Nextrade Group

2023

CARBONLESS COMMERCE™

To net-zero world trade

NEXTRADE GROUP
World trade is changing. Are you?

PROBLEM

- Global shipping fleet's emissions rising to 17% of the global total emissions by 2025

- Ports and free trade zones still with considerable backlogs, idling, pollution

- SMEs produce 60% of emissions and lack capacity to measure their footprint and drive to net zero

CARBONLESS COMMERCE

Data, analysis and action to measure, mitigate, and manage carbon in global commerce

1. SMEs

- Measure SME traders' green transition

- Track green standards and barriers facing SMEs

- Platform to enable SMEs to measure their greening against customer standards, peer firms
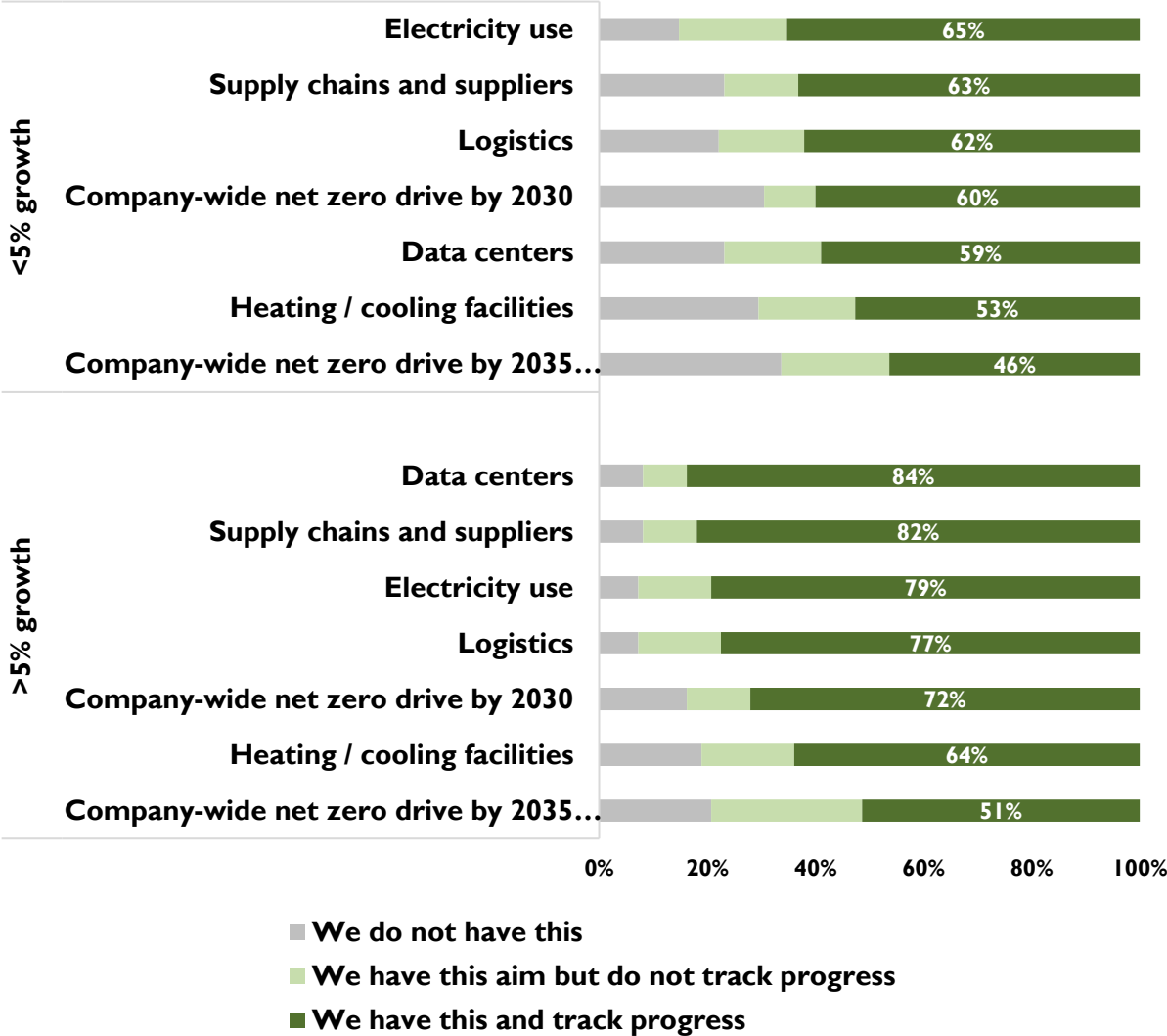
2. Ports and FTZs

- Identifying green port and green FTZ projects

- Understanding how digitization supports greening

- Lab of facilitate development of digital and green ports and corridors
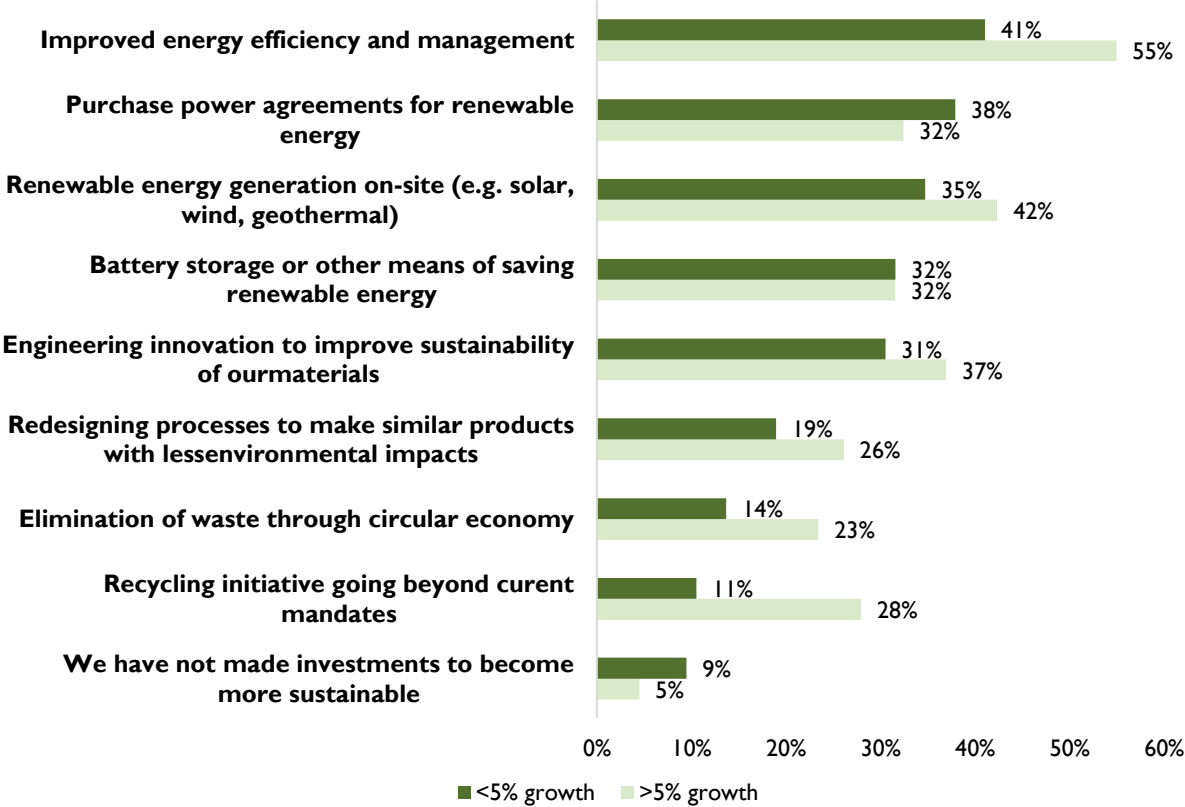
3. Logistics providers

- Tracking green fleets by providers and markets

- Developing market-based mechanisms to green developing country fleets

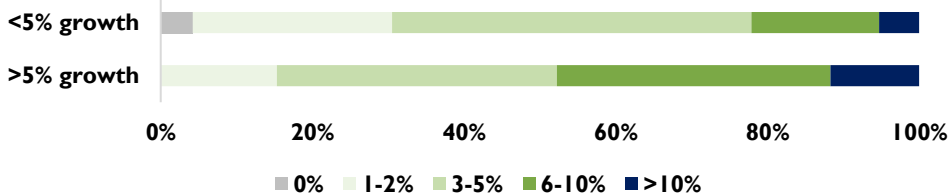# OUR EXPERIMENTAL DATA: FAST-GROWING EMERGING MARKET EXPORT-DRIVEN SMES HAVE ALREADY FOCUSED ON GREENING

Do you have sustainability / greening targets?

<5% growth

Category	%
Electricity use	65%
Supply chains and suppliers	63%
Logistics	62%
Company-wide net zero drive by 2030	60%
Data centers	59%
Heating / cooling facilities	53%
Company-wide net zero drive by 2035…	46%

>5% growth

Category	%
Data centers	84%
Supply chains and suppliers	82%
Electricity use	79%
Logistics	77%
Company-wide net zero drive by 2030	72%
Heating / cooling facilities	64%
Company-wide net zero drive by 2035…	51%

Legend:
- We do not have this
- We have this aim but do not track progress
- We have this and track progress

Investments to become more sustainable

Investment	<5% growth	>5% growth
Improved energy efficiency and management	41%	55%
Purchase power agreements for renewable energy	38%	32%
Renewable energy generation on-site (e.g. solar, wind, geothermal)	35%	42%
Battery storage or other means of saving renewable energy	32%	32%
Engineering innovation to improve sustainability of ourmaterials	31%	37%
Redesigning processes to make similar products with lessenvironmental impacts	19%	26%
Elimination of waste through circular economy	14%	23%
Recycling initiative going beyond curent mandates	11%	28%
We have not made investments to become more sustainable	9%	5%

Legend: ■ <5% growth ■ >5% growth

Most firms invest ~5% of revenue on sustainability

- <5% growth
- >5% growth

Legend: ■ 0% ■ 1-2% ■ 3-5% ■ 6-10% ■ >10%

SMES HAVE REPLACED DIRECTLY OR INDIRECTLY FOSSIL FUEL USE AND CHANGED LOGISTICS VENDORS

Strategies to reduce fossil fuels

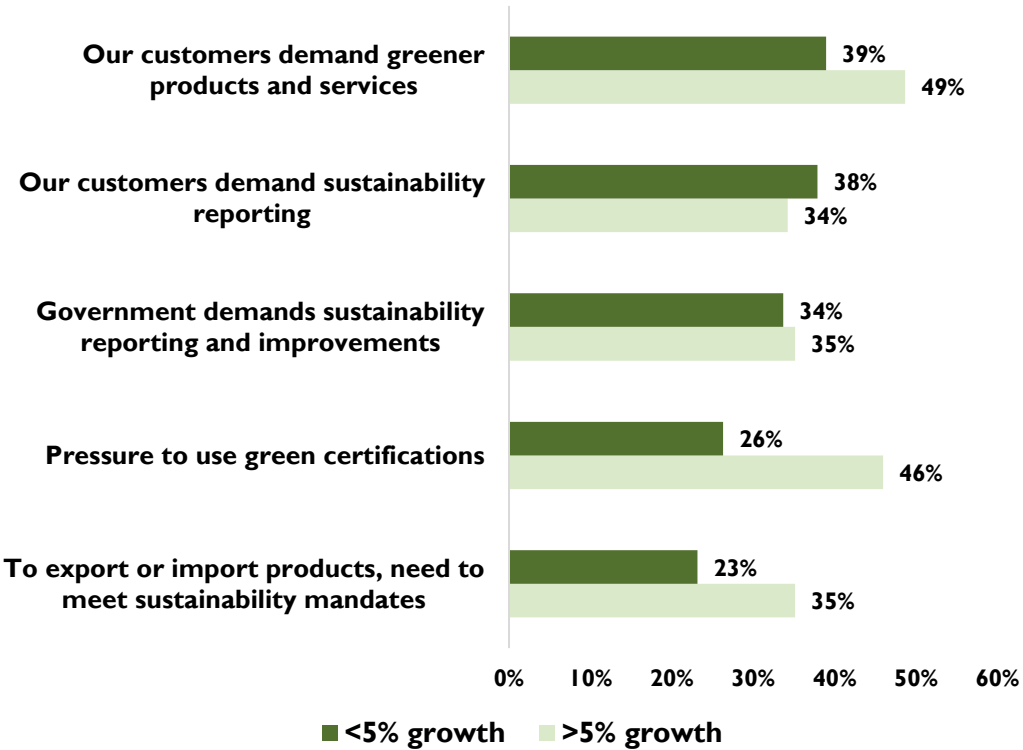| Strategy	<5% growth	>5% growth
Replacing fossil fuel using activities with zero or low emissions alternatives	46%	58%
Eliminating products or activities reliant on fossil fuel use	40%	57%
Increasing the efficiency of activities using fossil fuels	35%	33%
Offsetting carbon emissions	19%	29%

■ <5% growth   ■ >5% growth
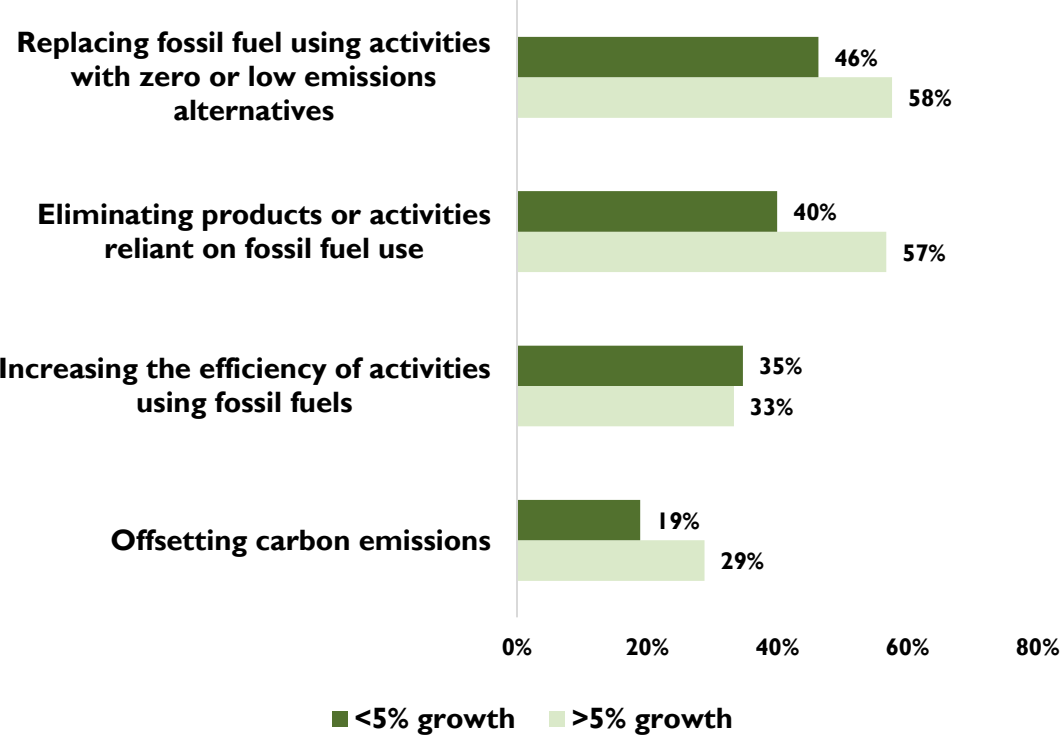
Change of suppliers to meet sustainability targets and mandates
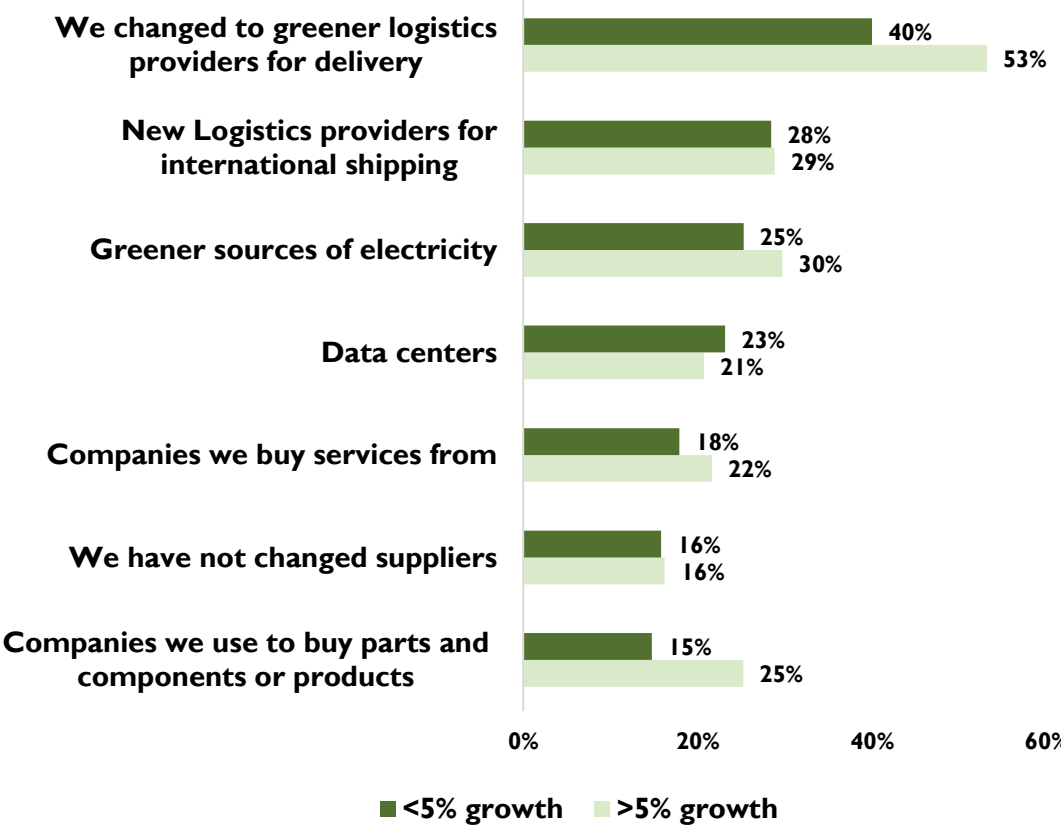
	<5% growth	>5% growth
We changed to greener logistics providers for delivery	40%	53%
New Logistics providers for international shipping	28%	29%
Greener sources of electricity	25%	30%
Data centers	23%	21%
Companies we buy services from	18%	22%
We have not changed suppliers	16%	16%
Companies we use to buy parts and components or products	15%	25%

■ <5% growth   ■ >5% growth

EMERGING MARKET SMES HAVE AMPLIFIED AI USE IN THE PAST FEW YEARS

Demands SMEs face for sustainability / greening?

- Our customers demand greener products and services
  - <5% growth: 39%
  - >5% growth: 49%
- Our customers demand sustainability reporting
  - <5% growth: 38%
  - >5% growth: 34%
- Government demands sustainability reporting and improvements
  - <5% growth: 34%
  - >5% growth: 35%
- Pressure to use green certifications
  - <5% growth: 26%
  - >5% growth: 46%
- To export or import products, need to meet sustainability mandates
  - <5% growth: 23%
  - >5% growth: 35%

■ <5% growth   ■ >5% growth

Negative implications of sustainability / greening mandates

- New costs
  - <5% growth: 44%
  - >5% growth: 49%
- It has been hard to measure how green we are
  - <5% growth: 29%
  - >5% growth: 13%
- We have had to pay fines
  - <5% growth: 24%
  - >5% growth: 19%
- Hard to get financing
  - <5% growth: 15%
  - >5% growth: 16%
- Hard to understand
  - <5% growth: 15%
  - >5% growth: 7%
- Made us lose customers
  - <5% growth: 12%
  - >5% growth: 9%
- Locked us out of certain international markets
  - <5% growth: 6%
  - >5% growth: 8%

■ <5% growth   ■ >5% growth

Positive implications of sustainability / greening mandates

- Helped us create a new value proposition to attract for customers
  - <5% growth: 25%
  - >5% growth: 40%
- Helped us develop new sustainable products or services
  - <5% growth: 19%
  - >5% growth: 39%
- Adopting them has helped us recruit talent
  - <5% growth: 14%
  - >5% growth: 31%
- We have not faced these mandates or need to green yet
  - <5% growth: 8%
  - >5% growth: 7%

■ <5% growth   ■ >5% growth

TRADE ECOSYSTEM USED BY SMES THAT TRADE ALSO GREENING

Ports around the world are greening

% of green ports of all ports

Region	%
Asia Pacific	49%
Latin America and Caribbean	57%
Europe	78%
North America	90%
Middle East and North Africa	89%

Source: Nextrade Group
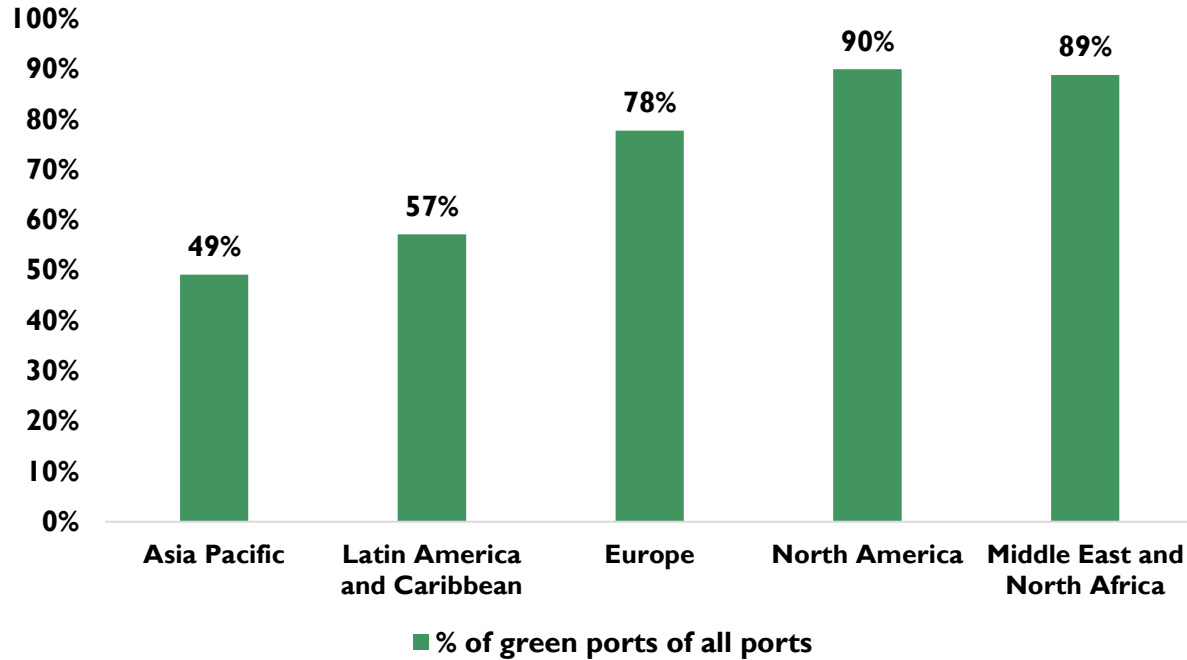
Smart ports = green ports
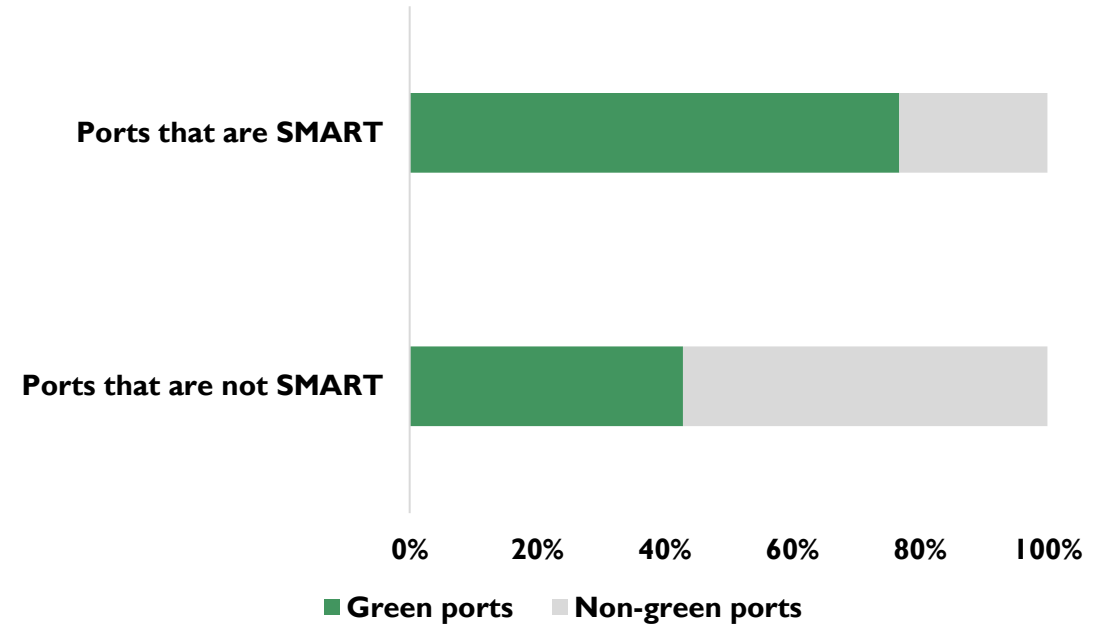
■ Green ports   ■ Non-green ports

Examples:

- **Jeddah:** Smart Port Initiative to automate terminal operations through 5G, improved infrastructure, cloud computing services, cybersecurity; Green Port Initiative aims to **cut energy consumption by 15 per cent, electrify equipment and phase out diesel**

- **Rotterdam:** Digital twins, IoT sensors, digital traceability, use of drones, blockchain system linking logistics and payments, 5G testing; transition to **renewable and green energy sources to electrify ports**

- **Shenzhen:** Smart Port project applies 5G, IoT, big data, AI and other emerging technologies in port services and operations for automation, efficiency, and intelligent management; includes **green and low carbon initiatives**

THANK YOU

kati@nextradegroupllc.com

8