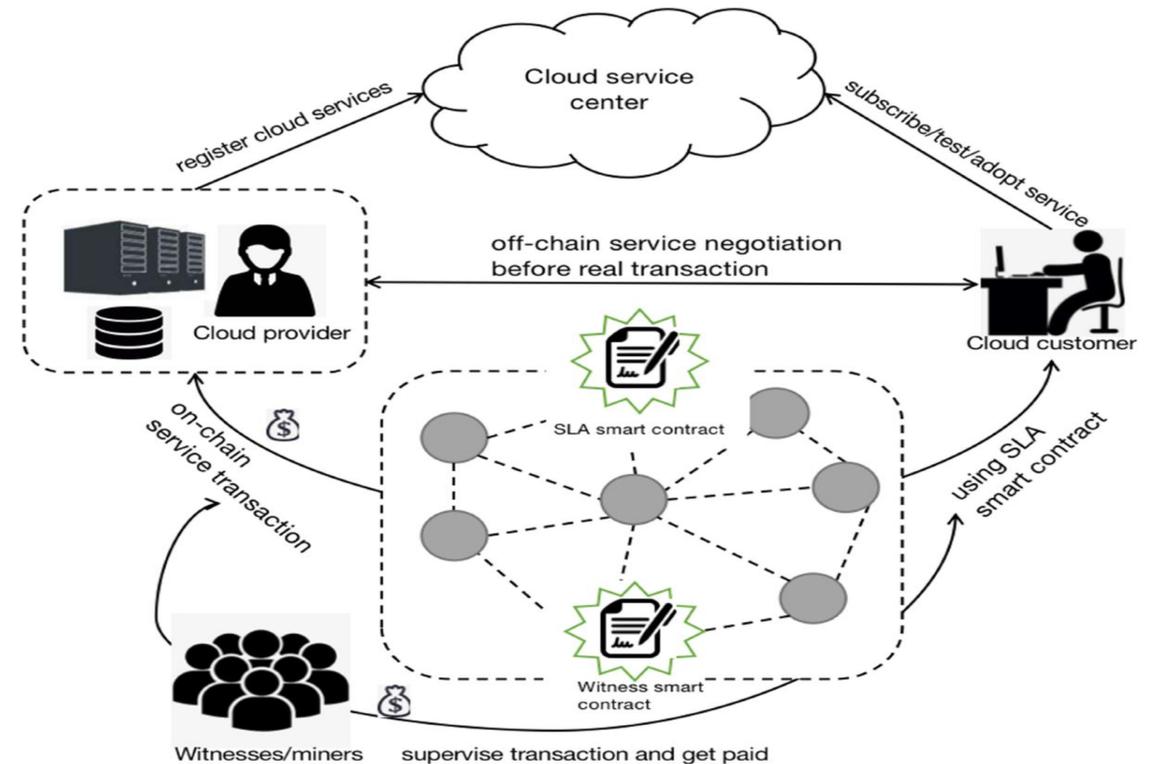
# Objectives of the Initiative

- Streamline cross-border processes & reduce costs.
- Create interoperable, paperless, risk-based customs systems.
- Strengthen institutional capacity, digital infrastructure & legal frameworks.
- Align reforms with WCO tools & CITA 2030 for regional integration.



# Methodology

- SMART, results-based KPIs aligned with CITA 2030.
- Baselines via LPI, customs data & Time Release Studies.
- Benchmarks from Singapore TradeNet & KCS.
- Pilot first then scale later (e.g., Almaty–Tashkent corridor for AI/IoT/blockchain).

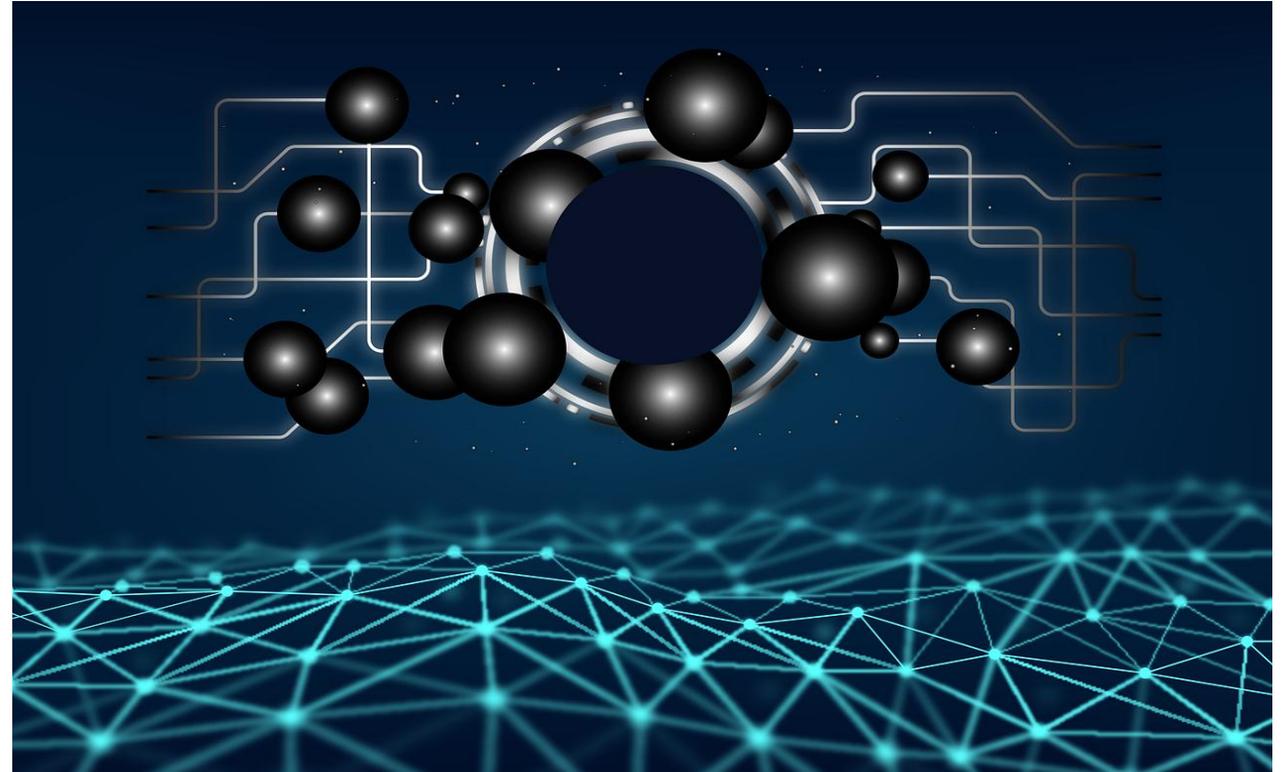


# KPIs Snapshot

KPI Area	Indicator	Target / Benchmark	Agency Responsibility	Supported by International Organizations
Digital Platforms	% of trade documents submitted electronically	≥ 80%	Customs Administration	WCO, UN/CEFACT
	Reduction in average border processing time	30%	Customs & Border Agencies	WCO, ADB
	System uptime	99%	IT / Customs Technology Units	WCO, KCS
Advanced Technologies	% of shipments screened through AI risk profiling	≥ 70%	Customs Risk Management Unit	KCS, ADB
	% of shipments tracked via IoT	≥ 50%	Transport / Logistics Agencies	UNESCAP, ADB
	Fraud reduction via blockchain-enabled certificates	Significant reduction	Customs & Trade Facilitation Units	WCO, ADB, KCS
Capacity & Policy	% of customs staff certified on WCO standards	≥ 50%	HR / Training Units	WCO, ADB
	Number of data breaches per year	0	IT Security / Customs	WCO, UNDP
	Annual alignment of reforms with CITA 2030	Yes / Completed	Policy & Strategy Units	ADB, CAREC Secretariat

# AI Policies for Inclusive Growth

- Inclusive policies expand SME access (Estonia, Rwanda).
- AI adoption supported by broadband, reskilling & SME financing.
- WTO, WCO & national frameworks enable equitable digital trade.



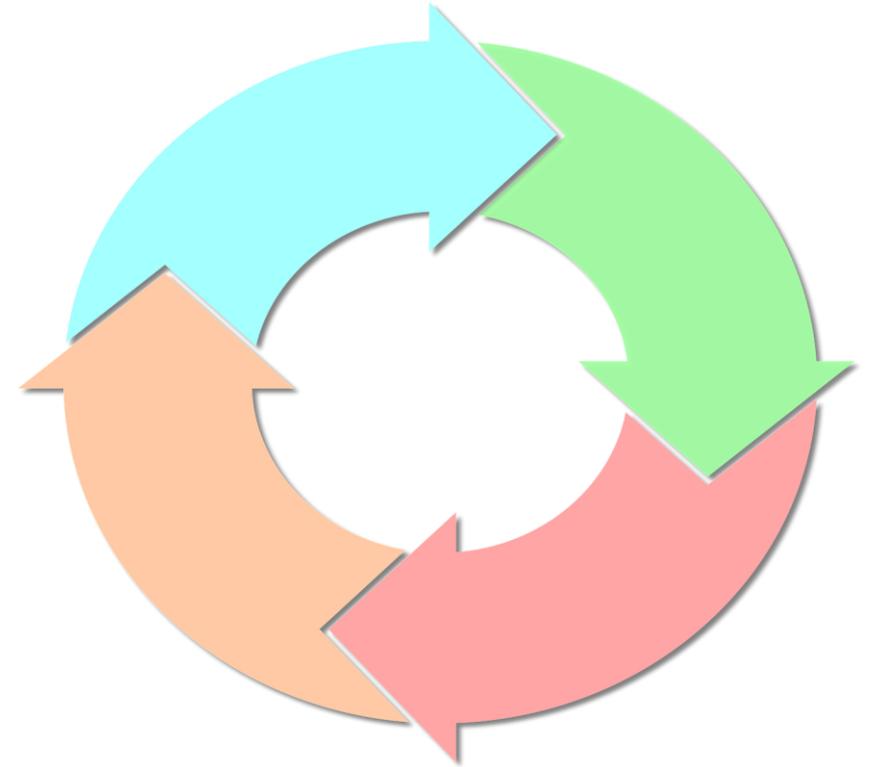
# Benefits to CAREC

- Faster, cheaper clearance (days to minutes, like Singapore).
- Enhanced trust & security with AI + blockchain.
- Regional interoperability strengthens CAREC's global trade role.
- Attracts investment, boosts exports, reduces corruption & informal fees.



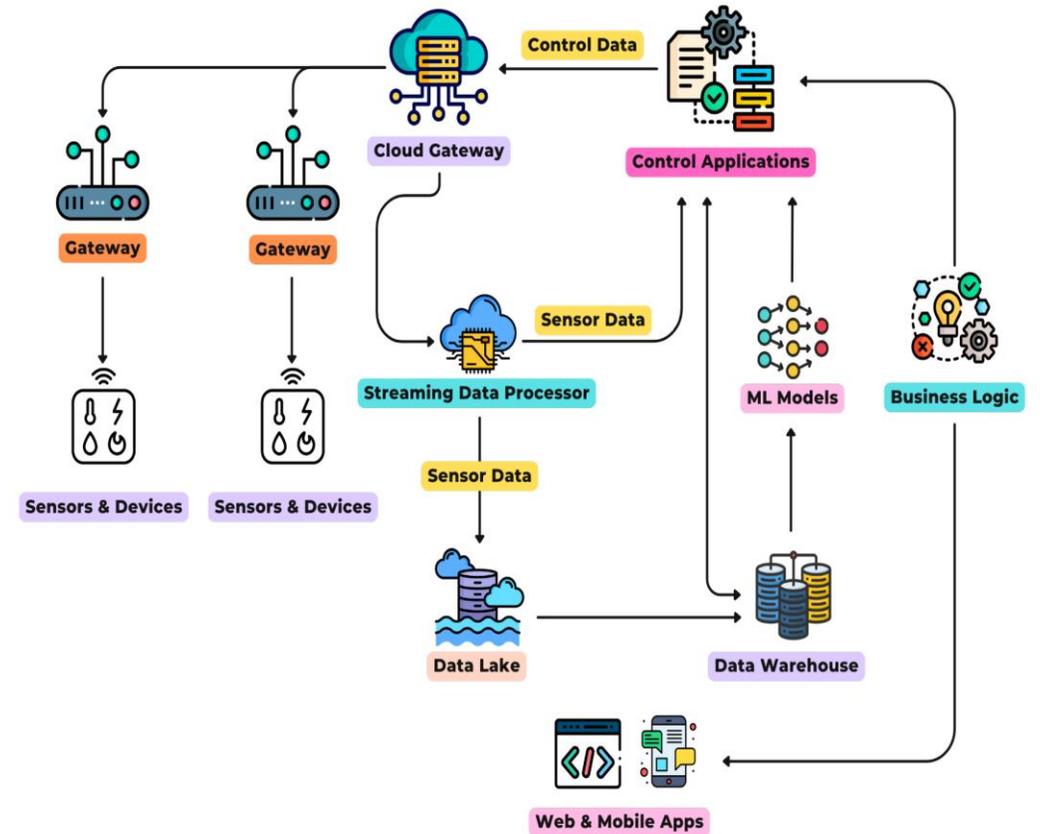
# Phased Implementation

- Phase 1: Baseline & legal readiness (diagnostics, stakeholder consults, e-doc laws)
- Phase 2: Pilot testing (AI risk, blockchain certificates, IoT monitoring)
- Phase 3: Scaling & harmonization (national deployment, WCO standards, mutual recognition)
- Phase 4: Regional integration (CAREC Regional Single Window with cloud, AI & IoT)



# Next Steps

- Launch regional diagnostics with ADB + KCS support.
- Prepare legal frameworks for e-docs & data protection.
- Begin pilots (AI risk, blockchain certificates, IoT transit).
- Establish regional KPI dashboard for CITA 2030 monitoring.



# Closing Message

- CAREC + KCS Collaboration = Smart, Secure & Competitive Regional Trade Corridor
- A technology-driven ecosystem connecting Europe & Asia.

