Discussion digest

**Topic of Discussion: Traceability in the textiles value chain**

Traceability in the textile value chain refers to the ability to trace a product's lifecycle from beginning to end (e.g., from raw material to the consumer level). Traceability is an important concept when considering the source of chemicals and the potential impact these chemicals may have on the environment and people along their journey through the value chain. Achieving full traceability is another step toward ensuring sound chemicals management which is often not an easy task given the complexity of the value chain and the number of stakeholders involved at each step.

To view the PowerPoint presentation from this discussion, click [here](#).

**ABOUT THE PRESENTER**

Ahmad Ansari is currently working as one of the ZDHC’s Partnerships Director. His role as such is to advance ZDHC’s global stakeholder engagement and business development strategies via new partnerships, driving the common goals of sustainable chemistry in the textile, garment, and footwear industries.

In his previous career, Ahmad has worked for globally known professional service organizations (European Business Manager (BDM) at SGS; Senior Business Manager at KPMG for sustainability & supply chain solutions). Educationally, Ahmad has achieved a Doctorate in Environmental Geochemistry from Erlangen-Nuremberg University in Germany.

Ahmad has 19 years of experience within corporate responsibility (environment, social and supply chain) covering 75 countries within Europe, Asia, and America. Through his professional career, he has been supporting global MNCs to understand their impact on the environment and society, to assess and mitigate risk and to implement business-orientated strategies, actions of engagement and business performance. His professional expertise is focusing on sustainability and related business operation such as corporate responsibility strategies, environmental & social compliance performance measurement & impact, product environmental assessment, supply chain risk assessment & monitoring, business development, and stakeholder engagement.

**2021 DISCUSSION 4 ATTENDANCE BREAKDOWN**

**TOTAL DISCUSSION 4 ATTENDEES: 25**
- Female – 13
- Male – 12
For the last 10 to 15 years, the textile industry has been working on reducing the harmful chemicals at the end of the product and not from the whole supply chain. The ZDHC as a global community together with the chemical industry worked on a mission to implement a sustainable chemical management system in the textile, garment, and footwear sector to support and implement this system in the sector by bringing innovation to three target groups: consumer, workers, and environment. A change of mindset was needed from RSL (Restricted Substance List) to MSRL (Manufacturing Restricted Substances List) to improve traceability from the prime source and to provide a solution to eliminate the harmful chemicals.

Participants had various experiences with the textile industry in their countries; those from Iran, Hong Kong, and Germany stated that there have been attempts at implementing eco-labels and green labels promising less hazardous substances, as well as the establishment of an MRSL. Hong Kong uses a smart software for textile production known as Radio Frequency Identification (RFID) which has the capability to link to accounting software and ensure traceability. However, it is difficult to state the overall overview of the country with regards to traceability in textile industry.

Participants from Armenia, Germany, Hong Kong, and Nepal stated that a system such as the one established and used by the ZDHC has not been established in their countries. Germany stated that there was a lot of business-to-business (B2B) information passed through the supply chain about regulations on traceability and that attempts have been made to ensure traceability but not at a country level. This system needs to consider the state of the current textile industry including the importing of textiles, fast fashion, lack of knowledge from the consumers and regulation implementation. Participants from Germany and Iran agreed that traceability helps the invisible hand of the market and will give consumers the choice to buy clean products. Traceability should be applied in the sense of system thinking, then the value chain can be sustained, and holistic sustainable chemicals management can be achieved.

Looking ahead, the ZDHC would like to build a global harmonized standard and guideline that can be adopted within the textile community and collaborate with other stakeholders to accelerate the implementation as well as bring a positive impact. The ZHIC can support the industry at a country level and make a significant impact.
ANNEX

DETAILED SUMMARY OF DISCUSSION 4:
The discussion was structured around three questions. The key discussion inputs from participants are presented under each question:

**Question 1.** What experience do you have with traceability in the textiles industry in your country, if any? If there is currently no traceability in the textile industry, what do you think your country needs to implement it?

Summary of comments from different countries and sectors, although not necessarily representative:

<table>
<thead>
<tr>
<th>Country</th>
<th>Participant’s responses</th>
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<tr>
<td>GERMANY</td>
<td>- In Germany, it is difficult to have an overview of the overall textile industry, but there are lots of national/EU-wide textile labels (eco-labels, green labels) promising no/less hazardous substances or good/better working conditions.</td>
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| HONG KONG    | - In Hong Kong, we’ve created a mapping of ALL chemical substances and relevant limits in ECO-Labels, proprietary standards, and at different stages: Manufacturing Restricted Substances List (MRSL) for Input, Wastewater (WW) for waste-output.  
- It’s being reviewed by GIZ/textile partnership to be open-sourced and currently being vetted and reviewed for the best mechanism to achieve open source  
- Link to document preview: [https://drive.google.com/file/d/1OWQv7VtKMFmqEnAf7pvx1t8T-thaiTm1/view?usp=sharing](https://drive.google.com/file/d/1OWQv7VtKMFmqEnAf7pvx1t8T-thaiTm1/view?usp=sharing) |
| IRAN         | - Smart software for textile production such as Radio Frequency Identification (RFID).  
- These tags carry electronically stored information and are attached to objects/textiles to identify and track them automatically. A link to an accounting software to ensure traceability. The RFID is usually OEKO-TEX 100 certified (independent testing and certification system for textile raw materials, intermediate and end products at all stages of production guaranteeing to consumers the absence of harmful substances at potentially dangerous levels to the human body) which helps to trace links in production Fashion. |
Throughout the discussion, informal polls were conducted to help encourage discussion among the participants. They do not constitute any representative data.

Poll 1 Results (N=13)

What does chemical traceability mean to you? Please state your country/organisation in your response?

Residues in food and environment (n=2)
- **IRAN**: "Means a lot, pesticide/chemicals residues in food, environment, etc., as a toxicologist I have always been following the pesticides and chemicals "METABOLITES" usually millions and that is very difficult to follow all of them, impossible."
- **IRAN**: "Fate of chemicals/pesticides in the environment, etc."

Follow chemical from origin to end use (n=5)
- **South Africa**: "Traceability means being able to follow a chemical in a substance from its point of origin to its end use and at each step being able to access the necessary health and safety and usage information."
- "To know the supply chain from raw to finished products"
- **Germany**: "It is the most important factor in the whole value chain. ISC3"
- **Nigeria**: "Chemical traceability in a simple term means the ability to monitor the chemicals in products by following a cradle to grave principle of product regulation/management."
- **TUV Rheinland**: "Information about chemicals composition, geographical origin, and how processed during production."

Protection of consumers (n=2)
- **Armenia**: "Chemical traceability means better protection of consumers, informed choices, healthier industry practices - AWHHE"
- "That product information (chemical information) is accessible to consumers."

Identification of hazardous chemicals in products (n=4)
- "Chemical traceability means to identify the materials used for the textiles, at least hazardous compounds (by RFID tags, washing-resistant QR codes. The EU introduces a compulsory collection of used textiles, this means pressure on the identification."
- **South Africa**: "Being able to identify the hazardous (and other chemicals) in products; that is, having access to this information; particularly for consumers."
- **Germany, BUND**: "Each textile needs a document giving its fingerprint (Chemical content). Otherwise, recycling of fibres and textiles is not possible (Germany, BUND)."
- "What is the nexus between standards and traceability of the chemicals?"

Poll 3 Results (N=12)

Would a global framework for traceability in the textile industry be useful for your country?

Yes – 75%
No – 8%
**Question 2.** What kind of supply chain mapping and traceability system do you have in your country? If your country does not have any supply chain management, what kind of system do you think would work for traceability?

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| Armenia      | - In Armenia, no such system exists.  
- The textiles were developed in Soviet times, followed by a decline in production and now a rapid rise once again.  
- As it is growing, it is a good time for introducing new **patterns from the beginning**: actors at all levels of the textile supply chain need to work together to find solutions to technological challenges.  
- **Education is a key enabling factor** in this connection: are there any education opportunities globally through online tools and workshops? |
| Germany (NGO)| - Well, the **Zero Discharge of Hazardous Chemicals** (ZDHC) is quite known for what it stands for, but I suppose most consumers do not know about the whole process.  
- Besides several eco-labels which were already mentioned today, there is a lot of Business-to-business (B2B) information in the supply chain. This is partially due to regulations (e.g., The Registration, Evaluation, Authorisation, and Restriction of Chemicals (REACH)) and partially comes with ISO 14.000 declarations, etc.  
- **Information gaps** are mostly with very cheap textiles. i.e., imported "fast fashion".  
- Is there any collaboration of ZDHC with Partners from Tunisia? |
| Hong Kong (Private sector) | - No system exists at the country level.  
- A stretch of the imagination as a consumer would be the ability to scan a barcode on garment/footwear and be able to see a code/rating 1-5 (1=no potentially harmful chemicals used; 5=no-no), and an indicator showcasing labor/welfare that the environment was not harmed and then a have supply chain management system to fulfil this.  
- Is there a possibility that Manufacturing Restricted Substance List (MRSL) guidelines go through some sort of process to convert it into a standard? |
| Nepal (NGO)  | - The global system did not work in developing and low-income countries.  
- It should be compatible with the local circumstances and infrastructure development level.  
- How does chemical traceability work with an online system?  
- How does chemical traceability work with the Online Marketing business of products? which country is responsible?  
- When talking about the individual facility level, it must be decided if it is mandatory or voluntary.  
- Individual facilities intend to avoid any kind of traceability testing.  
- Infrastructure such as laboratories at the individual level matters for the success of this model which is normally lacking.  
- Chemicals used in the labelling of packaging materials printing must also be accounted for. |

**Poll 4 Results (N=12)**

Are you familiar with the ZDHC supply chain management and traceability system?  
Yes – 25%  
No – 58%

**Poll 5 Results (N=11)**

Are you aware of any other supply chain management initiatives and traceability systems in textiles, or any other sector? Please state your country

Yes - 36%  
No – 64%  
Countries that said “yes”:  
Germany.  
Armenia  
Countries that said “no”:  
South Africa  
Myanmar  
Colombia  
Iran
**Question 3.** How do you think traceability will help to achieve holistic sustainable chemicals management in your country?

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| GERMANY (NGO) | - Traceability helps the invisible hand of the market.  
- Consumers could prefer "cleaner" products and push their further development (if the price-differences are not too big, of course).  
- It works probably only in the sense of "system thinking" (only in that case the whole value chain can be called sustainable).  
- So, sustainable chemicals management is necessary. |
| IRAN (Academia) | - Although new information for me, it seems a very important issue for chemicals management.                                                                                                                             |

**Poll 6 Results (N=5)**

**What kind of tools do you think are needed to implement and improve traceability in your country?**

**More information, registration, and monitoring systems (n=2)**
- **South Africa**: "More information from importers; databases that are accessible to the public; training customs officials on aspects of traceability."
- **South Africa**: “Better registration and monitoring systems.”

**Adapt global tools (n=3)**
- **Armenia**: "Good approach would be to try and adapt the existing global tools including online tools, software for tracking, mapping; would be also good to have a kind of platform where stakeholders across the supply chain could interact – Armenia."
- "Suggestion- an international, official app, made by UNEP for example that shows the ingredients of the product and the substances used in the process. companies get a label for cooperating with the app."
- "Traceability is a challenging topic in Colombia because the market is very atomized and the end of the chain are looking mainly for prices and in this approach, no environmental issues drive the market."

**Poll 7 Results (N=2)**

**What is your opinion on sustainable chemicals management leading to overall environmental sustainability performance in the supply chain?**

- "A difficult question is given that no country has yet achieved true sustainable chemicals management and so we are unable to assess the wider impact."
- "It works only in the sense of "system thinking" (only in that case the whole value chain can be called sustainable). So sustainable chemicals management is necessary. Sustainability should be understood broadly (incl labour)."
Useful resources:

- Global Chemicals Outlook Tool I

- WHO (2016): Preventing disease through healthy environments
  https://www.who.int/quantifying_ehimpacts/publications/preventing-disease/en/

  https://undocs.org/A/HRC/33/41

- EU Database on Substances of Concern in Products
  https://echa.europa.eu/scip

CiP CoP: The Secretariat of the Strategic Approach to International Chemicals Management (SAICM) and the Environmental Health Division at the University of Cape Town (UCT) created this Community of Practice (CoP) to foster online discussions and address key issues on Chemicals in Products (CiP) among stakeholders from governments, international organizations, industry, academia, and civil society.

This CoP is contributing to the SAICM/GEF project on Emerging Chemicals Policy Issues Knowledge Management Component. This activity is supported by the Global Environment Facility (GEF) project ID: 9771 on *Global Best Practices on Emerging Chemical Policy Issues of Concern under the Strategic Approach to International Chemicals Management (SAICM)*.

If you have any questions or require clarification on this initiative, please contact the SAICM Secretariat at saicm.chemicals@un.org or UCT at uctcops@outlook.com.

Join the CiPs CoP at: https://saicmknowledge.org/community

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