THIRD WORKING MEETING -Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

Tuesday 9 May 2023, Room XVII, Palais des Nations, Geneva Switzerland

09:30-17:30 CEST

Working Meeting

Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

09:30 – 10:00 OPENING AND WELCOME REMARKS

- **UNECE**, **Elisabeth Tuerk**, Director, Economic Cooperation and Trade, UNECE
- ToS Secretary, **Maria Teresa Pisani**, Secretary of the Team of Specialists on ESG and Project Lead, The Sustainability Pledge

Tuesday, May 9, 2023

Agenda

09.30-10.00	**OPENING AND WELCOME REMARKS** **APPOINTMENT OF THE NEW CHAIR OF THE TEAM OF SPECIALISTS**
10.00-11.00	ITEM 1: **WHERE ARE WE NOW ON ESG TRACEABILITY?**
	Break from 11.00-11.30
11.30-12.30	ITEM 2: **TEAM OF SPECIALISTS WORKSHOP – PART I : DATA FOR ESG MONITORING AND REPORTING PROTOCOL**
	Lunchbreak 12.30-14.00
14.00-16.00	ITEM 3: **TEAM OF SPECIALISTS WORKSHOP- PART II: CROSS-SECTORIAL AND SECTOR-SPECIFIC CHALLENGES**
	Break 16.00-16.30
16.30-17.30	ITEM 4: **TEAM OF SPECIALISTS WORKSHOP – PART III: FUTURE AREAS OF WORK AND FUNDRAISING:**
17:30	**CLOSING**

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

APPOINTMENT OF THE NEW CHAIR OF THE TEAM OF SPECIALISTS

Candidate:

- GIZ (German Agency for International Cooperation), Christian Hudson, Lead, Global Textiles Transparency Project

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

10.00-11.00
ITEM 1: WHERE ARE WE NOW ON ESG TRACEABILITY?

Moderator: Vice-Chair of the ToS, Harm Jan van Burg, Senior Policy Advisor on International Standards, OASIS

Presenters:

- **GoSource Pty**, Steven Capell, Managing Director and UN/CEFACT Project Lead
- **UNECE**, Maria Teresa Pisani, Secretary of the Team of Specialists on ESG and Project Lead, The Sustainability Pledge
- **Triangularity**, Virginia Cram-Martos, CEO and UN/CEFACT Project Lead

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

10.00-11.00
ITEM 1: WHERE ARE WE NOW ON ESG TRACEABILITY?

Moderator: Vice-Chair of the ToS, Harm Jan van Burg, Senior Policy Advisor on International Standards, OASIS

Presenters:

- **GoSource Pty**, Steven Capell, Managing Director and UN/CEFACT Project Lead
- **UNECE**, Maria Teresa Pisani, Secretary of the Team of Specialists on ESG and Project Lead, The Sustainability Pledge
- **Triangularity**, Virginia Cram-Martos, CEO and UN/CEFACT Project Lead

UN/CEFACT 40th Forum

Team of specialists sustainable supply chains

Where are we on ESG Traceability?

Steve Capell
steve.capell@gmail.com

A key risk - greenwashing

As regulatory and consumer pressures drive up demand (and justify premium prices) for sustainable goods, so the commercial incentive to make fake sustainability claims will increase.

EC investigation : 59% of environmental claims had no evidence and 42% were deemed false or deceptive.

Fast Company: 68% of executives admit their company is guilty of greenwashing.

Survey: 78% of consumers believe that companies should be environmentally responsible and are willing to pay premiums for confidence in those claims.

Secretary General Guterres at COP27 2022 : **“Zero Tolerance for Greenwashing”**

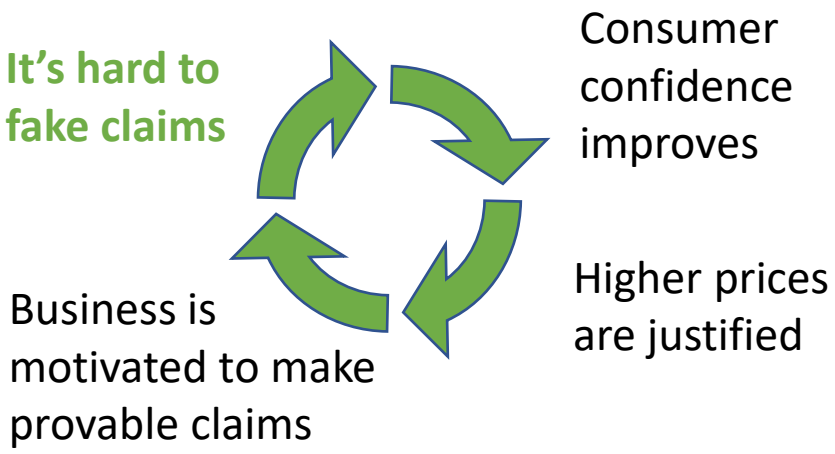
https://www.un.org/sites/un2.un.org/files/high-level_expert_group_n7b.pdf
https://ec.europa.eu/commission/presscorner/detail/en/ip_21_269
https://www.fastcompany.com/90740501/68-of-u-s-execs-admit-their-companies-are-guilty-of-greenwashing
https://blog.gitnux.com/greenwashing-statistics/
https://www.un.org/en/delegate/%E2%80%98zero-tolerance-greenwashing%E2%80%99-guterres-says-report-launch

What could be the consequences of greenwashing?

There is already a significant difference between consumer expectation and market behaviour. There are two plausible pathways out of this:

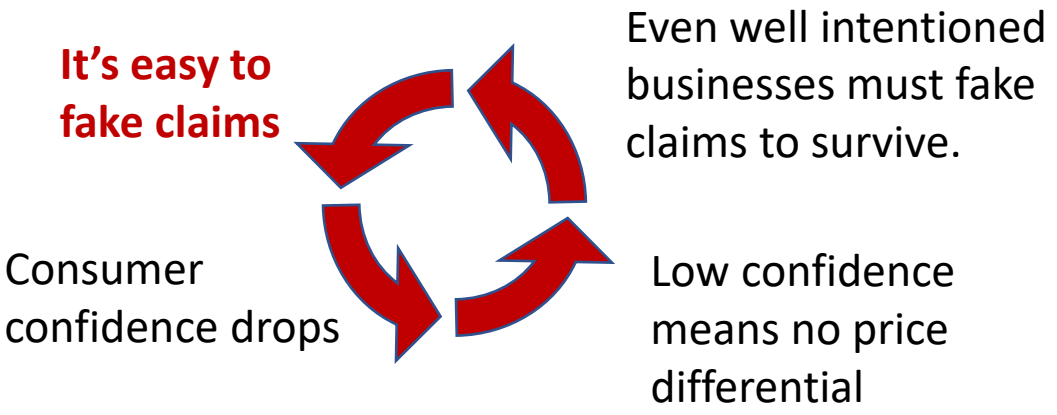
Either : A race to the top

Greenwashing is rare and has nowhere to hide



Or : A race to the bottom

Greenwashing is ubiquitous and undetectable



So we should be motivated to make it hard to fake claims! That is the focus of this presentation.

So how can we trust sustainability claims?

There are three ways that sustainability claims might be verified. They can and should work together

I say it's true :
prove me wrong!

Make claims public and rely on activism to call out fakes.

Important starting point but easiest to fake.

They say it's true :
do you trust them?

Trusted authorities accredit certifiers who audit the claims.

Good, but you've got to trust the audit process and the auditor.

It's self-evidently true:
I can see the proof myself.

Digitally verifiable traceability & transparency supports the claims

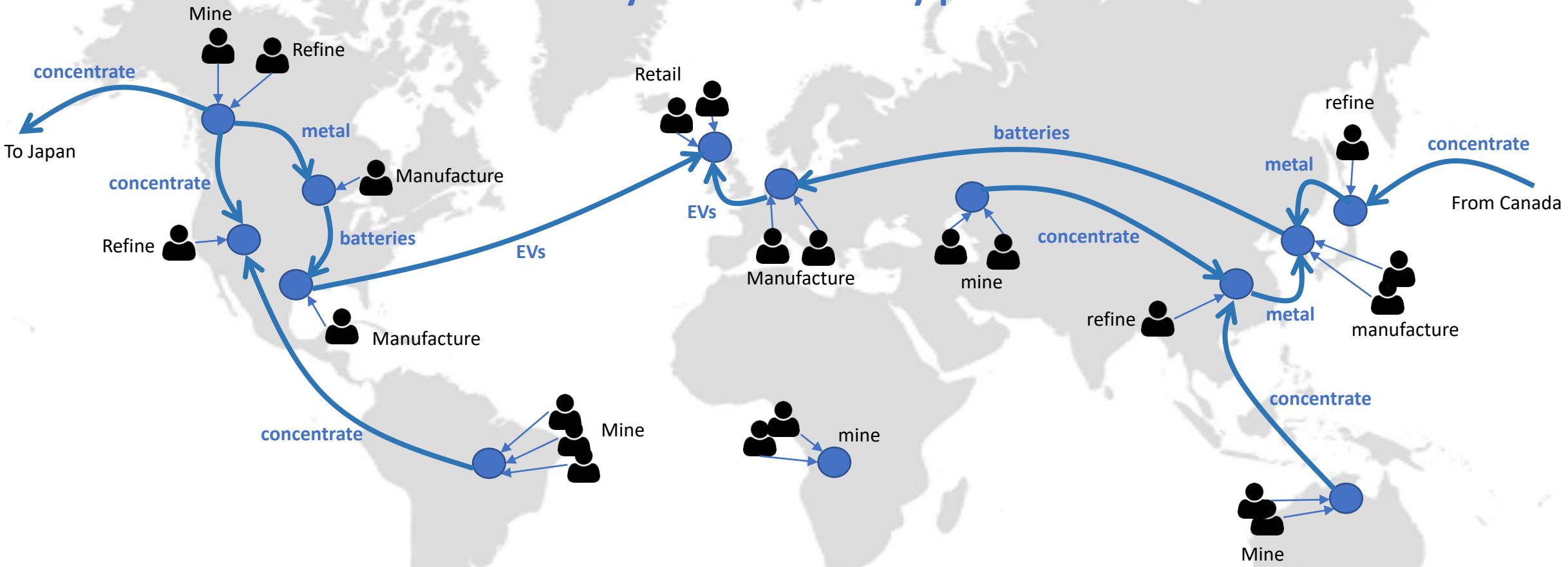
We'll focus on the this one because it's the hardest to fake

But how to connect up complex global supply chains?

Textile & leather simple example

And there are many different industry sectors.

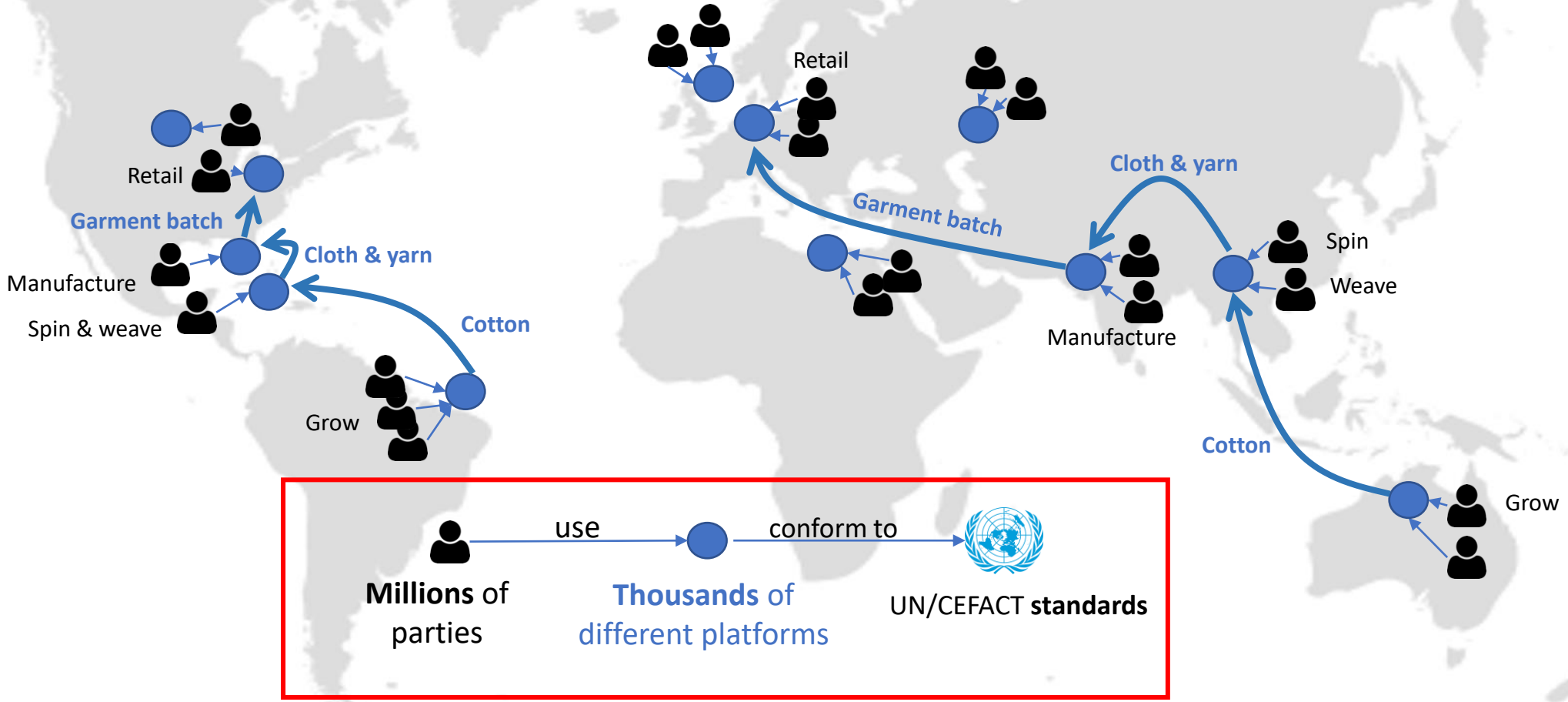
And each industry sector has many platforms to choose from



So the key question is how to connect up the blue dots

And the more decentralised the solution, the greater the need for standards.

UN/CEFACT's mission is to provide those standards.



Here’s what we have so far

https://unece.org/trade/traceability-sustainable-garment-and-footwear

Provides the business requirements and detailed traceability and transparency data models that supported the world-leading work of this team.

https://unece.org/sites/default/files/2022-09/WhitePaper_VerifiableCredentials-CBT.pdf

A white paper that describes how verifiable credentials provides the most scalable, highest integrity, and lowest cost mechanism to achieve traceability (ie join the dots).

https://vocabulary.uncefact.org

Provides the JSON-LD semantic vocabulary for the claims to put into your VCs. Use this vocabulary so that others can understand the meaning of your claims.

https://test.uncefact.org/vckit

Is an open source VC issuer & verifier that is free for you to use. Alternatively you can use any other software so long as it is interoperable.

And a new project just about to start

CRM sustainability & resilience.

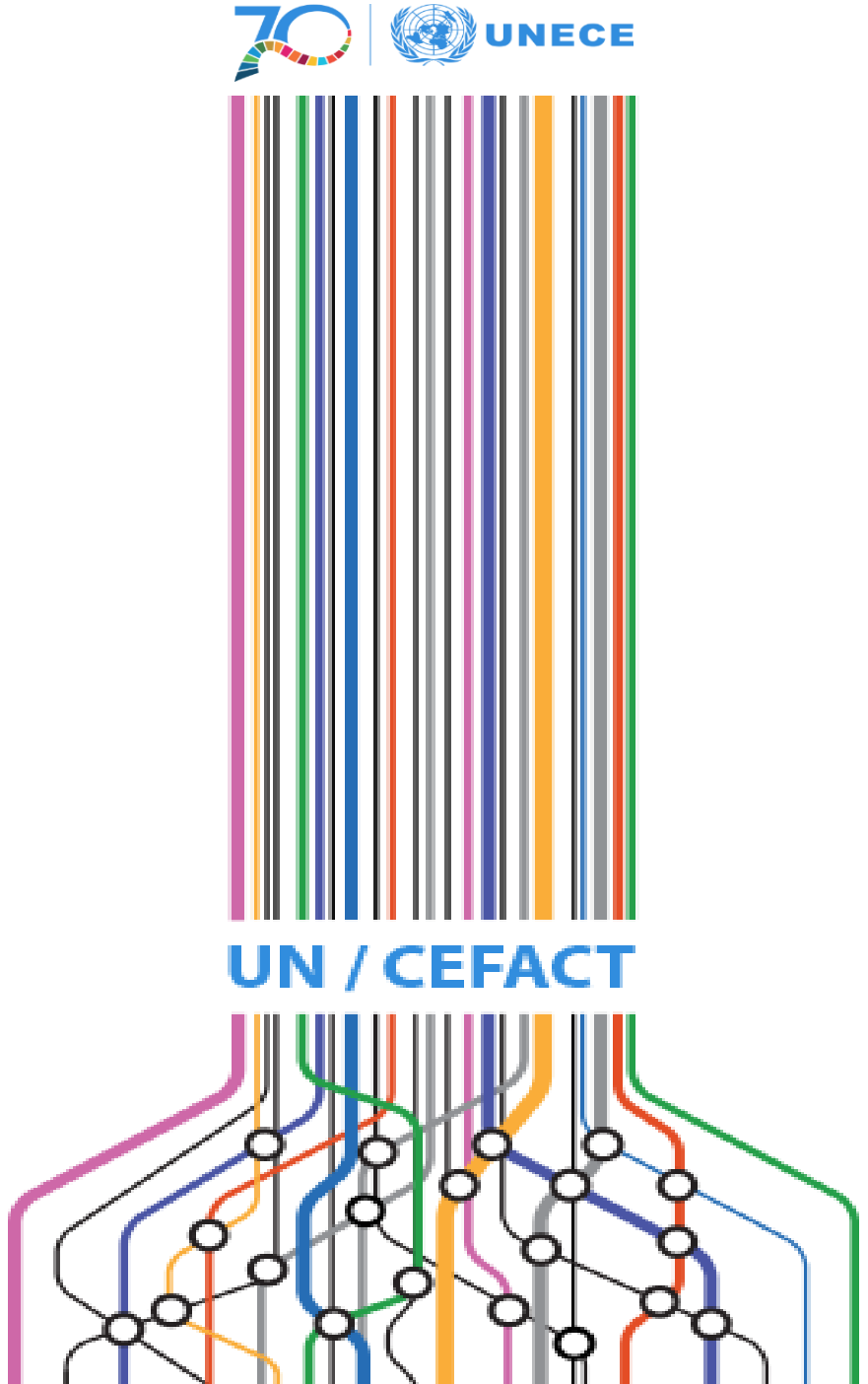
https://uncefact.unece.org/display/uncefactpublic/Critical+Minerals+Traceability+and+Sustainability

Building on experience from the Textile & Leather traceability work and guided by the principles in the VC white paper, this project will deliver the digital standards to support both sustainability & resilience in the Critical Raw Materials sector. It will also cover areas such as trust graphs, physical-digital links and semantic mapping and so will also establish useful patterns for other sectors.

Thanks for listening.

Questions?

steve.capell@gmail.com



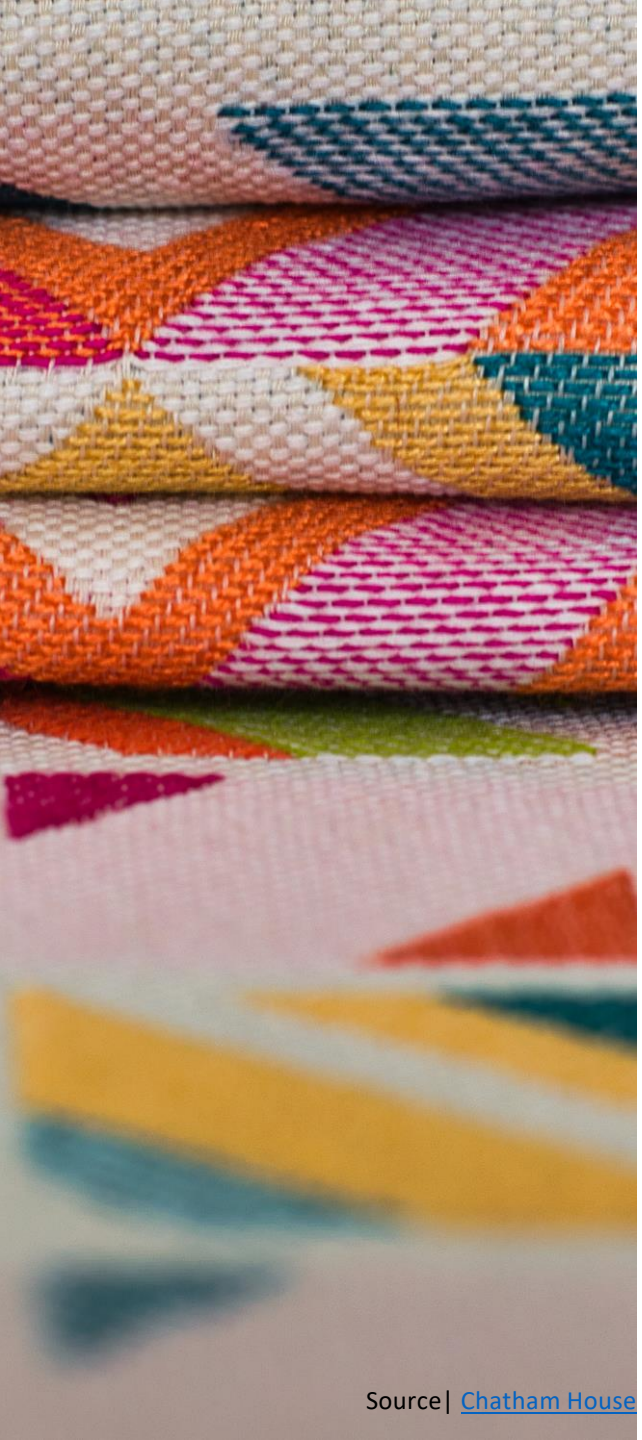
Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

10.00-11.00
ITEM 1: WHERE ARE WE NOW ON ESG TRACEABILITY?

Moderator: Vice-Chair of the ToS, Harm Jan van Burg, Senior Policy Advisor on International Standards, OASIS

Presenters:

- **GoSource Pty**, Steven Capell, Managing Director and UN/CEFACT Project Lead
- **UNECE**, Maria Teresa Pisani, Secretary of the Team of Specialists on ESG and Project Lead, The Sustainability Pledge
- **Triangularity**, Virginia Cram-Martos, CEO and UN/CEFACT Project Lead



Source| Chatham House

THE SUSTAINABILITY PLEDGE

TRACK IT, TRACE IT, WEAR IT!

Traceability and Transparency for Sustainable and Circular Value Chains in Garment & Footwear

THE SUSTAINABILITY PLEDGE

TRACK IT, TRACE IT, WEAR IT!

What's next

Blockchain Pilots' Projects

- **Stella McCartney** fully traced regenerative Turkish cotton T-Shirt
- First certified **Better Cotton** yarn from **Uzbekistan**
- New pilot for new fibers: **wool and synthetics**

UNECE-UNECLAC-Fashion Revolution study

Source| Unsplash

Trade, import and disposal second-hand clothing in Chile

- ➢ Upcoming **press release**
- ➢ Upcoming study **peer-review** of (UNEP, EMF, EEA)

New Pledges for T&T

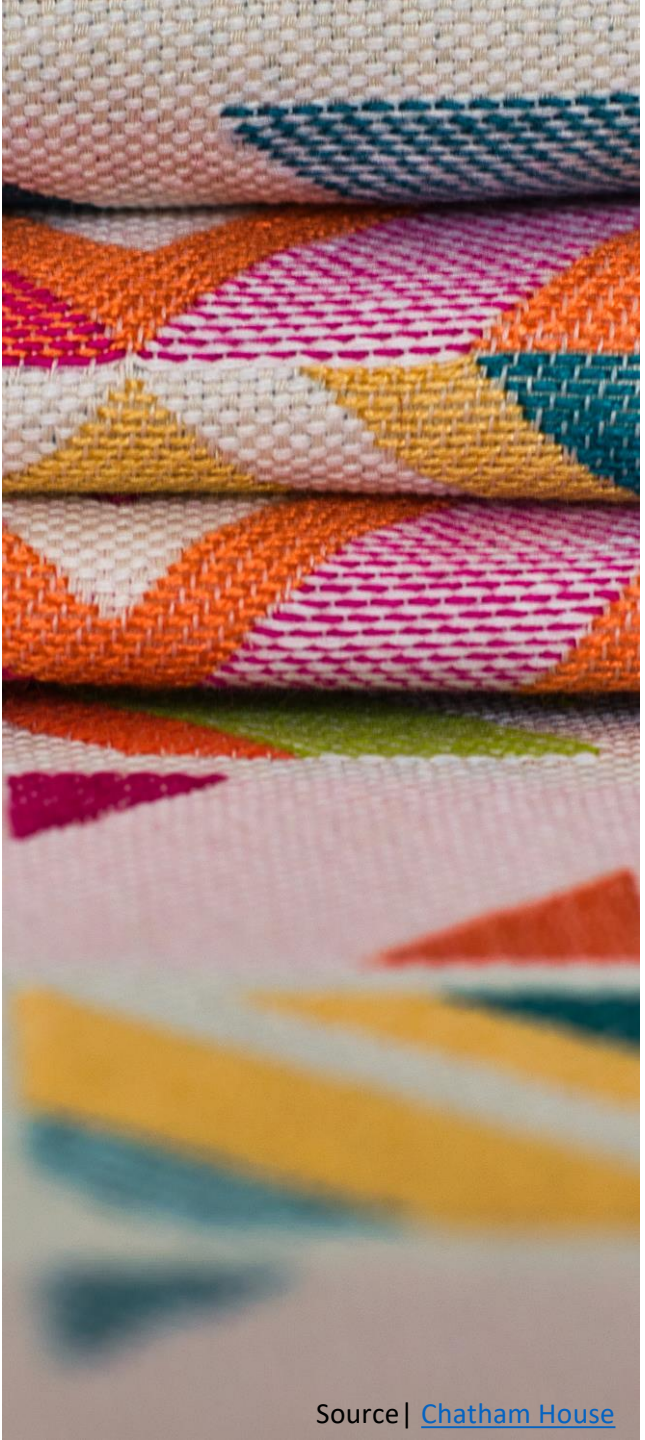
THE IDFACTORY · MANTECO ACADEMY · MUST HAD · SLOWEARE · FibreTrace · FLAT6LABS · kryha · roundrack · südwollegroup · CRYSTALCHAIN Construisons la confiance · Clear Fashion · IWTO · ECOCOTEX · Green Score Capital · Salamtex Lace · Fair Trade ADVOCACY OFFICE · SAÇLER · FAO FIAT PANIS · WWF TÜRKİYE · Reverse Resources

2021-2023:

- **92** pledges for T&T
- **27** countries
- +**450** actors and partners involved

UNECE Policy paper (draft)

Enhancing Traceability of Products along International Value Chains for the Circular Economy and Sustainable Use of Resources



Source | Chatham House

THE SUSTAINABILITY PLEDGE
TRACK IT, TRACE IT, WEAR IT!

What's next & priorities

Strengthen

KPIs to measure the level of traceability and transparency in garment and footwear

Textile waste traceability

Scale up

Capacity-building activities through **engagement plans** in key focus countries

(i.e. Uzbekistan, ...)

Align

With the **Digital Product Passport** of the EU Eco-design Regulation

→ **Product Circularity Data project**

Replicate

Traceability & Sustainability for priority sectors for the circular transition

- **Critical Raw Materials**
- **Agri-food**

Collaborate

- **GEF** project (reducing chemicals of concern in textiles) (South-East Asia)
- **WEF** Securing Minerals for the Energy Transition (SMET) WG
- **WBCSD**,
- **S**ustainable **M**arkets **I**nitiative

Product Circularity Data Project

9 May 2023

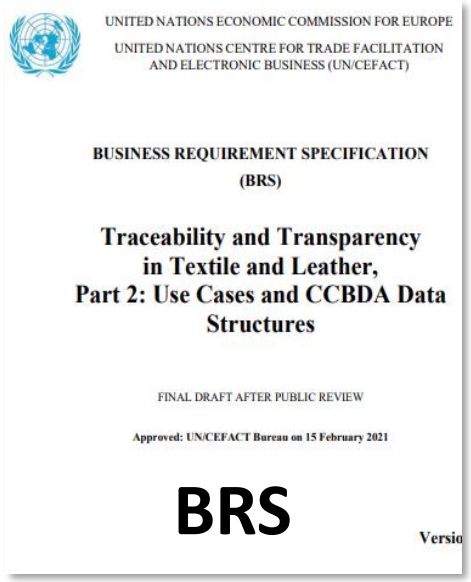
Virginia Cram-Martos, UN/CEFACT Project Lead
Gerhard Heemskerk, UN/CEFACT Editor

Why this project?

- **Scope:**
  - Improve sustainability through product circularity
  - By supporting the exchange of product circularity data:
    - For pre-consumption waste as well as post consumption goods and waste
    - for resale, rental, collections, sorting, recycling
    - for circular lifecycle management (especially post-consumption)
- **Objectives:**
  - Global scope
  - Cross-Industry – with an initial focus on textiles and leather
  - Reuse existing standards
  - Align with EU Digital Product Passport (DPP)
  - Use the UN Core Component Library subset

What will it create?

An additional use case & data exchange structure in the Textile & Leather Business Requirement Specification (BRS)



1. Use case: Traceability Data

(Who, What, Why, Where, When data)

2.Use case: Product Transparency Data

(Certificates, Inspections data)

➕ **3. Use case: Product Circularity Data Exchange**

Product Circularity

Supporting reuse and recycle product life cycly stages through digital representations.

Main Output - Revised Traceability and Transparency Business Requirements (BRS) Specification **which includes data for product circularity** (blue=existing, red=new)

3.10 Transparency Use Case (Product Circularity)

3.11 Business Transaction
3.12 Business Process Flow
3.13 Business Transaction Sequence

4 Business Information View

4.1 Event Data Model (Traceability)
4.2 Additional Information Data Model (Transparency)
4.3 Product Circularity Data Model

4.3.1 Business Information Entities

4.4 Business Document: TT Event Data Message
4.5 Business Document: TT Additional Information Data Message
4.6 Business Document: Product Circularity Data Message

Textile & Leather Circular Economy Business Domain View- Draft

It started like this..

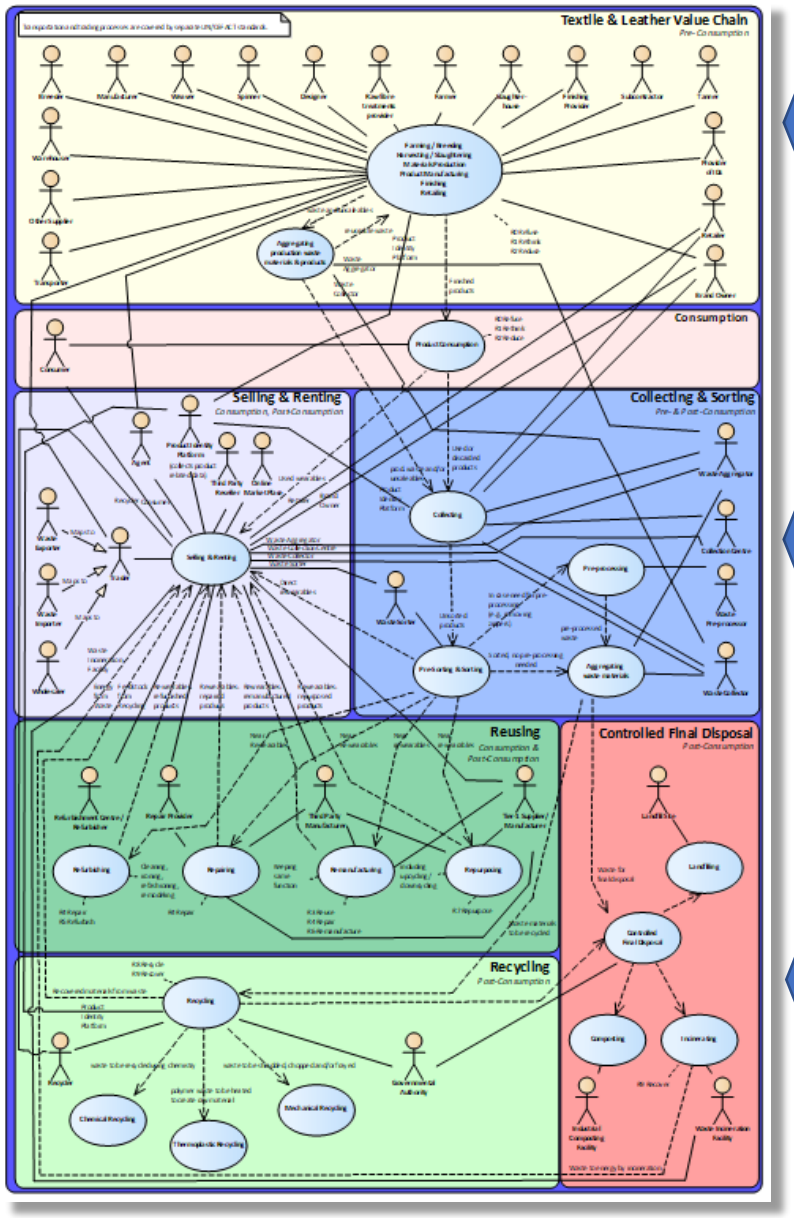
It became

Consumption

Selling & Renting

Reusing

Recycling



Value Chain

Collecting & Sorting

Controlled Final Disposal

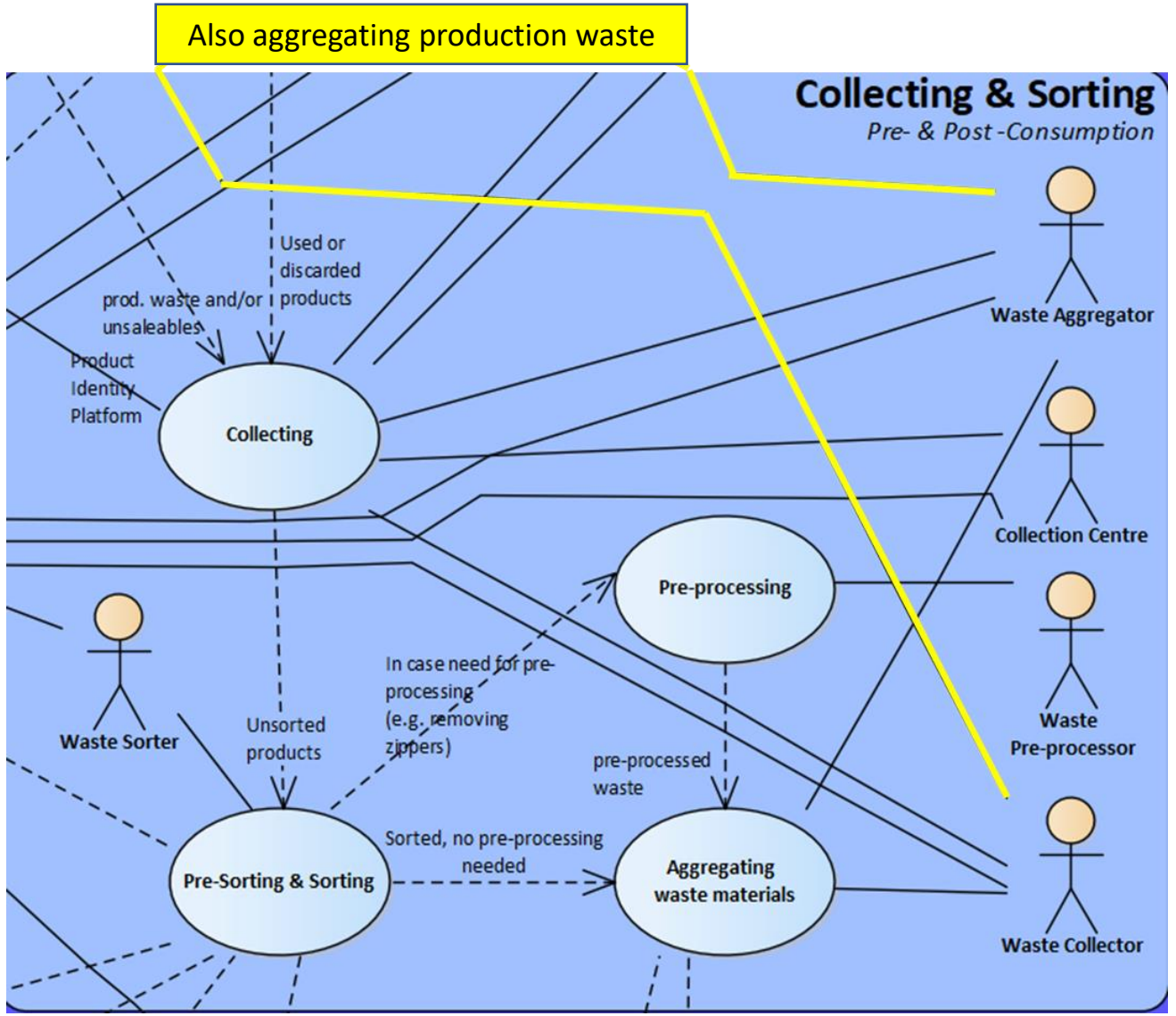
Close-Up
Collecting & Sorting - Draft

Also now involved in pre-consumption "Aggregating production waste":

- Waste Collector
- Waste Aggregator

- **Waste Collector:** A person or a company that is responsible for collecting and transporting waste materials from residential, commercial, and industrial areas to designated facilities for further processing or disposal.

- **Waste Aggregator:** A company or organization that collects waste materials from multiple sources and aggregates them in a centralized location before transporting them to a processing or disposal facility. Waste aggregators typically operate at a larger scale than waste collectors, working across multiple municipalities or even regions to collect waste from a variety of sources.



Examples of Definitions

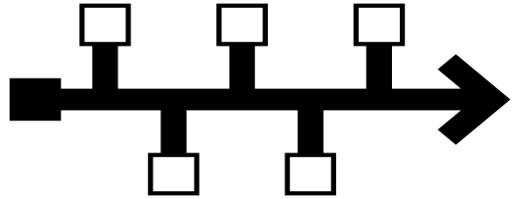
Circularity **actor** definitions

- **Waste Exporter**	A company who makes, or on whose behalf the export declaration is made, and who is the owner of the waste.

Circularity **process** definitions

- **Landfilling**	Landfilling is a method of waste disposal where solid waste is buried in a designated area of land. It involves depositing waste into a landfill site and compacting it to reduce the volume of the waste. The compacted waste is then covered with soil to prevent odors, litter, and the spread of disease, and to control pests.

Project milestones



To ensure the quality of our outputs we need as much industry input as possible to our process diagrams as well as the definitions of processes & actors

Where we are now

ODP Stage (open Development Process)	Working Period	Maximum Duration
Requirements gathering	01.2023 to 05.2023	4 months
Draft development	05.2023 to 09.2023	4 months
Public Draft Review	09.2023 to 11.2023	2 months
Publication	11.2023 to 02.2024	3 months
Project exit	02.2024 to 05.2024	3 months

Product Circularity Data Project

Looking forward to your contributions and to your participation at our next meeting on Friday, 26 May 2023 at 14:00 CET!

To join the project, please contact either the secretariat at jwei@un.org or Virginia Cram-Martos at crammartos@triangularity.net

Working Meeting – Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

10.00-11.00
ITEM 1: WHERE ARE WE NOW ON ESG TRACEABILITY?

Moderator: Vice-Chair of the ToS, **Harm Jan van Burg**, Senior Policy Advisor on International Standards, OASIS

Panellists:

- **British Columbia Ministry of Energy, Mines and Low Carbon Innovation**, **Nancy Norris**, Senior Director – ESG & Digital Trust
- **Initiative for Compliance and Sustainability**, **Carole Hommey**, General Manager
- **International Trade Centre**, **Grzegorz Tajchman**, IT Solutions Manager
- **TÜV Rheinland Group**, **Rakesh Vazirani**, Head of Sustainability Services

20 minutes of Q&A

Energy & Mines Digital Trust

Third meeting of the Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

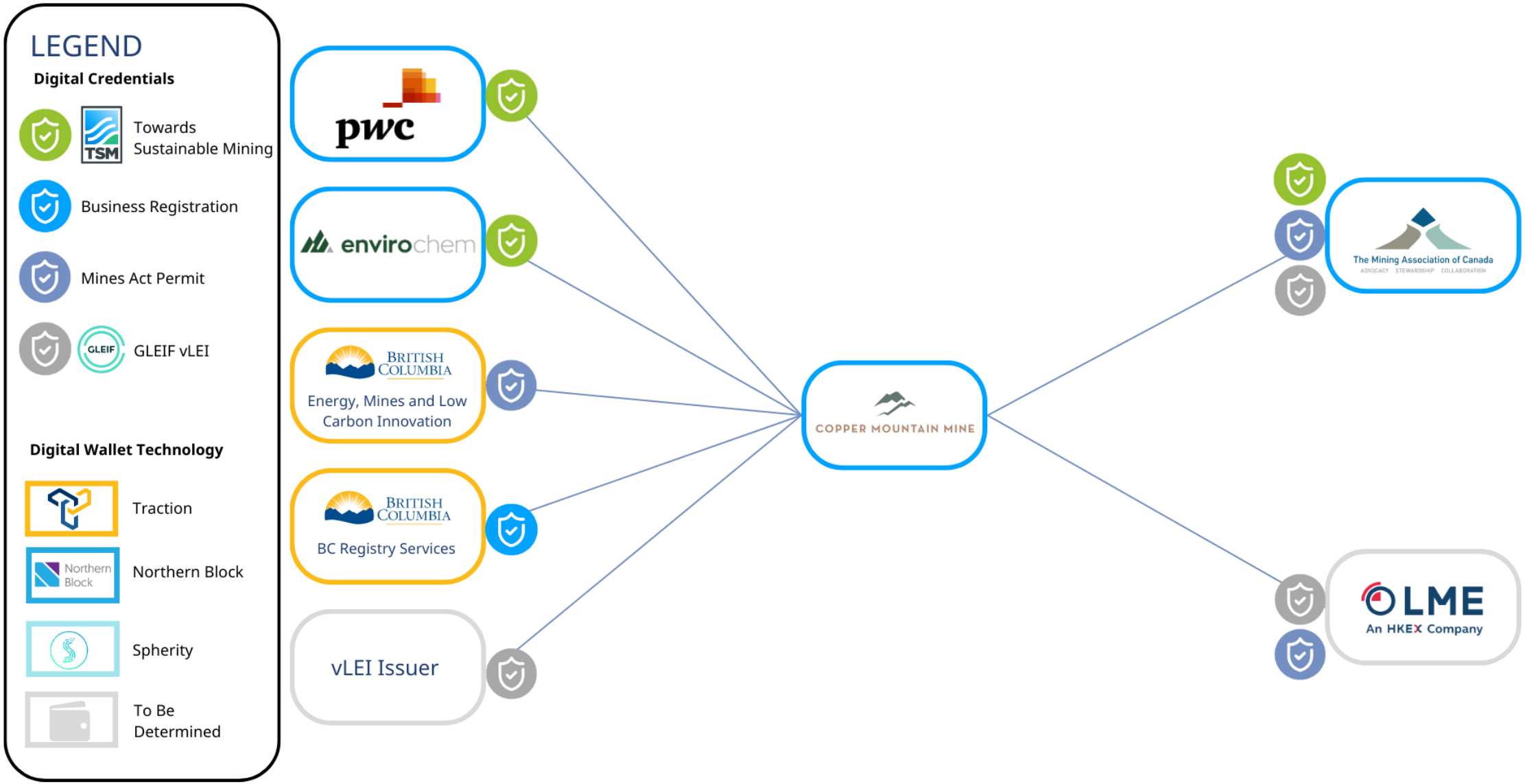
May 9, 2023

ENERGY & MINES DIGITAL TRUST

BRITISH COLUMBIA

Ministry of Energy, Mines and Low Carbon Innovation

Digital Trust Ecosystem: Mining

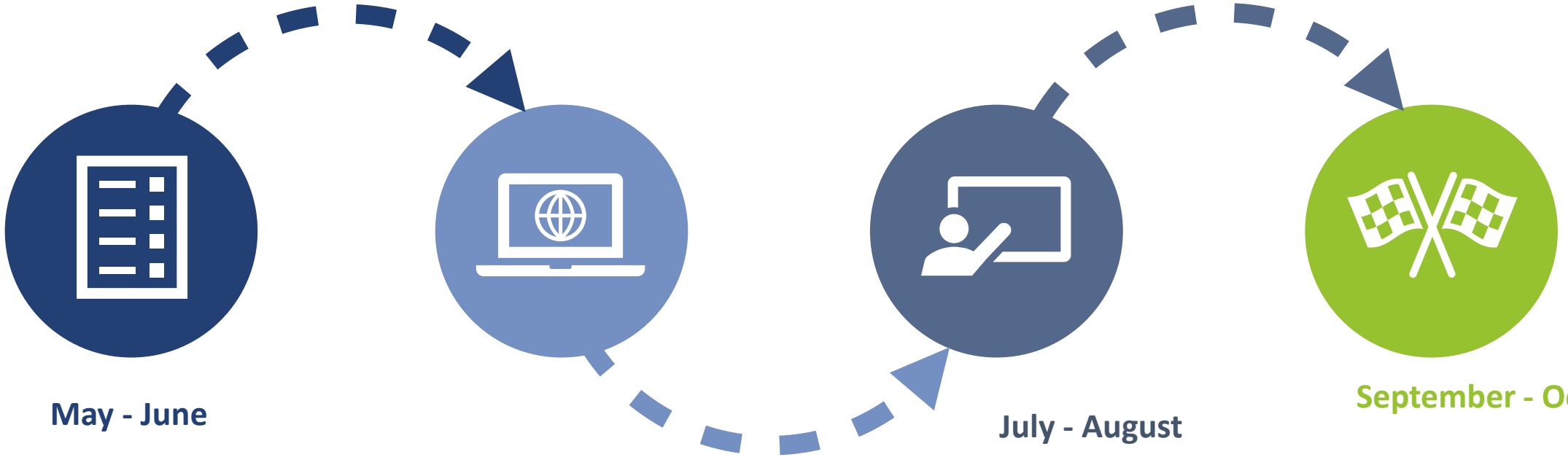


Use Case Examples:
Toward Sustainable Mining

KEY TAKEAWAYS

- Enthusiasm among pilot participants.
- Increasing desire for verified ESG data at the mine site level.
- Reduced administrative burden.
- EMDT's governance work with pilot participants will apply internationally, with a notable potential for wide scale adoption.

TSM Production Timeline



May - June

Finalize governance documentation and refine user interface

June – July

Determine end-to-end process and explore technical integrations

July - August

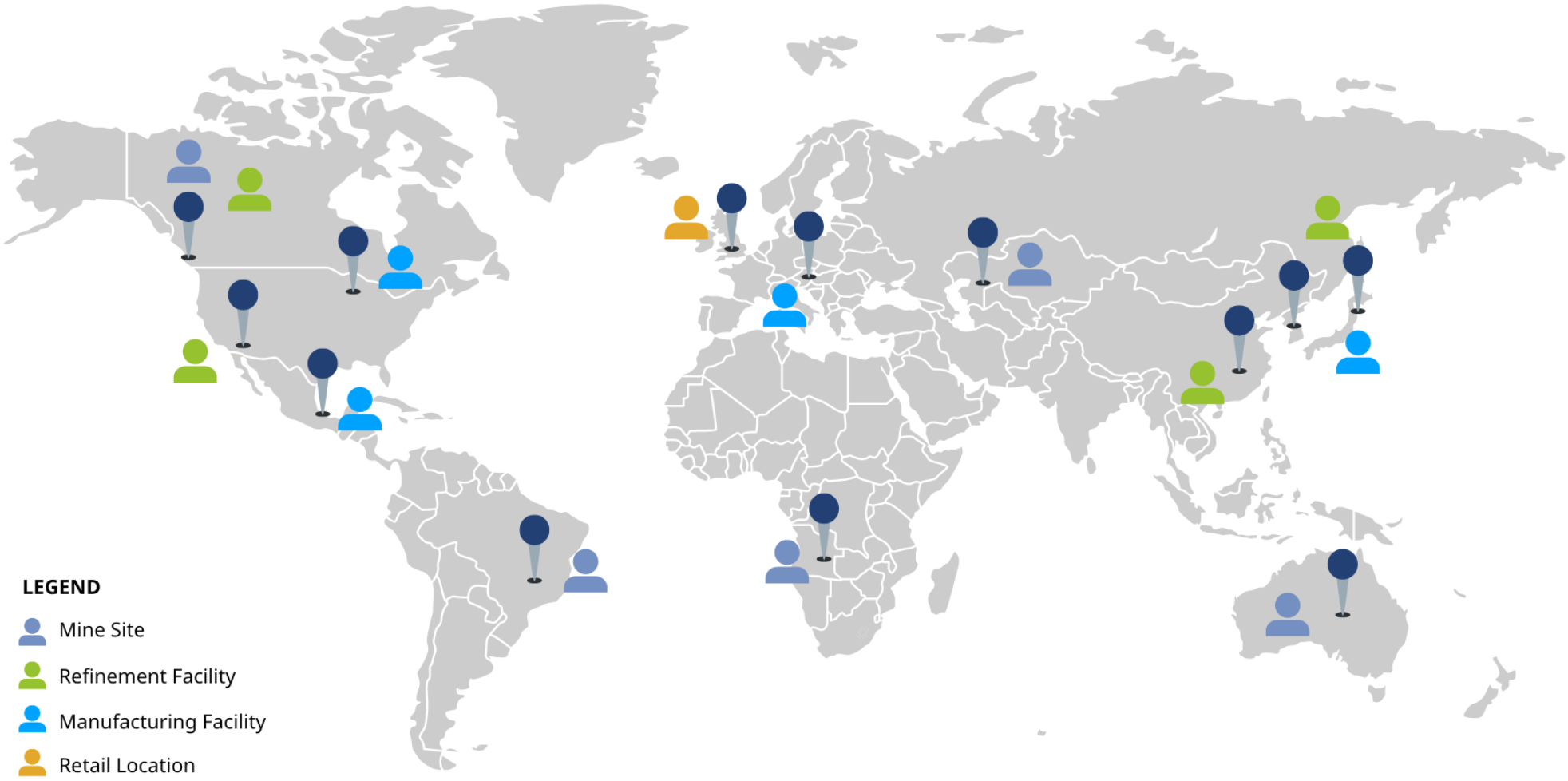
Prepare guidance documentation, user training, and technical setup

September - October

TSM pilot in production

ENERGY & MINES DIGITAL TRUST

Critical Mineral Traceability in Production



Nancy Norris

Senior Director of ESG & Digital Trust

Nancy.Norris@gov.bc.ca

BRITISH COLUMBIA | Ministry of Energy, Mines and Low Carbon Innovation

ENERGY & MINES DIGITAL TRUST

Explore the EMDT Case Study

Working Meeting – Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

10.00-11.00
ITEM 1: WHERE ARE WE NOW ON ESG TRACEABILITY?

Moderator: Vice-Chair of the ToS, **Harm Jan van Burg**, Senior Policy Advisor on International Standards, OASIS

Panellists:

- **British Columbia Ministry of Energy, Mines and Low Carbon Innovation**, **Nancy Norris**, Senior Director – ESG & Digital Trust
- **Initiative for Compliance and Sustainability**, **Carole Hommey**, General Manager
- **International Trade Centre**, **Grzegorz Tajchman**, IT Solutions Manager
- **TÜV Rheinland Group**, **Rakesh Vazirani**, Head of Sustainability Services

20 minutes of Q&A

ICS Transparency & Traceability

09/05/2023

Grouping 70 brands and retailers

4 621 Audits

Audits performed in 2022

1 719 569 employees

Audits performed in 2022

2 684 158 employees

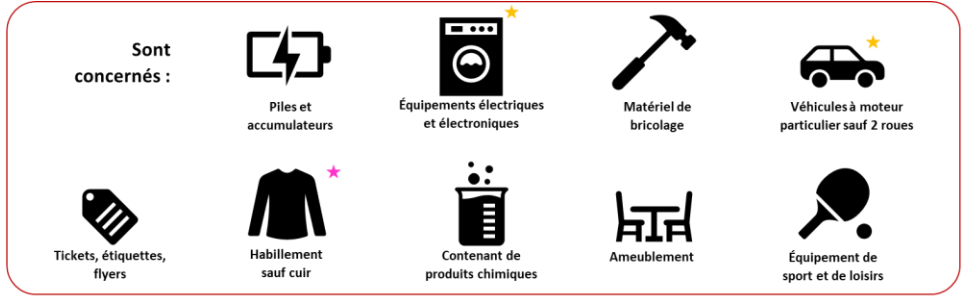
Including last audits performed in 2021-2022

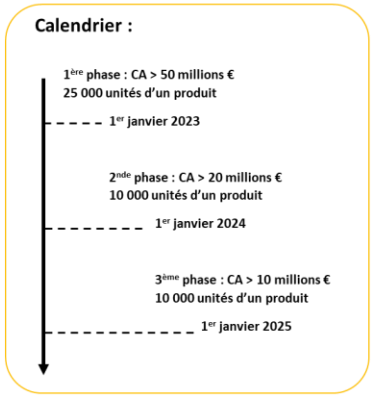
70 countries

Audits performed in 2022

- **French's AGEC law**

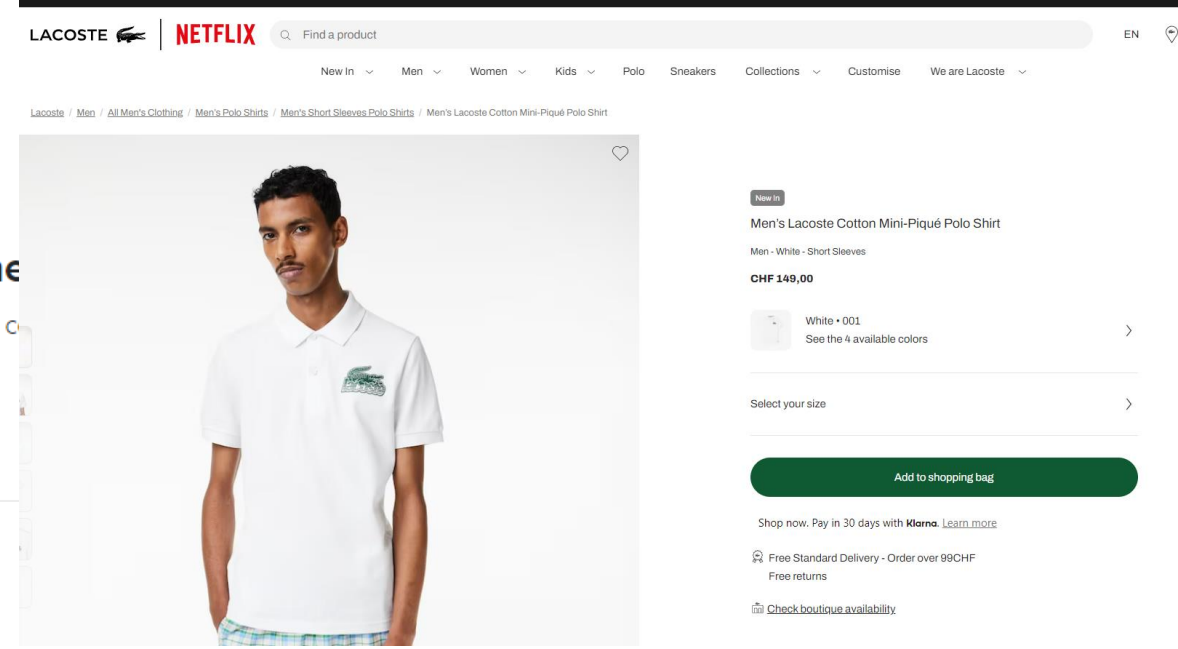
https://www.ecologie.gouv.fr/loi-anti-gaspillage-economie-circulaire#scroll-nav__4





- AGEC law's article 13 implements requirements for environmental display and traceability.
- Recyclability, durability, microplastics content, hazardous substances, critical materials content and traceability for specific orperations are requested.
- All of this information is to be held available at customer's need during a minimum of 2 years.
- [INSIDE The anti-waste law in the daily lives of the French people (ecologie.gouv.fr)]

- **UNECE T&T Matrix**



United for greater traceability, transparency and circularity in the garme

At the United Nations, we have worked with hundreds of experts, policymakers, businesses, academics and NGOs to c
footwear sector. Find out more information on the Sustainability Pledge website.

RA3150

Supply chain and traceable asset

RA3150

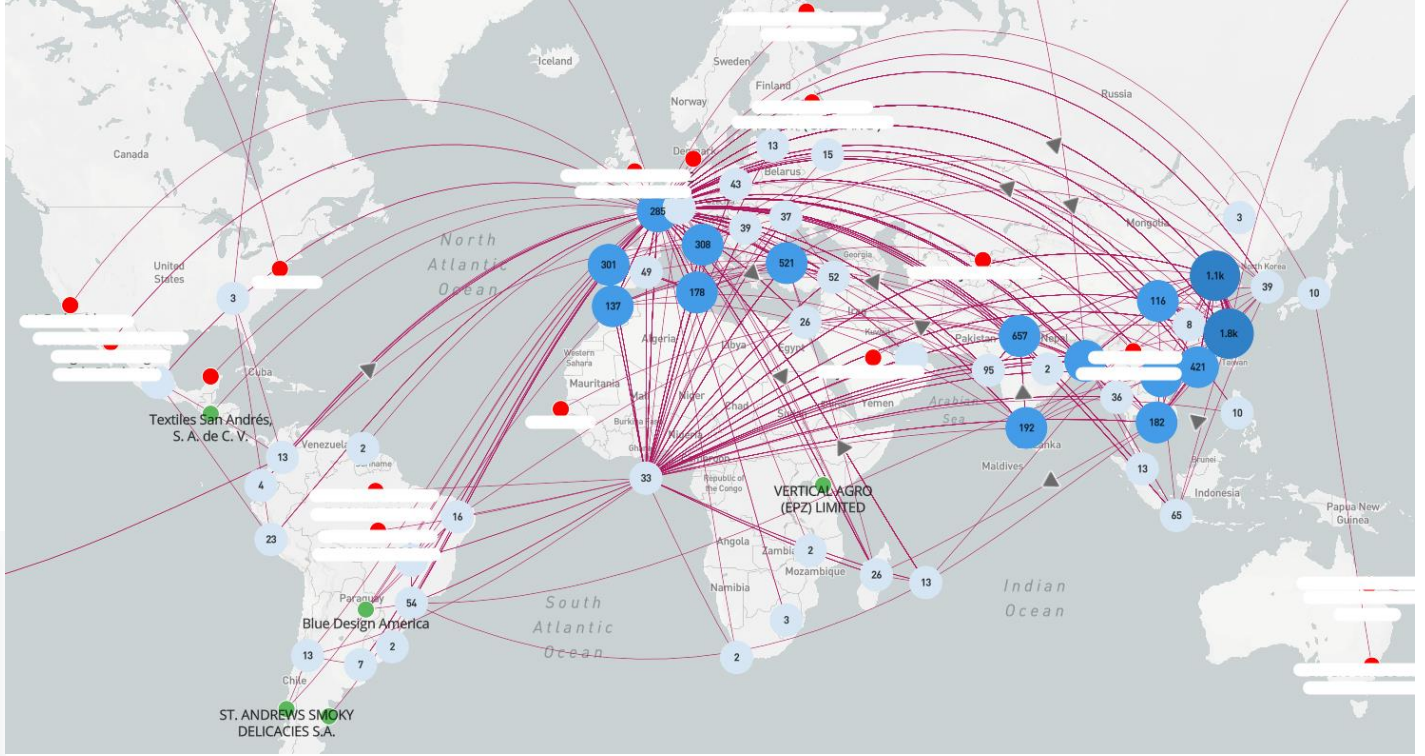
Claim

Value Chain | Map

Involved companies					HYOSUNG	ALPIN CORAP	GELISIM TEKSTIL / KARACA NAKIS	ALPIN CORAP				
Value chain step	**Planting**	**Harvesting**	**Production raw material**	**Spinning**	**Dyeing**	**Weaving**	**Fabric finishing**	**Product production**	**Product ennoblement & packaging**	**Product placement for sale**	**Consumption**	**Post-consumption**
Sustainability risks covered												
Transparency evidence												
Traceability evidence												

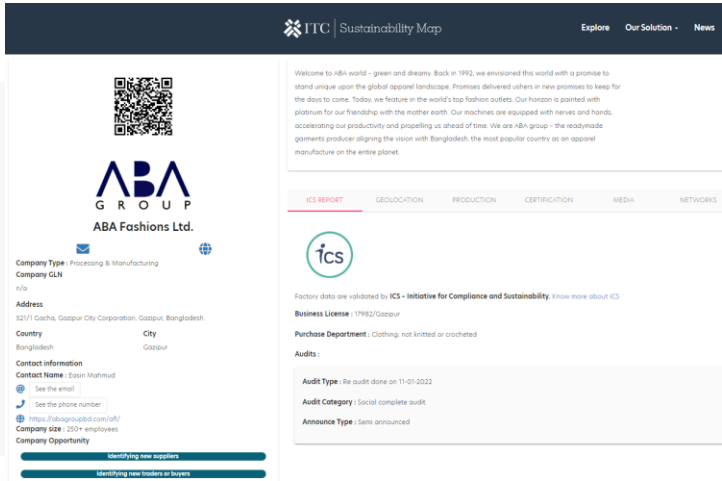
The pilot project was implemented in the context of the ECE-United Nations Centre for Trade Facilitation and Electronic Business (UN/CEFACT) initiative, "Enhancing traceability and transparency of sustainable value chains in the garment and footwear sector", jointly implemented with the International Trade Centre (ITC) with funding from the European Union since 2019. This initiative is also known as "The Sustainability Pledge".

- **ICS-ITC Traceability Project Updates**



Factory Profile / Transparency & Traceability	
ITC Public factories	3026
Factory Profiles Completed	3594
Invitations FP sent / Waiting TBC	6951
Subontractors/Suppliers created from FP	6830

- Tier 2 - Material production *factories involved in the project*: **3 630**
- Tier 3 - Raw material processing *factories involved in the project* : **2 238**
- Tier 4 - Raw material extraction *factories involved in the project* : **538**



Working Meeting – Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

10.00-11.00
ITEM 1: WHERE ARE WE NOW ON ESG TRACEABILITY?

Moderator: Vice-Chair of the ToS, **Harm Jan van Burg**, Senior Policy Advisor on International Standards, OASIS

Panellists:

- **British Columbia Ministry of Energy, Mines and Low Carbon Innovation**, **Nancy Norris**, Senior Director – ESG & Digital Trust
- **Initiative for Compliance and Sustainability**, **Carole Hommey**, General Manager
- **International Trade Centre**, **Grzegorz Tajchman**, IT Solutions Manager
- **TÜV Rheinland Group**, **Rakesh Vazirani**, Head of Sustainability Services

20 minutes of Q&A

Working with Partners' data when visualizing UNECE sustainability matrix

UNECE Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

Grzegorz Tajchman, Chris Khou (ITC)
9th May 2023

Some context (ITC/ICS/UNECE collaboration)...

International Trade Centre

Supply Chain Mapping

- **Who** (VC partner, business role, from/to)
- **Where** (location)
- **Why** (business step)
- **Origin**
- **Social Performance**
- **Environmental / production impacts**

- **How** (traceability events and evidence, sustainability standards coverage)
- **Fibers/materials used**
- **Use of chemicals**
- **…**

Product Traceability Standard

UNECE

International Trade Centre

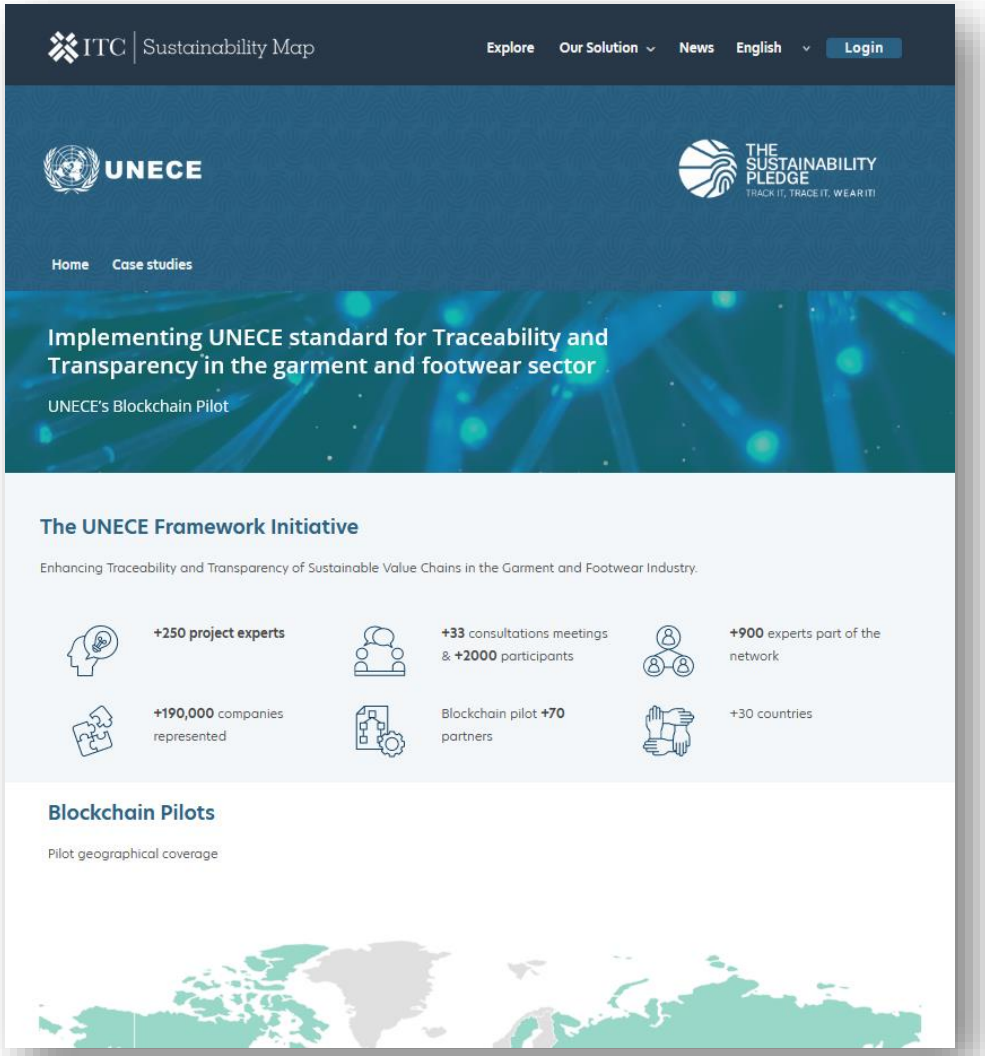
FOOTBRIDGE

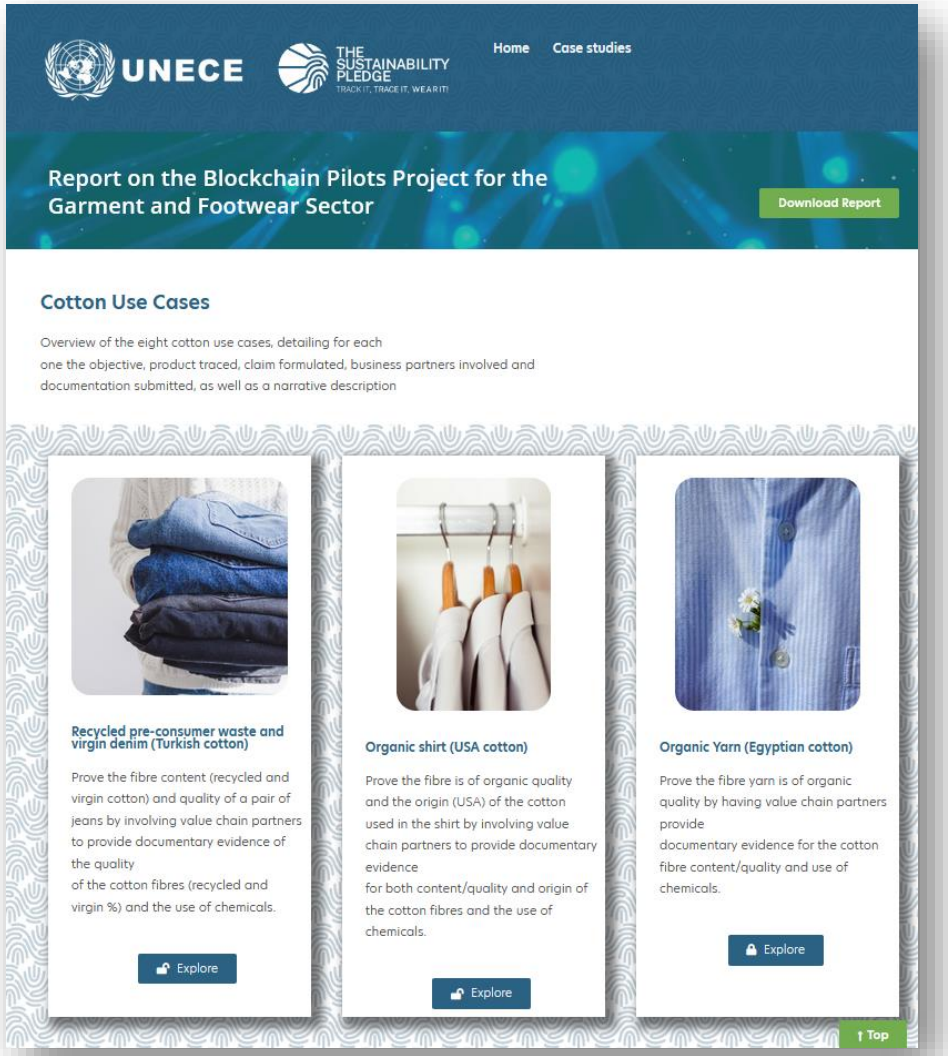
trustrace

NeoCondo

Landing page and case studies overview

https://resources.sustainabilitymap.org/unece-homepage/





Case study example (UN ECE pilot)

UNECE THE SUSTAINABILITY PLEDGE TRACK IT, TRACE IT, WEAR IT!

United for greater traceability, transparency and circularity in the garment and footwear sector

At the United Nations, we have worked with hundreds of experts, policymakers, businesses, academics and NGOs to come up with a workable and verifiable way of ensuring sustainability in the garment and footwear sector. Find out more information on the Sustainability Pledge website.

Supply chain and traceable asset

Vivienne Westwood: Denim Jeans

Claim

The fabric of this pair of jeans is made of 65% recycled cotton yarn coming from the pre-consumer waste of our italian fabric supplier and 35% virgin cotton sourced from Turkey. From the yarn up to the finishing of the denim material the processing steps avoid the use of chemicals harmful for health and the environment.

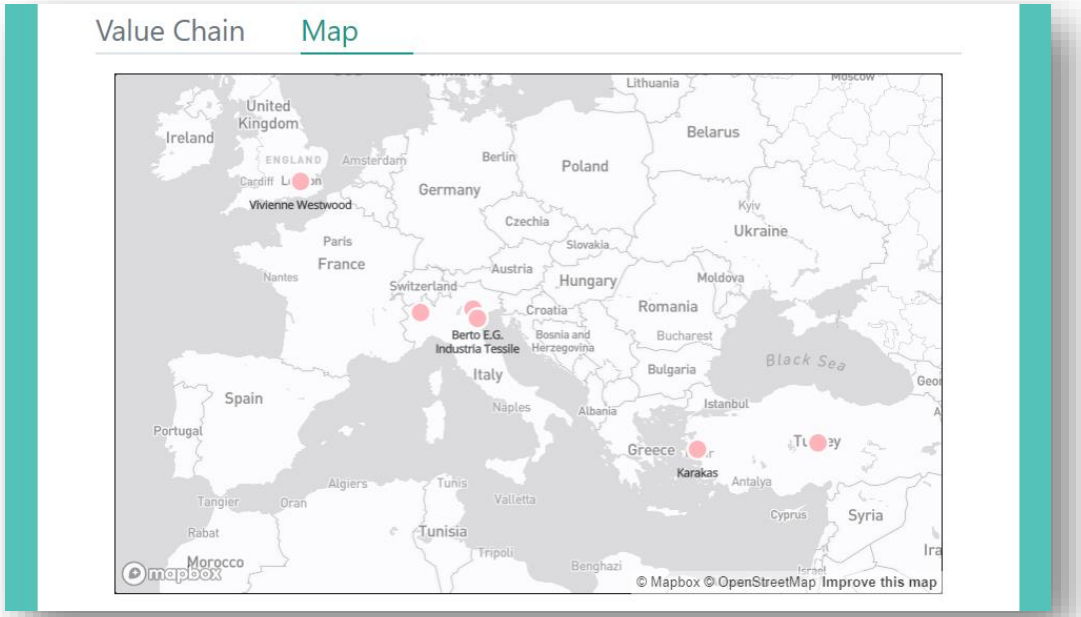
Value Chain | Map

Involved companies				1 - Marchi & Fildi S.p.a. (103798405 + 103788908 + 104064705 + 104030909 + 103789008 CENTAURUS)	1 - Berto E.G. Industria Tessile (Virgin cotton fiber 35% + cascami filetto 65%)	1 - Berto E.G. Industria Tessile (Virgin cotton fiber 35% + cascami filetto 65%)	1 - Berto E.G. Industria Tessile (Virgin cotton fiber 35% + cascami filetto 65%)	1 - Denim Service (K499 00011 PIANETA 115GR 52114200 (ord. 210473) - COMPOSITION: 100% CO)	1 - Denim Service (28020026-11666-DE CLASSIC TAPERED JEANS - variante K401 INDIGO codice tessuto: 11666)	1 - Vivienne Westwood (28020026-11666-DE CLASSIC TAPERED JEANS - variante K401 INDIGO codice tessuto: 11666)		
Value chain step	Planting	Harvesting	Production raw material	Spinning	Dyeing	Weaving	Fabric finishing	Product production	Product ennoblement & packaging	Product placement for sale	Consumption	Post-consumption
Sustainability risks covered				Human rights, Labour rights, Solid waste, Water pollution, Hazardous chemicals, Energy consumption, GHG Emissions, Pesticides / Insecticides, Air pollution, Energy Consumption	Labour rights, Hazardous chemicals, Energy consumption, GHG Emissions, Pesticides / Insecticides, Solid waste, Air pollution, Water pollution, Human rights, Energy Consumption	Labour rights, Hazardous chemicals, Energy consumption, GHG Emissions, Pesticides / Insecticides, Solid waste, Air pollution, Water pollution, Human rights, Energy Consumption	Labour rights, Hazardous chemicals, Energy consumption, GHG Emissions, Pesticides / Insecticides, Solid waste, Air pollution, Water pollution, Human rights, Energy Consumption	Human rights, Labour rights, Solid waste	Human rights, Labour rights, Solid waste			
Transparency evidence				STANDARD 100	STANDARD 100	STANDARD 100	STANDARD 100	STANDARD 100				
Traceability evidence				Shipping note	Delivery note	Shipping note	Shipping note	Shipping note	Shipping note	Shipping note		

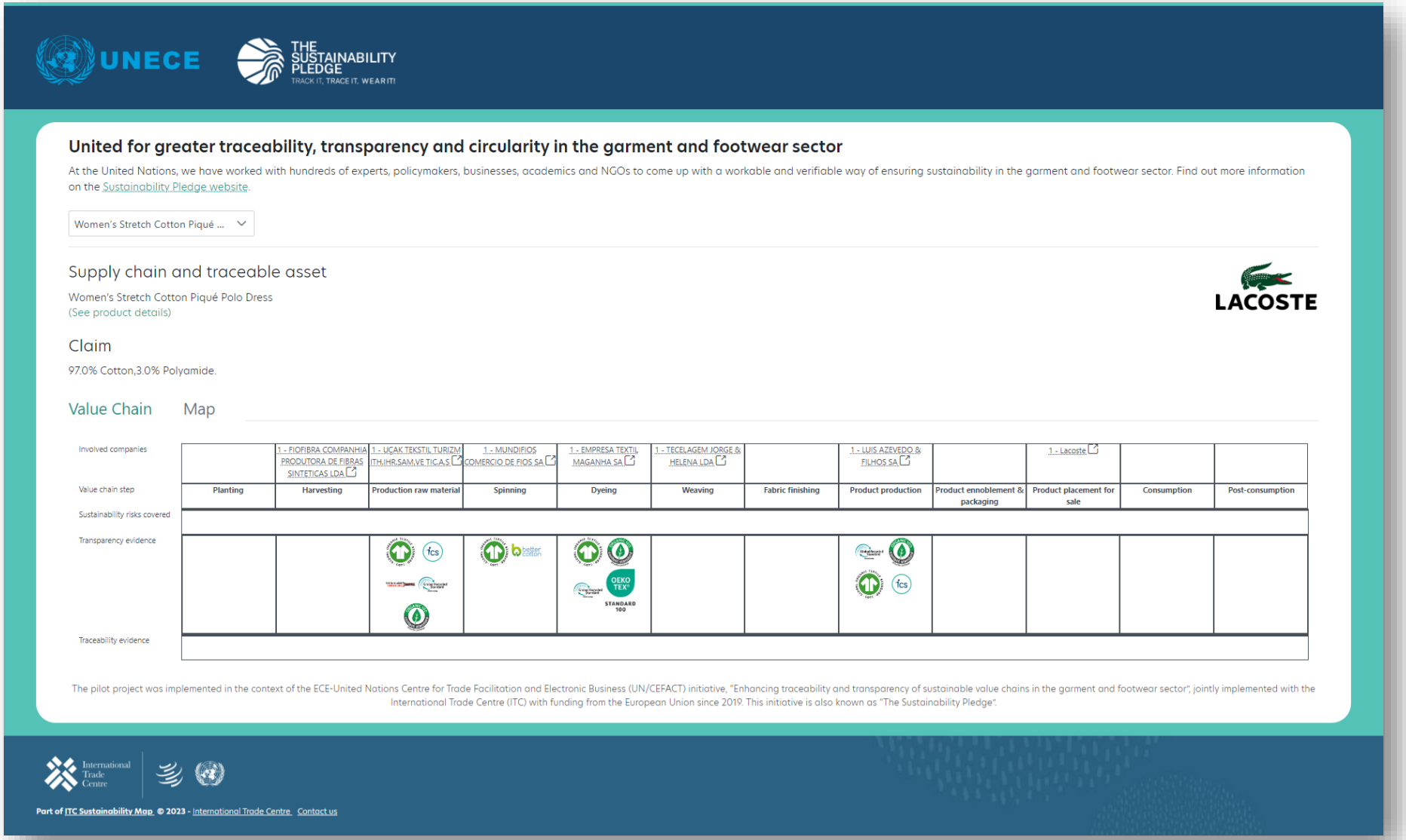
The pilot project was implemented in the context of the ECE-United Nations Centre for Trade Facilitation and Electronic Business (UN/CEFACT) initiative, "Enhancing traceability and transparency of sustainable value chains in the garment and footwear sector", jointly implemented with the International Trade Centre (ITC) with funding from the European Union since 2019. This initiative is also known as "The Sustainability Pledge".

International Trade Centre

Part of ITC Sustainability Map © 2023 - International Trade Centre Contact us



Case study example (ICS)



Stay connected!

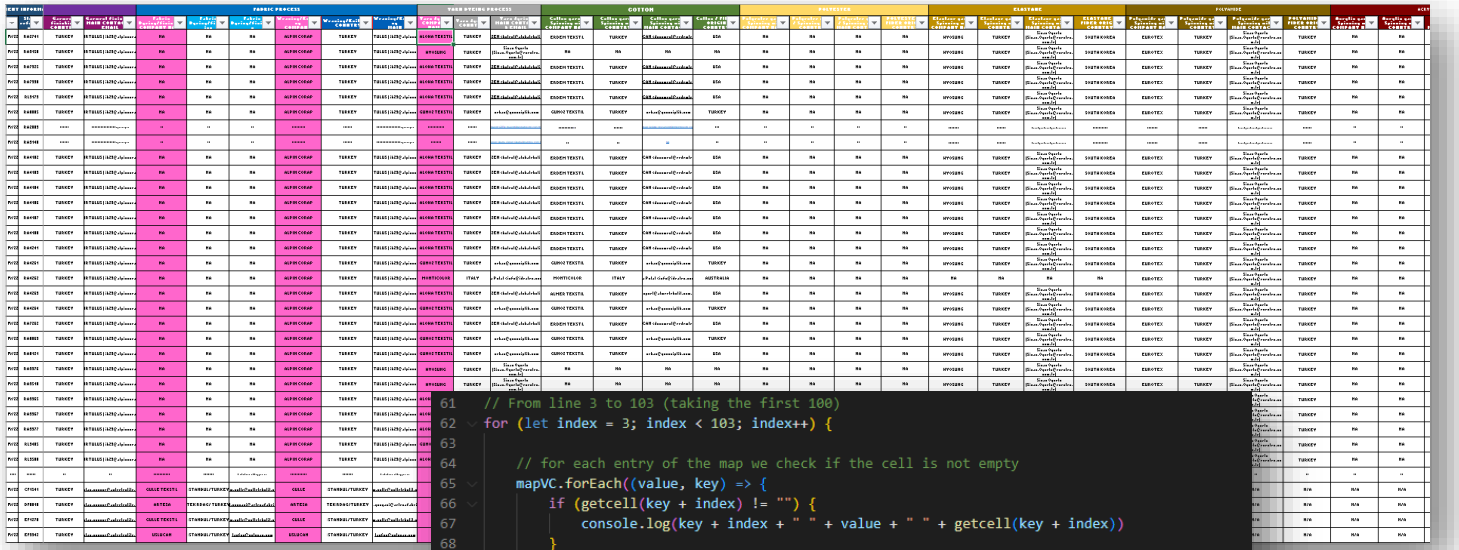
- www.intracen.org
- @ITCnews
- @ITC_sustainable
- @InternationalTradeCentre

Working with Partners' data when visualizing UNECE sustainability matrix

International Trade Centre

Q&A / Backup slides

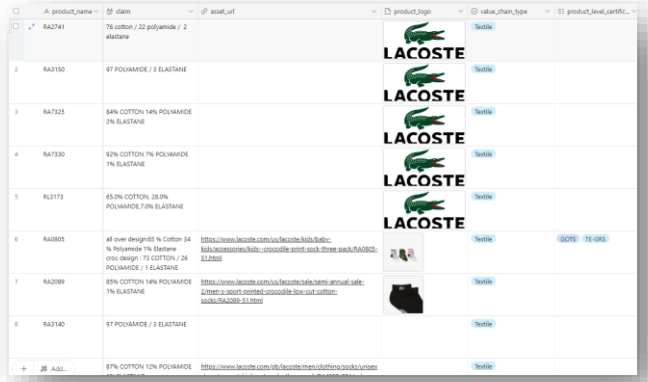
Working with Partner's data #1



```
// From line 3 to 103 (taking the first 100)
for (let index = 3; index < 103; index++) {

    // for each entry of the map we check if the cell is not empty
    mapVC.forEach((value, key) => {
        if (getcell(key + index) != "") {
            console.log(key + index + " " + value + " " + getcell(key + index))
        }

        // if na we don't add it to the array
        if(["NA", "N/A", ""].indexOf(getcell(key + index)) > -1 ) {
            return;
        }

        arrayVC.push([ getcell("B" + index), value[0] , value[1] , getcell(key + index) ])
        companies.push([ getcell(key + index), getcell( mapVCCountries.get(key) + index)])


    });

}

// Remove duplicates
companies = [...new Set(companies.map(JSON.stringify))].map(JSON.parse);

// For each company we call the API to get the address
async function getGeo(companies) {  ···
}

getGeo(companies)
```

ALPIN CORAP	TURKEY	41.003048	28.66257
GELISIM TEKSTIL / KARAC	TURKEY	41.0003866	28.66717
ALOHA TEKSTIL	TURKEY	41.2513274	27.87876
ERDEM TEKSTİL	TURKEY	38.963745	35.24332
HYOSUNG			
EUROTEX			
HYOSUNG	TURKEY	38.963745	35.24332
GUNOZ TEKSTIL	TURKEY	41.2204074	27.87508
MONTICOLOR	ITALY	45.4476838	10.21488
ALMER TEKSTIL	TURKEY	38.751114	35.36871
APPAREL MILLS	MOROCCO	31.791702	-7.09262
LA CHEVECHE	MOROCCO	31.791702	-7.09262
FTSI	Maroc	31.791702	-7.09262
GULLE TEKSTİL	İSTANBUL/TURKEY	40.9872813	28.69642
ASTER	TURKEY	38.963745	35.24332
GULLE	İSTANBUL/TURKEY	41.0082376	28.97836
GÜLLE TEKSTİL	TEKİRDAG/TURKEY	41.220966	27.72455
ARTESA	TEKİRDAG/TURKEY	41.3028601	27.96545
YES	TURKEY	38.963745	35.24332
ARTESA	TEKİRDAG/ TURKEY	41.3028601	27.96545
KUCUKCALIK		40.0919204	29.50281
CREORA		11.1263769	77.32917
USLUCAN	İSTANBUL/TURKEY	41.0260973	28.81891
EREN TEKSTIL	TEKİRDAG/TURKEY	41.2234899	27.72117
BİRAY	İSTANBUL/TURKEY	40.9997328	28.66207
BIRAY	İSTANBUL/TURKI	RA2741	Product production		ALPIN CORAP
GÜLLE TEKSTİL		RA2741	Fabric finishing	(Silkscreen printing/	GELISIM TEKSTIL / KARACA NAKIS
GULCEK TEKSTIL	TEKİRDAG/TURK	RA2741	Fabric finishing	(Garment finishing)	ALPIN CORAP
GULCEK TEKSTIL	TEKİRDAG/ TURK	RA2741	Weaving		ALPIN CORAP
GULCEK	TEKİRDAG/TURK	RA2741	Dyeing		ALOHA TEKSTIL
UÇAK TEKSTIL	IZMIR/TURKEY	RA2741	Spinning	(Cotton)	ERDEM TEKSTİL
UÇAK TEKSTIL		RA2741	Spinning	(Elastane)	HYOSUNG
MEM	KAHRAMANMAR	RA2741	Spinning	(Polyamide)	EUROTEX
		RA3150	Product production		ALPIN CORAP
		RA3150	Fabric finishing	(Silkscreen printing/	GELISIM TEKSTIL / KARACA NAKIS
		RA3150	Fabric finishing	(Garment finishing)	ALPIN CORAP
		RA3150	Weaving		ALPIN CORAP
		RA3150	Dyeing		HYOSUNG
		RA3150	Spinning	(Elastane)	HYOSUNG
		RA3150	Spinning	(Polyamide)	EUROTEX
		RA7325	Product production		ALPIN CORAP
		RA7325	Fabric finishing	(Silkscreen printing/	GELISIM TEKSTIL / KARACA NAKIS
		RA7325	Fabric finishing	(Garment finishing)	ALPIN CORAP
		RA7325	Weaving		ALPIN CORAP
		RA7325	Dyeing		ALOHA TEKSTIL
		RA7325	Spinning	(Cotton)	ERDEM TEKSTİL
		RA7325	Spinning	(Elastane)	HYOSUNG
		RA7325	Spinning	(Polyamide)	EUROTEX
		RA7330	Product production		ALPIN CORAP
		RA7330	Fabric finishing	(Silkscreen printing/	GELISIM TEKSTIL / KARACA NAKIS
		RA7330	Fabric finishing	(Garment finishing)	ALPIN CORAP
		RA7330	Weaving		ALPIN CORAP
		RA7330	Dyeing		ALOHA TEKSTIL
		RA7330	Spinning	(Cotton)	ERDEM TEKSTİL
		RA7330	Spinning	(Elastane)	HYOSUNG
		RA7330	Spinning	(Polyamide)	EUROTEX
		RL3173	Product production		ALPIN CORAP
		RL3173	Fabric finishing	(Silkscreen printing/	GELISIM TEKSTIL / KARACA NAKIS

Working with Partner's data #2



step_number	product	step_textile_vc	sub-product	suppliers
1	6H9844	Product production		APPAREL MILLS
2	6H9844	Fabric finishing	(Silkscreen printing/Embroi...	LA CHEVECHE
3	6H9844	Fabric finishing	(Fabric Dyeing/finishing)	APPAREL MILLS
4	6H9844	Weaving		APPAREL MILLS
5	6H9844	Spinning	(Cotton)	FTSI
6	6H9844	Spinning	(Elastane)	HYOSUNG
7	BH6181	Spinning	(Elastane)	RAYON TEXTILE
8	BH6181	Spinning	(Polyamide)	FULGAR
9	BH6181	Product production		RAYON TEXTILE
10	BH6181	Fabric finishing	(Garment finishing)	BARCO
11	BH6181	Fabric finishing	(Fabric Dyeing/finishing)	RAYON TEXTILE
12	BH6181	Weaving		RAYON TEXTILE
13	CF1541	Product production		GULLE TEKSTİL
14	CF1541	Fabric finishing	(Garment finishing)	ASTER
15	CF1541	Fabric finishing	(Fabric Dyeing/finishing)	GULLE TEKSTİL
16	CF1541	Weaving		GULLE
17	CF1541	Spinning	(Cotton)	GÜLLE TEKSTİL
18	DF0810	Fabric finishing	(Fabric Dyeing/finishing)	ARTESA
19	DF0810	Weaving		ARTESA
20	DF0810	Spinning	(Polyester)	KUCUKCALIK
21	DF0810	Product production		ARTESA
22	DF0810	Spinning	(Elastane)	CREORA
	DF0810	Fabric finishing	(Silkscreen printing/Embroi...	YES

Add...

640 records

United for greater traceability, transparency and circularity in the garment and footwear sector

At the United Nations, we have worked with hundreds of experts, policymakers, businesses, academics and NGOs to come up with a workable and verifiable way of ensuring sustainability in the garment and footwear sector. Find out more information on the Sustainability Pledge website.

Women's Stretch Cotton Piqué ...

Supply chain and traceable asset

Women's Stretch Cotton Piqué Polo Dress
(See product details)

LACOSTE

Claim

97.0% Cotton,3.0% Polyamide.

Value Chain | Map

Involved companies		1 - FIOFIBRA COMPANHIA PRODUTORA DE FIBRAS SINTETICAS LDA	1 - UÇAK TEKSTİL TURİZM İTH.İHR.SAM.VE TİC.A.Ş	1 - MUNDIFIOS COMERCIO DE FIOS SA	1 - EMPRESA TEXTIL MAGANHA SA	1 - TECELAGEM JORGE & HELENA LDA		1 - LUIS AZEVEDO & FILHOS SA		1 - Lacoste		
Value chain step	Planting	Harvesting	Production raw material	Spinning	Dyeing	Weaving	Fabric finishing	Product production	Product ennoblement & packaging	Product placement for sale	Consumption	Post-consumption
Sustainability risks covered												
Transparency evidence												
Traceability evidence												

The pilot project was implemented in the context of the ECE-United Nations Centre for Trade Facilitation and Electronic Business (UN/CEFACT) initiative, "Enhancing traceability and transparency of sustainable value chains in the garment and footwear sector", jointly implemented with the International Trade Centre (ITC) with funding from the European Union since 2019. This initiative is also known as "The Sustainability Pledge".

Working Meeting – Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

10.00-11.00
ITEM 1: WHERE ARE WE NOW ON ESG TRACEABILITY?

Moderator: Vice-Chair of the ToS, **Harm Jan van Burg**, Senior Policy Advisor on International Standards, OASIS

Panellists:

- **British Columbia Ministry of Energy, Mines and Low Carbon Innovation**, **Nancy Norris**, Senior Director – ESG & Digital Trust
- **Initiative for Compliance and Sustainability**, **Carole Hommey**, General Manager
- **International Trade Centre**, **Grzegorz Tajchman**, IT Solutions Manager
- **TÜV Rheinland Group**, **Rakesh Vazirani**, Head of Sustainability Services

20 minutes of Q&A

Spine of a Sustainable Supply Chain > Traceability

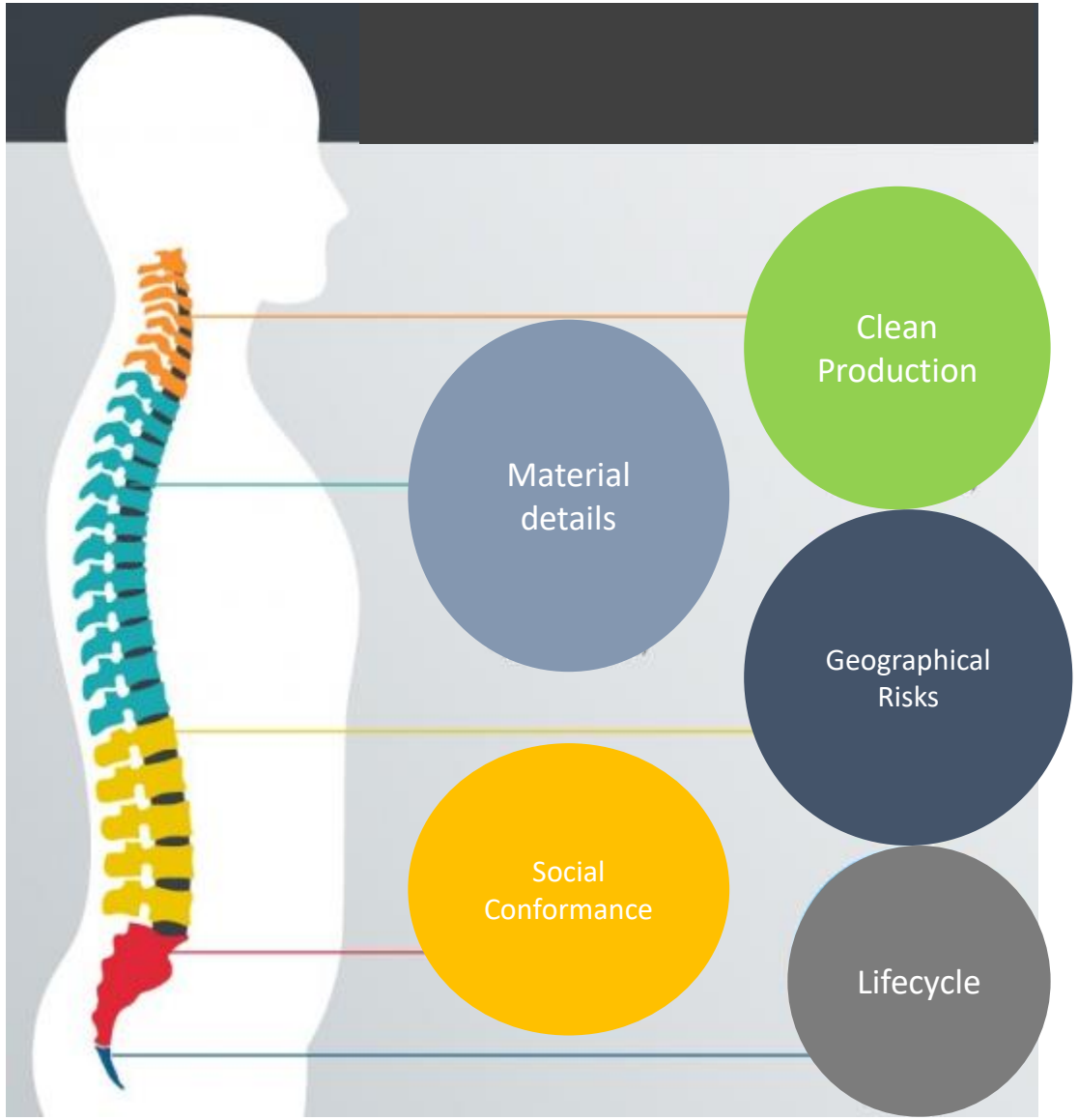


Image Source : Freepik

TÜVRheinland®
Precisely Right.

Do you know...

how many EU legislations on sustainability will impact the textile and clothing companies?

16

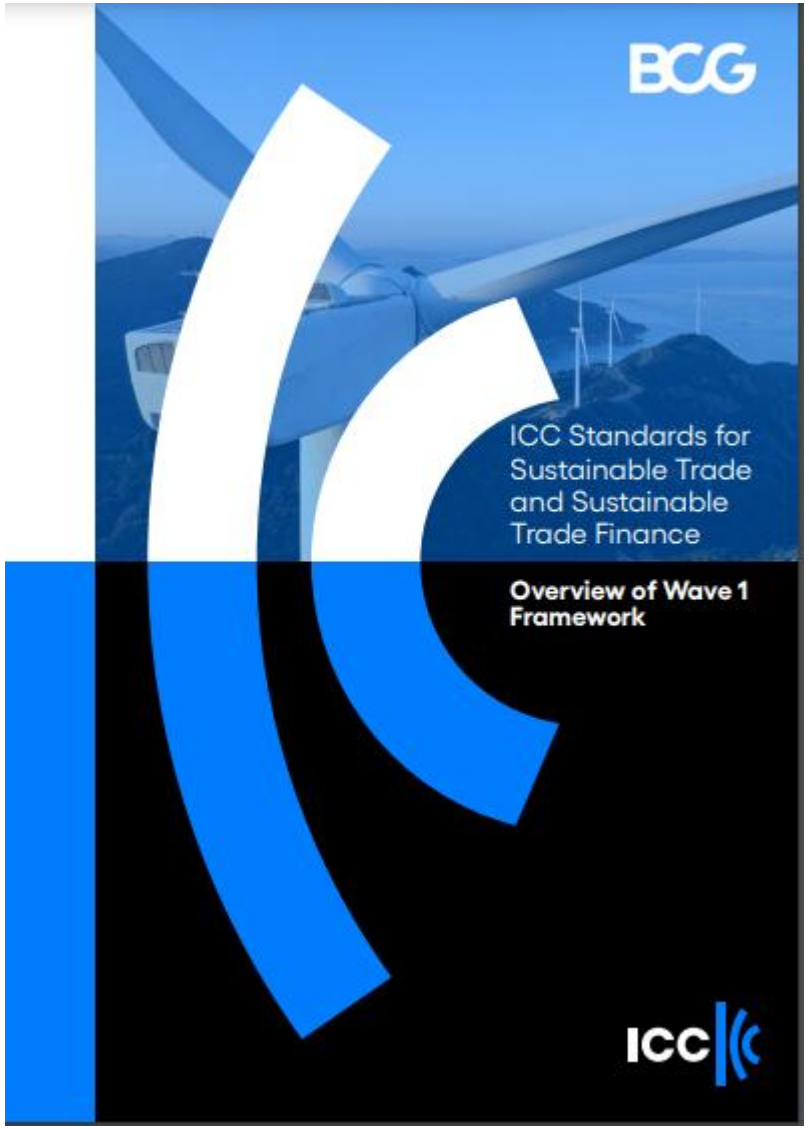
- Ecodesign and Digital Product Passport
- Extended Producer Responsibility (EPR)
- Waste Shipment
- Green Claims and textile labelling
- Green Public Procurement (GPP)
- Waste Legislation
- Corporate Sustainability Due Diligence
- Corporate Sustainability Reporting Directive
- Industrial Emissions
- Sustainable Finance (Taxonomy)
- Microplastic
- PFAS Restriction
- Skin Sensitisers
- Bisphenol
- REACH Revision
- PFHxA Restriction

Our Global Value Chain

Retailers	Brands	Agents & Trading Companies	Tier 1: Finished Goods Assemblers (+ Trims)	Materials "Converter"	Tier 2: Dyers, Printers, Finishers, & Laminators	Tier 2: Weavers, Knitters & Nonwovens	Tier 3: Spinners & Fiber Processers	Tier 4: Raw Material Suppliers

created by Matt Thurston, REI, with further modifications from OIA

Sustainable Trade & Sustainable Trade Finance



Wave 1 pilot to focus on textile industry only

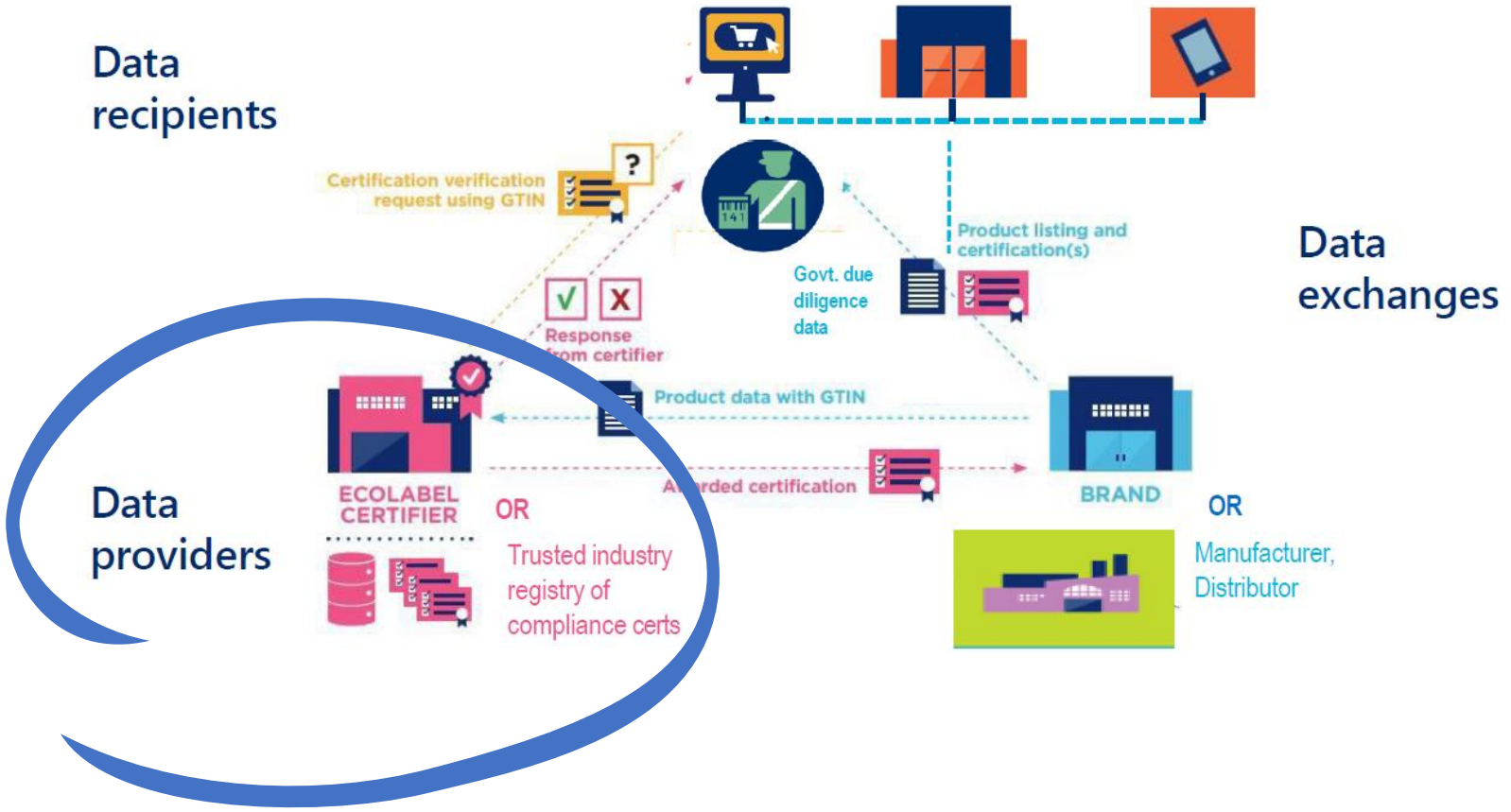
	Environmental	Socio-economic
Goods	GRÜNER KNOPF	
Seller	FSC FOREST STEWARDSHIP COUNCIL	
Buyer	Higg Index	WRAP
Transportation	Not assessed	
Purpose	The Green Bond Principles	The Social Bond Principles

TÜVRheinland®
Precisely Right.

Asian Development Bank

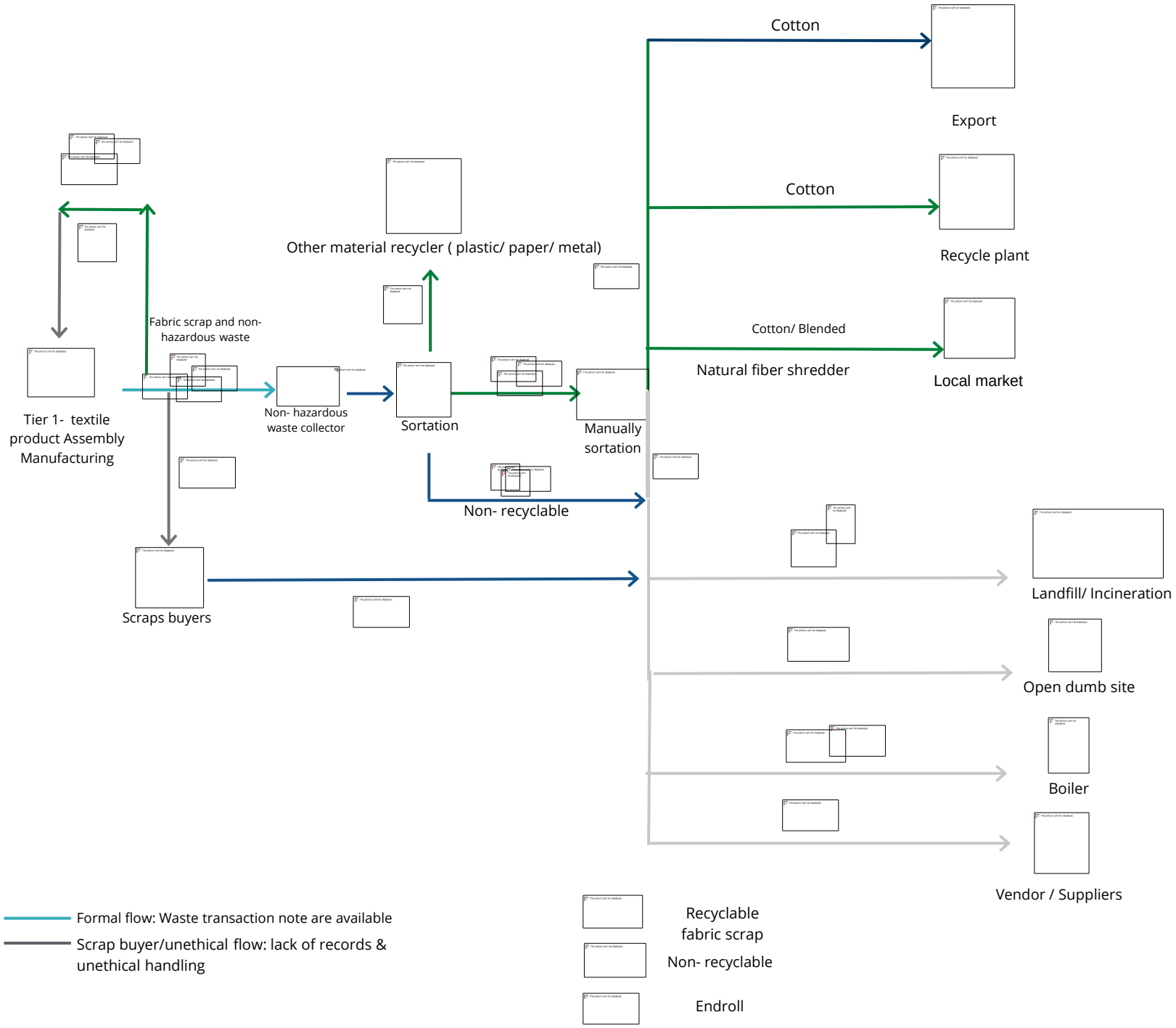
ESG Credentials Exchange Programme

GS1 Hong Kong

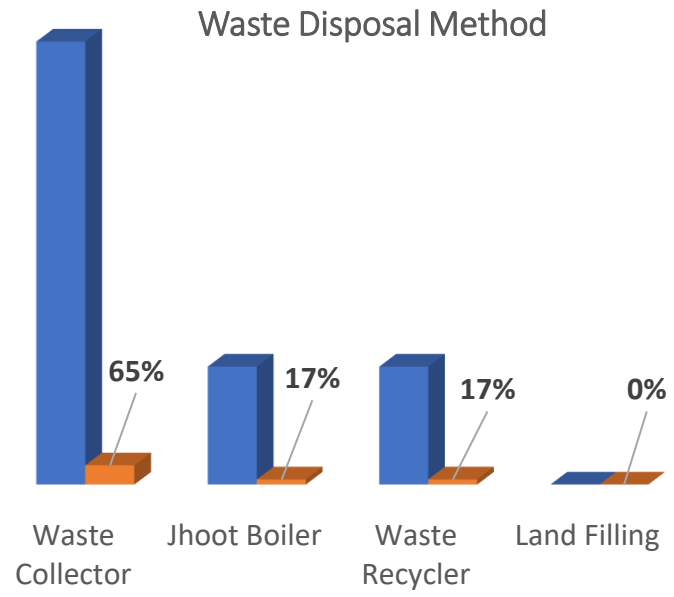


Accelerate the adoption of trusted based supply chain traceability in the apparel and food industries (field to consumer)

TÜVRheinland®
Precisely Right.



PRODUCT TYPE	CUTTING WASTE (As Per % of Fabric used)
Knit	15-20%
Woven & Denim	20-25%
Fashion(Jacket)	12-15%
Average	15-20%



GIZ FABRIC : Waste mapping study

TÜVRheinland®
Precisely Right.

PLATFORM ON SUSTAINABLE FINANCE

The activity provides traceability information on SVHC, by complying with at least one of the two disclosure frameworks listed below:

- Product information on substances is available publicly, in SCIP database or in a specific public tool provided by company
- Product information on substances is available publicly, following IEC62474 (for EEE) and future IEC82474 for all other sectors (dual logo project)

section A.2 above. Third-party verification of the recycled content and its traceability is provided for the relevant feedstocks and production lines according to ISO 14021. For

EFRAG

E5 Resource use and circular economy: Overview (II/II)

6 Disclosure Requirements related to performance measurement

- **DR E5-4 –** Resource inflows
- **DR E5-5 –** Resource outflows
- **DR E5-6 –** Waste SFDR
- **DR E5-7 –** Resource use optimisation
- **DR E5-8 –** Circularity support
- **DR E5-9 –** Financial effects from resource use and circular-economy-related impacts, risks and opportunities
- **Taxonomy Regulation**

SFDR Link to SFDR principal indicator on Hazardous waste and radioactive waste ratio and additional indicator on Non-recycled waste ratio.

Information on the **five sub-themes**:

- quantitative (absolute value et percentage) et qualitative.
- ***Resource Inflows***: information on the materials used (renewable, reused, recycled).
- ***Resource Outflows***: information on the weight and percentage of products, materials and packaging intentionally created to contribute to the circular economy, i.e. sustainability, reusability, reparability, disassembly, recycling, etc.
- ***Waste***: details of hazardous/non-hazardous waste and waste destination.
- ***Resource use optimisation***: share of turnover for products and services that optimise the use of resources and promote circular business models.
- ***Circularity support***: coordinated actions and partnerships in the value chain.

SASB STANDARDS
Now part of IFRS Foundation

4.1.1 Enhancing supply chain visibility and traceability to raw materials suppliers through due diligence practices, research into traceability or use of traceability systems, technology, supplier screening, supplier audits or certifications, and/or a list of countries from which the entity sources each priority raw material;

TÜVRheinland®
Precisely Right.

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

10.00-11.00
ITEM 1: WHERE ARE WE NOW ON ESG TRACEABILITY?

Poll question: What aspects need greater focus concerning Traceability ?

1. Harmonized Product and Activity identification scheme by industry sector
2. Funding for establishing digital infrastructure to capture traceability information
3. Incentive for companies for greater traceability metrics (from investors, governments)
4. Ensure groups/associations within industry sectors are inclusive and open for participation; with access to sustainability related data.
5. Stop obsessing with Traceability!

Take the poll at: http://etc.ch/fmFd

Q&A: 20 minutes

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

11.00-11.30

BREAK

Working Meeting – Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

11.30-12.30
ITEM 2: TEAM OF SPECIALISTS WORKSHOP - PART I

Data for ESG monitoring and reporting protocol - Guiding questions:

- What data do we need to collect to ensure effective ESG monitoring and reporting of value chains?
- What types of sustainability and geopolitical risks?
- How do we determine which data points are relevant for each aspect of ESG (environmental, social, and governance) to address these risks?
- How can we ensure the accuracy and reliability of the data we collect?

TIMETABLE: 30’ small group discussion 30’ audience-wide discussion

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

13.00-14.30

LUNCHBREAK

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

14.00-16.00

ITEM 3: TEAM OF SPECIALISTS WORKSHOP - PART II

Guiding question: What are the cross-sectorial, and the sector-specific challenges, regarding data monitoring and reporting in the following sectors:

I. Keynote presentations

- GS1, **Francesca Poggiali,** Chief Public Policy Officer Europe
- Institute of Quality Certification for the Leather Sector (ICEC), **Sabrina Frontini**, Director

II. Sector-focused discussion

Critical raw materials value chains

Lead discussant: World Economic Forum, **Luciana Gutmann**, Project Fellow, Securing Critical Minerals for the Energy Transition

Textile and leather value chains

- **Lead discussant:** Better Cotton, **Kendra Pasztor**, Senior Manager - Monitoring, Evaluation, and Learning

Agri-food value chains

- **Lead discussant: Charles Arden-Clarke**, former Head One Planet Network secretariat of UNEP

Working Meeting – Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

14.00-16.00
ITEM 3: TEAM OF SPECIALISTS WORKSHOP – PART II

I. Keynote presentations

- GS1, **Francesca Poggiali,** Chief Public Policy Officer Europe
- Institute of Quality Certification for the Leather Sector (ICEC), **Sabrina Frontini**, Director

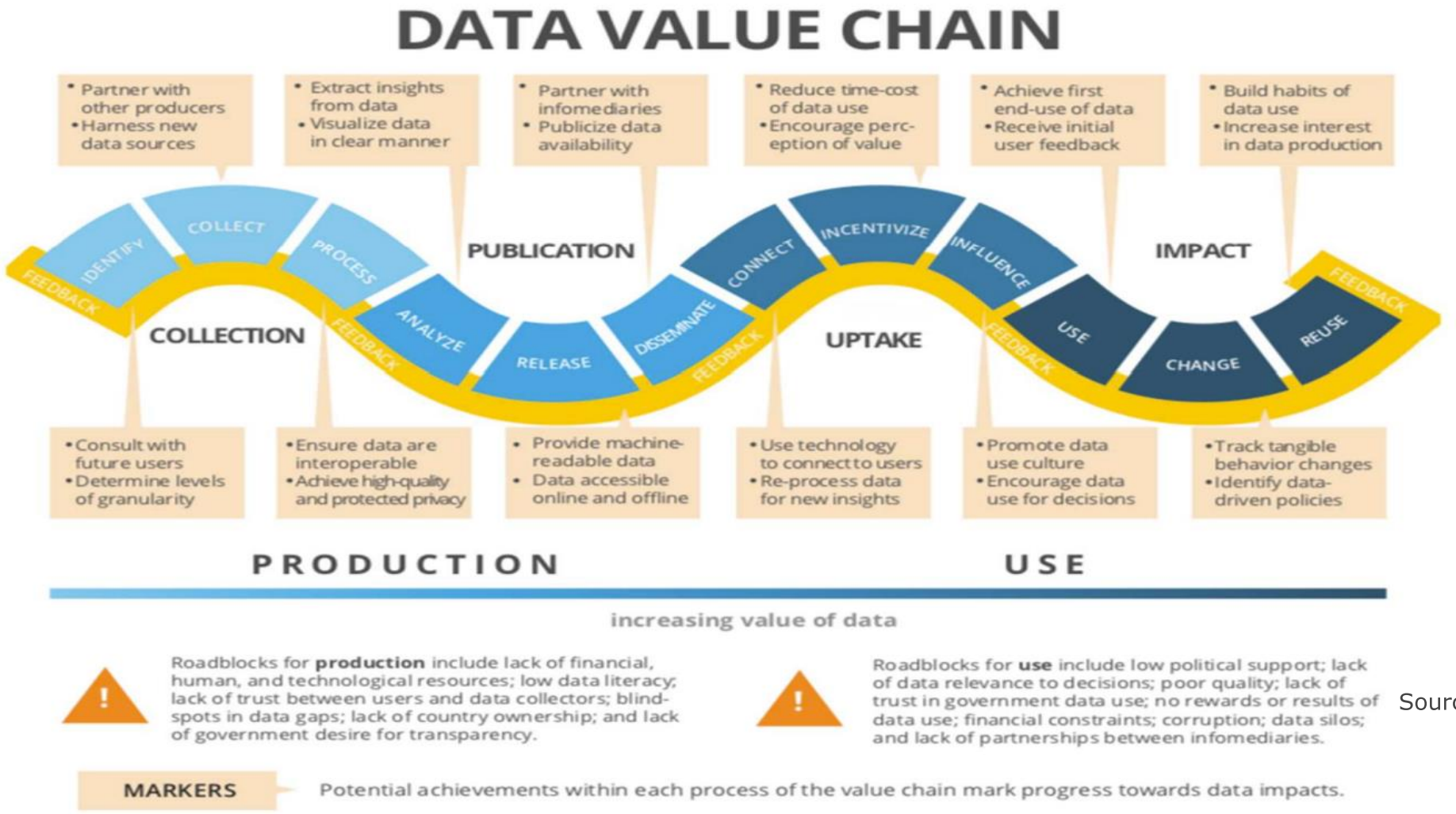
The Global Language of Business

UNECE
ESG Traceability of Sustainable Value Chains in the Circular Economy

ITEM 3: **TEAM OF SPECIALISTS WORKSHOP**

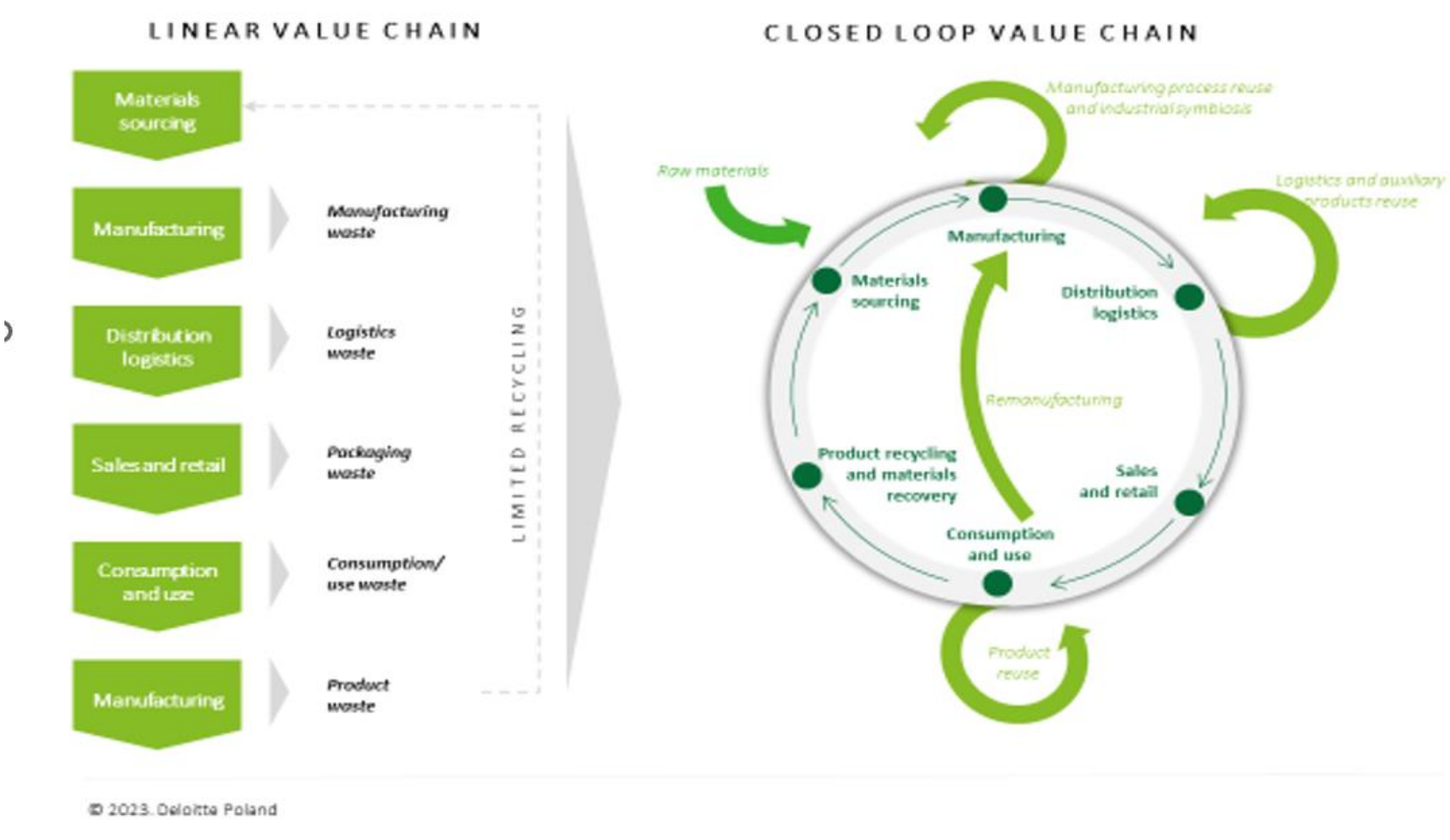
Francesca Poggiali
Chief Public Policy Officer Europe – GS1 Global Office
9th May 2023

Interoperable product data



Source: Open data watch

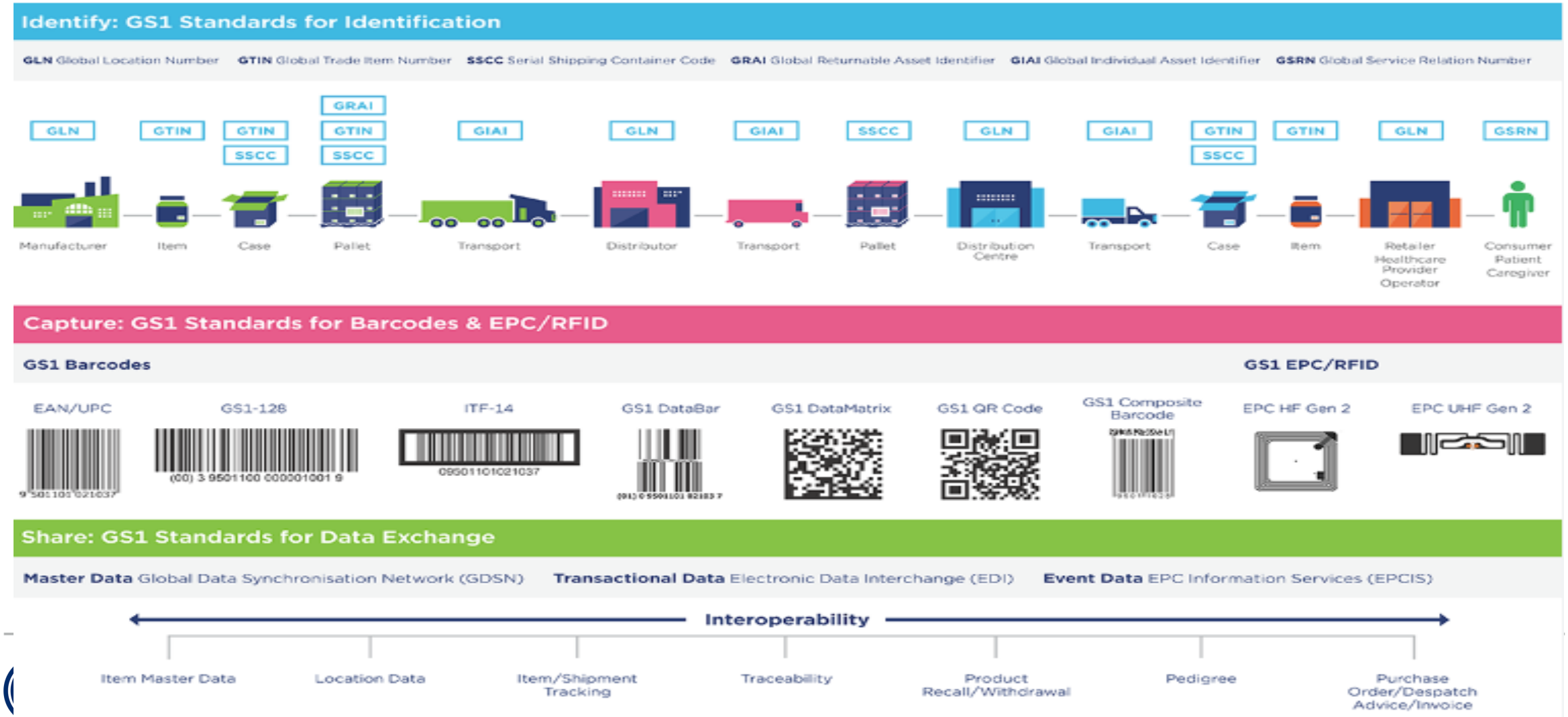
From linear to circular data



Circular economy implies the following features:

1. Allows economic growth from the consumption of scarce resources
2. Enhances natural capital by separating biological materials from plastics, and creating opportunities for the regeneration of the ecosystem
3. Optimizes the use of resources by reasonable design and maintenance of materials in circulation
4. Developing innovation and stimulating the development of new technologies
5. Increases system performance by identifying and removing negative externalities (e.g. emissions)

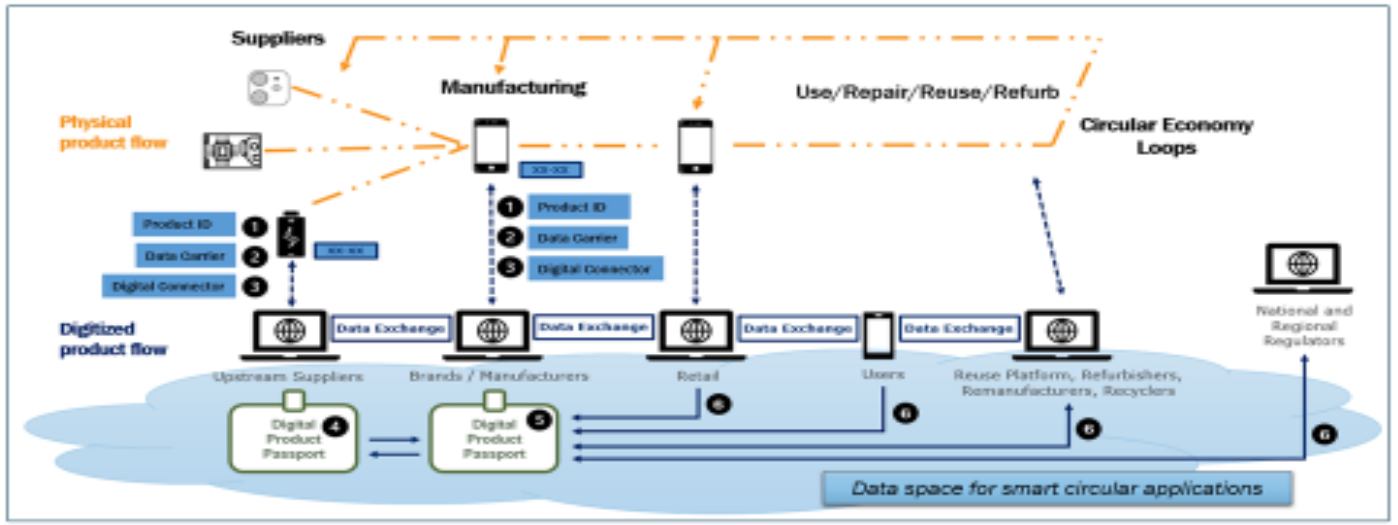
GS1 global, open data standards



Digital Product Passport: CIRPASS

Components of the DPP system

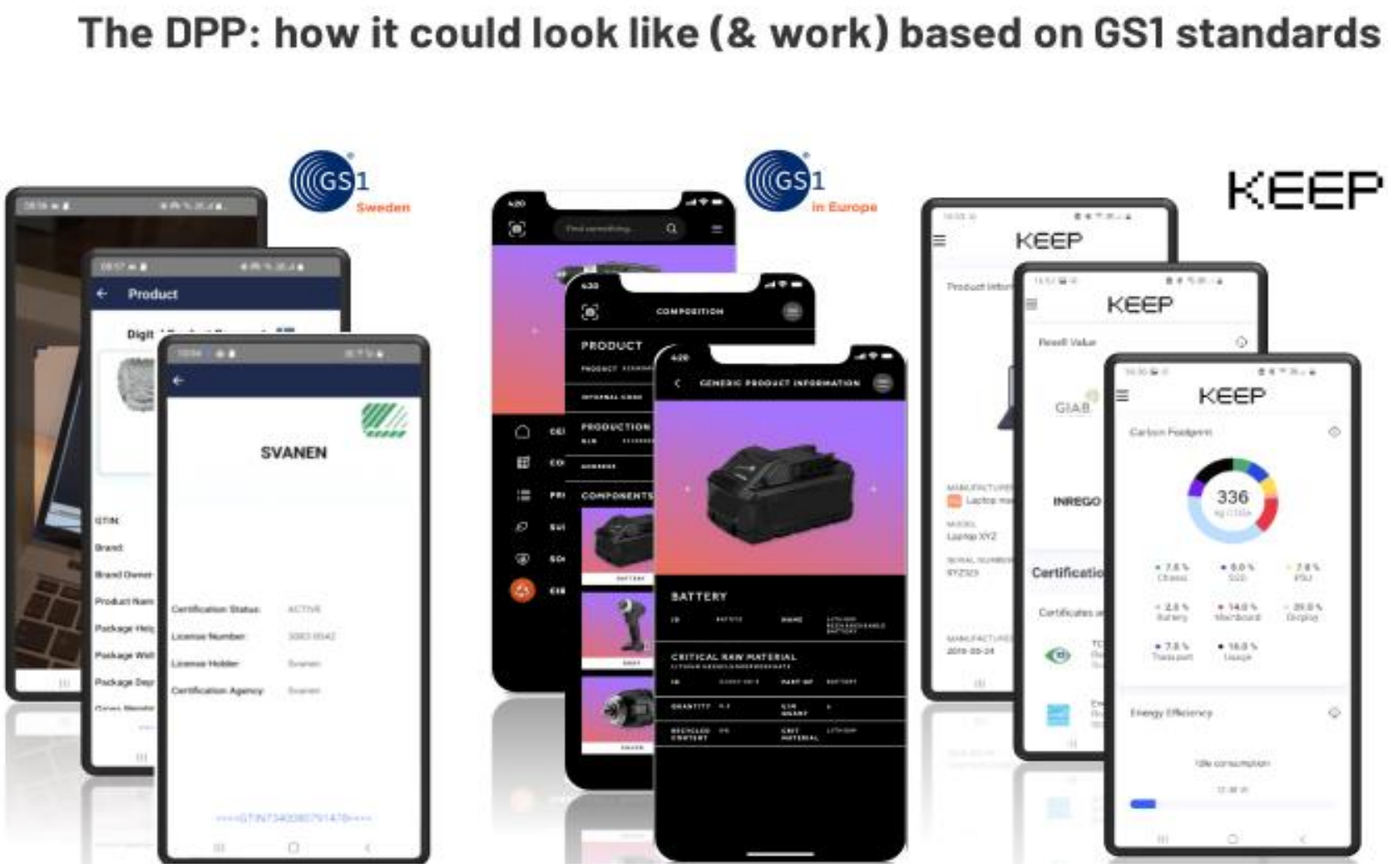
- A unique persistent ID for the product (including batch and/or serialization as necessary) (1)
- A persistent data carrier (RFID, QR Code, digital watermark, Bluetooth tag, etc.) (2)
- A Digital connector between physical product and the digital place of information on the product (e.g., URI address) (3)
- An IT architecture for facilitating the data exchange (6) composed of:
  - Standardized vocabulary
  - Standardized data exchange protocols and formats
  - Standardized stakeholder-dependent access mechanisms (read/edit rights)
  - Distributed management of stored information (in connection with EU dataspaces)
  - A stakeholder-dependent interaction layer



Funded by the European Union

CIRPASS

DPP pilots


The DPP: how it could look like (& work) based on GS1 standards
GS1 Sweden
Product
SVANEN
GS1 in Europe
COMPOSITION
PRODUCT
GENERIC PRODUCT INFORMATION
BATTERY
CRITICAL RAW MATERIAL
KEEP
KEEP
KEEP
336

New standarisation table opened

The circular economy model includes new thinking related to the management of product data and resources, which increasingly need to be retained through re-designing, re-manufacturing, re-use and recycling.

Scope

To set the foundation for the GS1 system to support industry's identification and data sharing needs related to Circularity. Early-stage work of the group will focus on adapting the GS1 system so that industry can more effectively use it to address the known regulatory drivers of the EU Digital Product Passport.

[Join the GS1 Circularity – DPP group]

https://www.gs1.org/standards/development-work-groups

Thanks to all!

Working Meeting – Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

14.00-16.00
ITEM 3: TEAM OF SPECIALISTS WORKSHOP – PART II

I. Keynote presentations

- GS1, **Francesca Poggiali,** Chief Public Policy Officer Europe
- Institute of Quality Certification for the Leather Sector (ICEC), **Sabrina Frontini**, Director

ESG Traceability of Sustainable Value Chains in the Circular Economy

UNECE – GENEVE

2023.05.09

ICEC

Relevant updates in the space of ESG traceability of leather

ICEC – Quality Certification Institute for the Leather Sector

www.icec.it icec@icec.it

LEATHER MARKET NEEDS

CONSCIOUSNESS

OF SUPPLIERS, OF THEIR SUPPLY CHAIN, OF PURCHASED MATERIALS

CERTIFICATION ON **SUSTAINABILITY** ISSUES: ENVIRONMENTAL, ETHICAL-SOCIAL, HEALTH AND SAFETY, CHEMICALS, PRODUCT, ...

ONE OF THE MAIN TOPICS IS ALWAYS

TRACEABILITY OF RAW MATERIALS (LEATHERS)

GUARANTEES FROM THE TANNERIES

ALTHOUGH **LEATHER IS A BY PRODUCT** OF THE **FOOD INDUSTRY**
(bovine animals, sheep and goats, pigs: > 99%),
THE SUPPLY CHAIN ANSWERS TO THE REQUESTS of TRACEABILITY

→ TANNERIES GIVES GUARANTEES THROUGH
TRACEABILITY CERTIFICATIONS (E.g. ICEC TS410/412)

INFORMATION ON THE **COUNTRIES AND PLACES** OF **SLAUGHTERING AND BREEDING** OF THE ANIMALS FROM WHICH THE HIDES/SKINS USED BY THE TANNERIES ORIGINATE, ARE MAPPED AND VERIFIED BY DIFFERENT BODIES OF CERTIFICATION

TRACEABILITY DEVELOPMENTS

STARTING FROM THE DATA COLLECTED WITH TRACEABILITY CERTIFICATIONS, IT SHALL APPLY THE FOLLOWING:

- THE **ETHICAL CLAIM** «WE RECOVER OUR HIDES/SKINS FROM THE FOOD INDUSTRY» (e.g. ICEC TS733)
- THE **RISK ANALYSIS ON DEFORESTATION** FOR LEATHERS OF SOUTH AMERICAN ORIGINS **DCFL TOOL** (e.g. ICEC-NWF-WWF)
- THE RISK ANALYSIS ON **ANIMAL WELFARE** (e.g. AW TOOL by ICEC)

What is more pressing?

The **EU is a major consumer of commodities** associated with deforestation and forest degradation.

Objectives of the EU Regulation:

- Minimise the EU's contribution to deforestation and forest degradation worldwide

→ **Mandatory due diligence** rules for all operators that place the relevant products on the EU market or export them from the EU (2021)

- Only products that are both **deforestation-free and legal** would be allowed to be imported into or exported from the EU market (including **LEATHERS**)

→ **December 2024 (tentative)**: Entry into the application of obligations for operators (June 2025 for small enterprises)

COTANCE & CEN TC289 initiative on Alignment of Leather Traceability Schemes

COTANCE – CEN TC 289

- offers certification scheme owners a platform to meet and negotiate on a **pre-competitive basis** for defining the minimum essential elements of traceability and evidence of verification to be present in a traceability scheme
- chairs the European standardisation body **CEN TC 289** where an agreement of traceability certification scheme owners can be officially consecrated in a GUIDELINE standard, allowing it to be referenced in legislation
- in 2019 started a dialogue between Leather-Meat that agreed on traceability objectives
- 2022: gathered **all the relevant certification scheme owners** in the "Leather Traceability Cluster", which agreed in January 2023 to terms of reference (MONTHLY MEETINGS)

COTANCE ICEC LEATHER WORKING GROUP SUSTAINABLE LEATHER FOUNDATION OEKO TEX® Textile Exchange cen TC 289 ....

Finding agreed solutions to

- Mapping the full Chain of Custody for a product
- Aligning on vocabulary & terms
- Identifying geografical provenance of a product
- Qualifying Countries according to Risk
- Ensuring documental and/or physical identity along the supply chain, etc…

GROUP NOW INVOLVING OTHER CLUSTERS:

UNECE

NATIONAL WILDLIFE FEDERATION

WWF

UNIDO

CICB CENTRO DAS INDÚSTRIAS DE CURTUMES DO BRASIL

LEATHER AND HIDE COUNCIL OF AMERICA

& LAST BUT NOT LEAST: ITC

ICEC AND COTANCE ARE COLLABORATING WITH ITC FOR THE **LEATHER STANDARD ASSESSMENT:**

- LISTING & FILLING

THE MAP OF CERTIFICATION SCHEMES (***NATIONAL, INTERNATIONAL, PRIVATE STANDARDS***) WHICH ARE MAINLY ***RECOGNIZED AND APPLIED BY THE LEATHER SECTOR*** ACCORDING TO SUSTAINABILITY ISSUES.

THIS SHALL WORK AS AN OFFICIAL REFERENCE TO SUPPORT

SUSTAINABLE CLAIMS WITHOUT PRODUCING GREENWASHING

(REF. Traceability and Transparency for Sustainable and Circular Garment and Footwear Value Chains).

Thank you. For any information: SABRINA FRONTINI s.frontini@icec.it

ICEC

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

14.30-16.00

ITEM 3: TEAM OF SPECIALISTS WORKSHOP - PART II

TIMETABLE: SECTOR-FOCUSED DISCUSSION (35 minutes each)

35 minutes: **5'** ice-breaking **-> 25'** group discussion **-> 5'** wrap-up and closing

1. **Critical raw materials value chains**
   - **Lead discussant:** World Economic Forum, **Luciana Gutmann**, Project Fellow, Securing Critical Minerals for the Energy Transition

2. **Textile and leather value chains**
   - **Lead discussant:** Better Cotton, **Kendra Pasztor**, Senior Manager - Monitoring, Evaluation, and Learning

3. **Agri-food value chains**
   - **Lead discussant:** **Charles Arden-Clarke**, former Head One Planet Network secretariat UNEP

Empowering Sustainable Resource Management: Updates, Transformations, and Potentials

Securing Minerals for the Energy Transition

Luciana Gutmann
Project Fellow,
Securing Minerals for the Energy Transition

UNECE – UN/CEFAT 40th Forum
Geneva, 09 May 2023

01

The Forum

Our role

01

The World Economic Forum is the International Organization for Public-Private Cooperation.

Our purpose is to bring together stakeholders from all sectors of society to shape a better future and generate great impact through purpose-driven communities and platforms.

Five decades as a trusted platform for high-level, multistakeholder cooperation.

Our mission is to improve the state of the world.

Our approach

01

No single entity can improve the state of the world on its own.

At the Forum, we believe in convening multiple stakeholders and playing our role to amplify and scale up the world's best strategies for impact through a platform approach.

WORLD ECONOMIC FORUM

02

Securing Minerals for the Energy Transition

Securing Minerals for the Energy Transition - SMET

03

We have two objectives

Identify and characterize the risks derived from the increasing supply-demand gap in minerals for the energy transition and propose strategies for their collective management.

Design and assemble a global multistakeholder platform for monitoring, informing, managing risks and coordinating action.

We've secured support for this year

03

Definition
Oct 22-Nov 22
- Consolidate information on the supply-demand gap of critical minerals
- Refine assumptions

Risk mapping
Dec 22 – Jan 23
- Map risks derived from the gap

Convergence
Feb-Apr 23
- Identify possible actions for shared risk management

Coalition building
Apr 23- Jun 23
- Support the creation of collaborative structures

Definition
Nov 22-Apr 23
- Validate opportunity
- Identify potential partnerships
- Early model formulation of a global collaboration platform

Mobilization
Apr 23-Jan 24
- Develop a viable structure for a global collaboration platform

Supply-demand imbalance risk matrix

Ecosystem risk assessment

Political Economic Social Technological Environmental

Highest likelihood and impact risks

Secondary risk (cannot be directly addressed in the value chain)

Impact[1]

Extremely high

High

Medium

Low

Catastrophic climate events

Delay of the energy transition

Lack of political will for the energy transition

Conflict over resources

Job losses in case of materials shortage

Reputational damage for energy transition

Higher environmental pressure on ecosystems and waste generation

ESG targets becoming unattainable

Higher demand for resources from increased mining

Increasing resource nationalism

Backlash in adopting new technologies

Reduced responsible mining

Cascading renewable technology shortages

Increasing trade fragmentation

Market volatility and uncertainty

Lacking access to capital to address the imbalance

Supply chain fragmentation

Increase in artisanal and illegal mining

Rising new technology prices

Resources used for climate change adaptation instead of mitigation

Low incentives for new mining projects

Setbacks in socioeconomic development in producing countries forced to leapfrog traditional for higher cost technologies

Regulatory race to the bottom as investment flows to countries with lower ESG standards

Stockpiling of critical minerals

Reduced access to energy and transport services

Geopolitical risks disrupting materials value chains

Lower acceptance of mining projects

Pressures in substitute material supply chains

Uncoordinated land use

Increased workforce pressure for productivity over wellbeing

Low Medium High Extremely high

Likelihood[2]

1: Impact on the ecosystem: 'Low' represents minor impact and 'Extremely high' represents catastrophic impact on human lives, societies, and the planet
2: Likelihood to happen: 'Low' represents a risk that is not likely to happen' and 'Extremely high' a risk that is very likely to occur

Source: Risk identification based on insights from Risk characterization workshop 'Securing Minerals for the Energy Transition' and McKinsey analysis; Assessment structure from WEF Global Risks Report 2017.
The risks identified in the workshop are renamed and placed in the matrix based on the assessment.

WORLD ECONOMIC FORUM

03

What’s next?

A Global Collaboration Approach

There are many ‘go to places’, what if we try to have **just one**?

- **Call to action**: engaging the Public and Private sectors and Civil Society
- Joint efforts: different actors provide different capabilities and expertise
- A sustained **Global Collaboration Platform** to secure the critical minerals for the Energy Transition

WORLD ECONOMIC FORUM

Thank you

The World Economic Forum is the International Organization for Public-Private Cooperation.

Our mission is to improve the state of the world. Our purpose is to bring together stakeholders from all sectors of society. We provide a platform for the world's 1,000 leading companies to shape the future.

Contact us: wef.ch/engage


WORLD
ECONOMIC
FORUM

Working Meeting – Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

14.00-16.00 - ITEM 3: TEAM OF SPECIALISTS WORKSHOP - PART II

SECTOR-FOCUSED DISCUSSION #1 (35 minutes)

Critical raw materials value chains

Lead discussant: World Economic Forum, Luciana Gutmann, Project Fellow, Securing Critical Minerals for the Energy Transition

1. When it comes to supply data monitoring and sharing, do you believe that the private sector should be willing to share production and trade data, apart from the traditional data that is disclosed in sustainability reports? If not, why?

2. In what ways can public and private sectors collaborate to build a stronger and reliable data monitoring system? Do you see a gap for collaboration in this space? What might be immediate benefits, and perhaps on the flip side what might pose as a drawback?

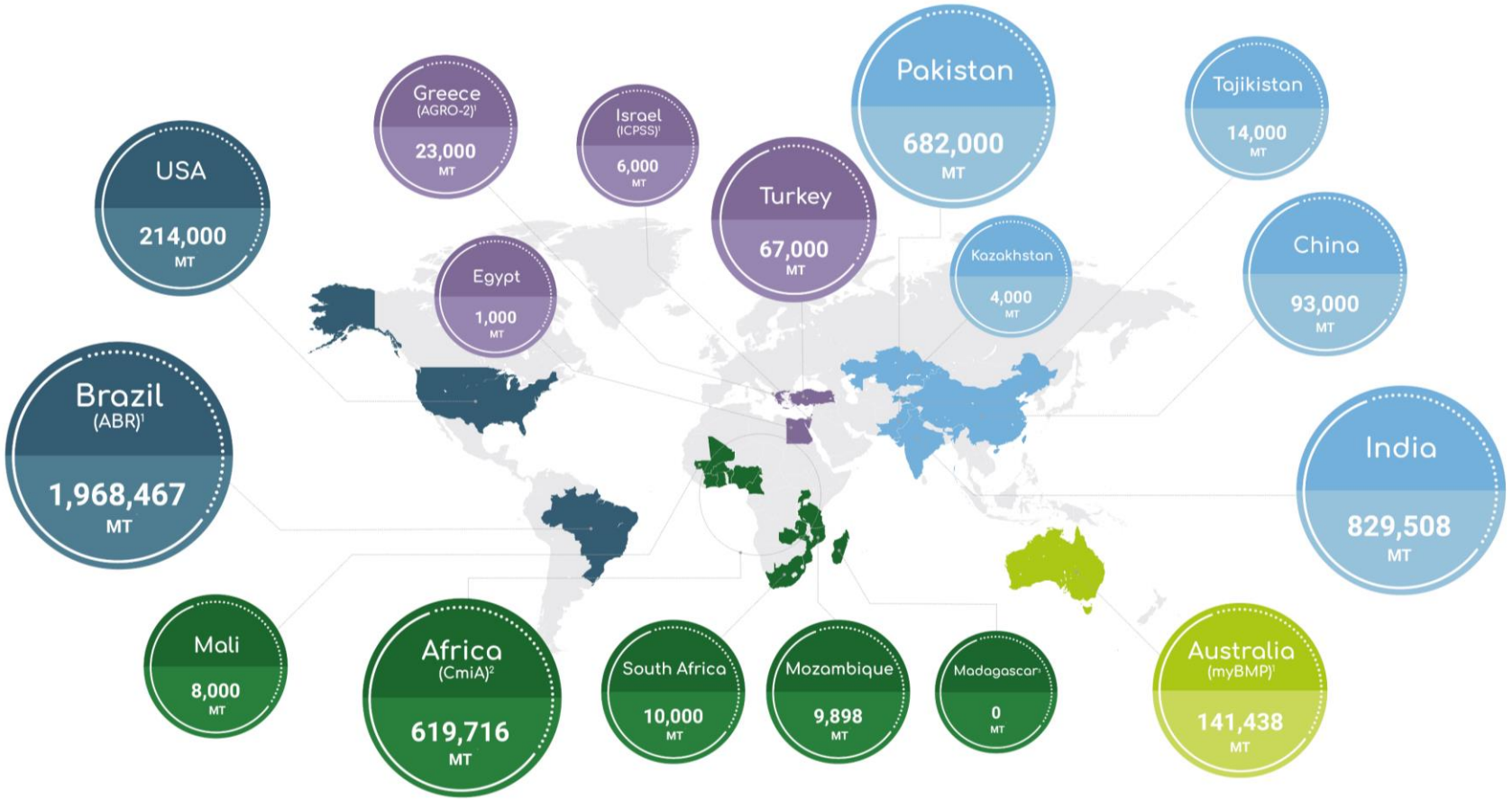
3. Considering the most recent regulations which have surfaced in the supply of critical minerals that is intended to enable the energy transition, how should we plan to address the issue of geographical production and processing?

4. Going further, how should we incorporate and maybe even prioritise these regions in the dialogue while ensuring leverage in global supply chains?

Volume of Better Cotton Grown

2020-21 Cotton Season

Total Better Cotton Produced **4.7 MILLION METRIC TONNES**



[1] Better Cotton recognised equivalent standards.
[2] The CmiA countries in the 2020-21 cotton season included: Benin, Burkina Faso, Cameroon, Chad, Cote d'Ivoire, Ghana, Mozambique (farmers in Mozambique who are both CmiA and Better Cotton licensed are only counted once), Nigeria, Tanzania, Uganda, Zambia.
[3] Madagascar's only Producer Unit (group of farmers) did not earn a Better Cotton license in the 2020-21 season and therefore the figure for Better Cotton production is zero
Please note that the production figure for Pakistan is an estimate – this is due to Covid-19-related verification challenges and some data quality issues. The figure has been estimated based on previous season production volumes and volumes sourced.

Changing stakeholder needs

The growing demand for supply chain visibility

Regulatory pressure

- US and EU trade and customs legislation requires raw materials origin information.
- EU due diligence legislation places responsibility for sustainable sourcing across the entire supply chain on importers.
- EU Green Claims requires companies to substantiate environmental claims.

Investor and consumer demand

- Consumers want to know where their products have come from and that they were ethically sourced.
- Investors want to de-risk their supply chains.
- Companies are being measured on performance against impact targets.

The need for inclusive supply chains

- Need to ensure producers and SMEs can continue to access markets.
- Digital and regulatory shift could exclude small holders and SMEs if not managed properly.

At present, the market is not set-up to fulfil these requirements

What do we mean by Traceability?

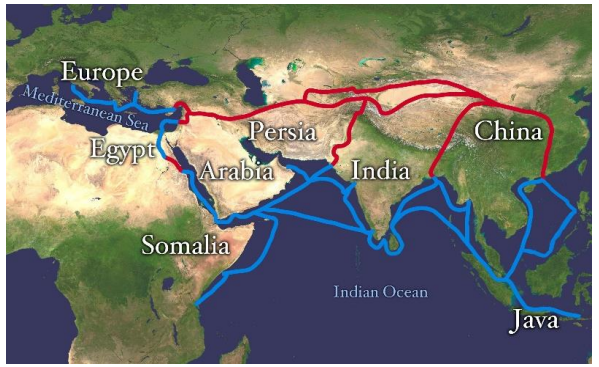
Increased demand for supply chain visibility: growing expectation for companies to identify, prevent, mitigate, and account for impacts across the value chain.

Pressure is coming from regulators, investors and consumers. To ensure Better Cotton farmers can continue to access markets, we will need to provide a level of traceability.

For cotton, this means knowing:

Origin information

Route to market*



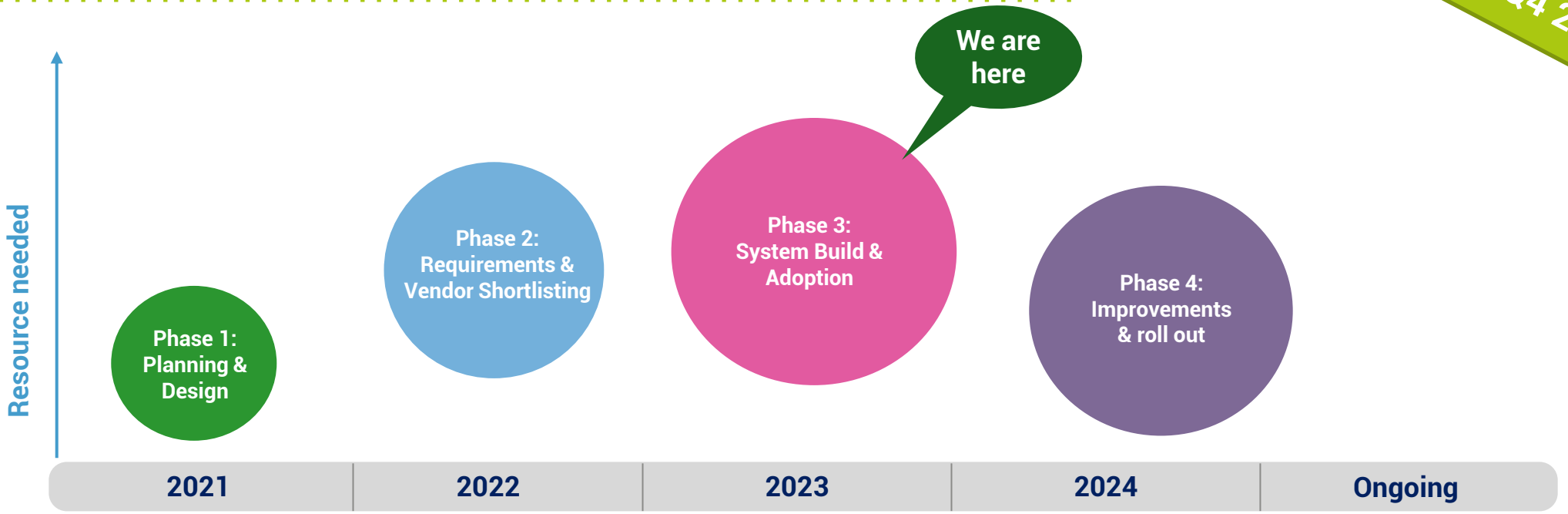
***Country of origin**

Impact**

****Long-term goal, not until 2030**

Traceability Development Timeline

LAUNCH = Q4 2023



- Supplier feasibility assessment
- Preliminary requirements
- Programme planning
- Fundraising

- Chain of Custody revision
- Data standardisation
- Detailed requirements gathering
- Solution procurement

- System build
- Training and capacity building
- Launch MVP
- Select scaled vendor

- Continued roll out
- Launch scaled solution
- System enhancements

better cotton™

Working Meeting – Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

14.30-16.00 - ITEM 3: TEAM OF SPECIALISTS WORKSHOP - PART II

SECTOR-FOCUSED DISCUSSION #2 (35 minutes)

Textile and leather value chains

Lead discussant: Better Cotton, Kendra Pasztor, Senior Manager - Monitoring, Evaluation, and Learning

1. In your experience, what are the most promising (or proven) examples of functional ESG traceability in the textile and leather sector? Particularly any that are inclusive of small-scale raw material producers and SMEs downstream in the value chain? How can they be scaled up?

2. The regulatory landscape in Europe and elsewhere is evolving quickly with regards to circularity, regulation of green claims, and corporate due diligence for this sector. Do you believe there is coherence across policy tools? If not, how can this be improved? What are the risks if policies are not mutually reinforcing?

3. Incentives – both financial and non-financial – are a critical requirement to make ESG traceability business as usual. What kind of incentives do you recommend we try in the textiles and leather sector? What has worked or not worked?

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

14.00-16.00

ITEM 3: TEAM OF SPECIALISTS WORKSHOP - PART II

SECTOR-FOCUSED DISCUSSION #3 (35 minutes)

Agri-food value chains

Lead discussant: Charles Arden-Clarke, former Head One Planet Network secretariat of UNEP

1. What are the key environmental and social objectives to be attained (and/or negative impacts to be reduced) in this sector along the full life cycle from primary production to consumption?

2. In your view/experience how has traceability along the value chain served to reinforce efforts to attain the key environmental, social and governance objectives in this sector, and what are key traceability tools which have enabled this reinforcement?

3. What role is there for government research, investment and policy making and implementation to reinforce voluntary standards, labelling and certification so as to increase the market share of food which reinforces ESG in this sector?

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

16.30-16.45

BREAK 

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

16.45-17.30
ITEM 4: TEAM OF SPECIALISTS WORKSHOP - PART III

Moderator: Vice Chair of the ToS, Nathalie Bernasconi, Executive Director, IISD Europe; Senior Director, Economic Law & Policy

Guiding questions - Future areas of work and fundraising:

- What are our strategic priorities for this next phase of work, particularly in relation to the development of the ESG monitoring and reporting protocol/guidelines?

In this connection:

- Considering the elements shared and discussed today, what are the building blocks of such document?
- Do you have the necessary support and resources, including type of expertise or stakeholders that we need to have involved in this work?

Working Meeting - Team of Specialists on ESG Traceability of Sustainable Value Chains in the Circular Economy

17.30

CLOSING

Next Session of the ToS: 11 October 2023, Geneva, Switzerland