

EPPCN

ENVIRONMENT WG

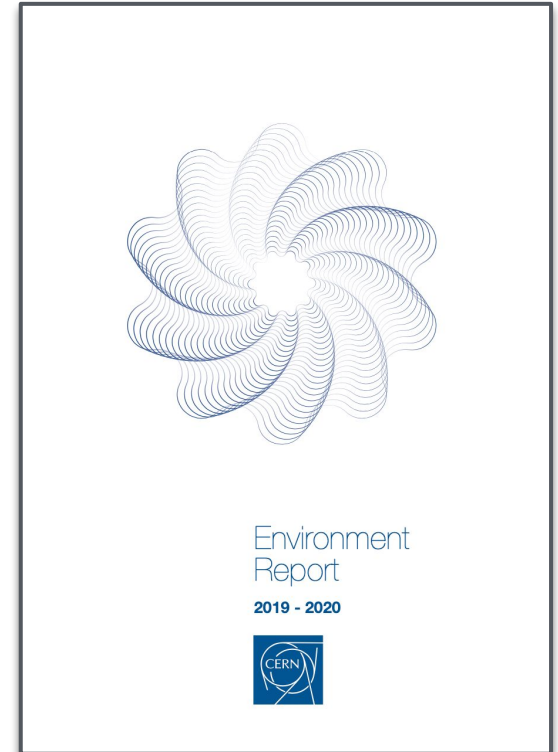
REPORT

Catarina Espírito Santo
for the EPPCN-WG-ENV

EPPCN meeting
CERN, 16 Nov 2023

1. The EPPCN-WG-ENV: context, goal & plan
2. Main activities
 - Survey
 - Campaign #1: World Environment Day
 - Campaign #2: CERN Environmental Report 2021-2022
3. Status

- Minimising the environmental impact and contributing to combat global warming are increasingly a concern, and scientific research is no exception
- The size and nature of PP projects and facilities make such concerns even more relevant
- CERN aspires to be a role model for environmentally responsible research
- It is crucial that R&D&I communities in the MS keep pace with CERN
 - clear communication about the environmental impacts of research
 - Integrate sustainability in present and future infrastructures
 - seek to contribute with innovation to solutions for the benefit of society at large



- Purpose: enhance the communication on environment-related issues in CERN MS, to both internal and external audiences
 - Created in the November 2022 EPPCN meeting
 - Inherits from the former EPPSU Comms Environment WG
- several members — direct link to CERN HSE — information & documents

Catarina Espírito Santo (PT)

Perrine Royole-Degieux (FR)

Angela Benelli (CH)

Nuria Falco (ES)

Vanessa Mexner (NL)

Johanna Pellinen (FI)

Barbara Vízkelety (HU)

Thomas Zoufal (DE)

Anna Cook (CERN HSE)

Daniela António (CERN ECO-SoMe)



Plan (I)

WHO

EPPCN members in collaboration with CERN's ECO and HSE

GOALS

- Help establish a culture of environmental awareness and engagement within the PP communities in the MS
- Raise awareness in society about the efforts of the PP community

MESSAGES

Thrive to reduce environmental impact — Transparent communication — Thrive to develop and transfer technologies for the benefit of society

PRIORITY AUDIENCES

- Internal: scientific PP community, CERN-related communities in MS
- External: decision makers, funding agencies, environmental associations, media

Essential for gaining support to PP research and future projects

Change in culture within the PP community and shift in perception in society

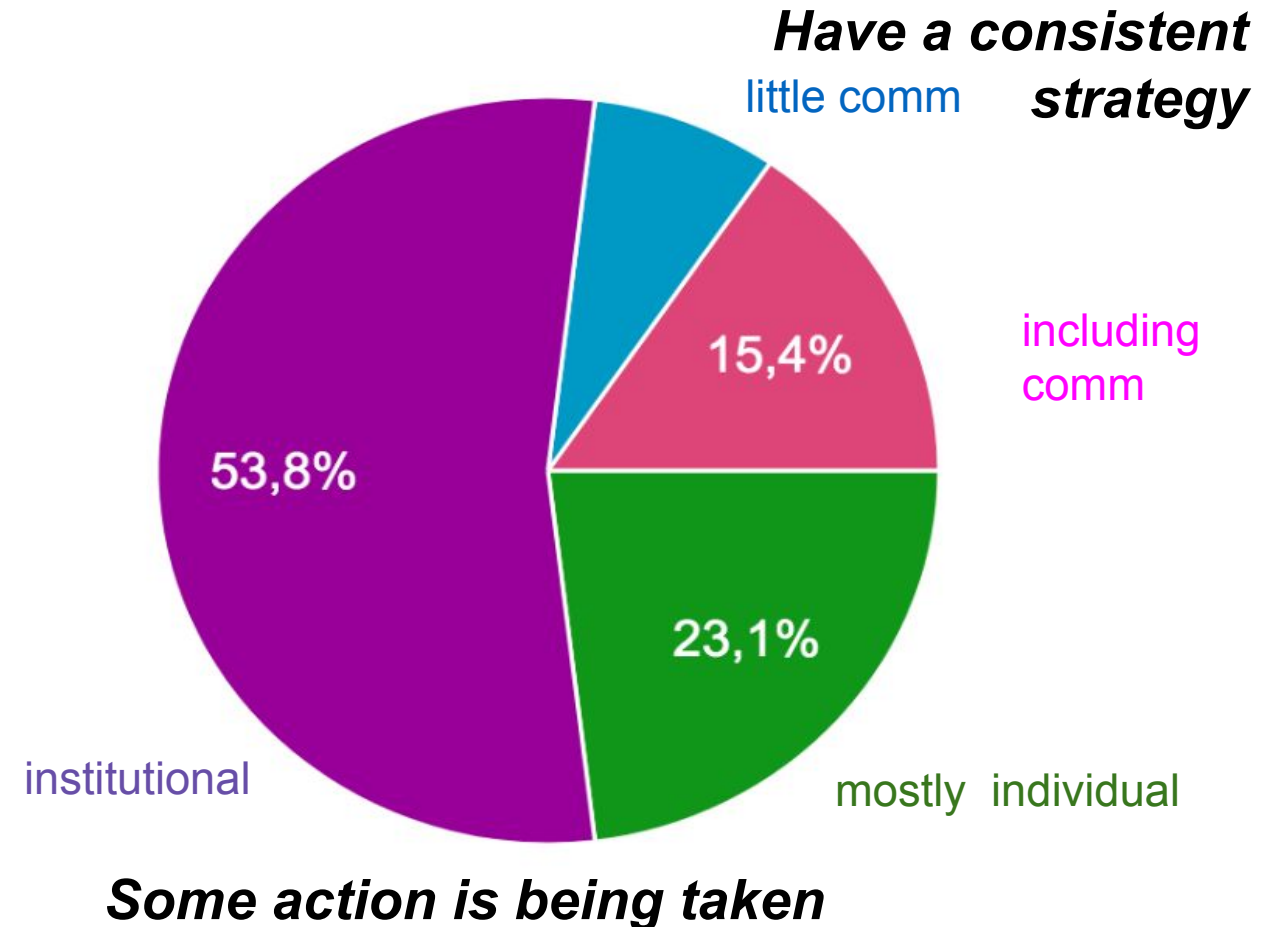
1. Survey: collect info from MS
 - Level of awareness
 - Ongoing and planned actions and projects
2. Analysis and content development
 - MS status update
 - Collect stories, examples, facts & figures
3. Two Communication campaigns along the year in selected dates/hooks
 - World Environment Day, June 5th
 - Publication of CERN's Environment Report 2021-2022
4. Contribute to EPPCN Council report(s)

Survey

Participation:
CERN + 12 countries

- CERN
- Norway
- Switzerland
- Germany
- Netherlands
- Sweden
- Finland
- Italy
- France
- Spain
- Portugal
- Hungary
- Israel

Attitude of the particle physics community towards environmentally responsible research



Survey

Actions considered in most countries

- 
- Selective waste collection
 - Avoid use of plastic/disposable materials
 - Printing policy
 - Energy saving guidelines
 - Travel policy
 - Lab carbon footprint

Main difficulties mentioned

- Community: lack of awareness, or action, or policies
- Perception of PP as a threat:
energy consumption, CO₂ emissions, pollution, suspicion of “greenwashing”

Survey

Actions considered in most countries

- 
- Selective waste collection
 - Avoid use of plastic/disposable materials
 - Printing policy
 - Energy saving guidelines
 - Travel policy
 - Lab carbon footprint

Main difficulties mentioned

- Community: lack of awareness, or action, or policies
- Perception of PP as a threat
energy consumption, CO₂ emissions, pollution, suspicion of “greenwashing”

Very different audiences and messages

PP community, scientific community at large
Funding agencies and policy makers, the public
(*media and influencers as vectors*)

Environmental impact of PP
Efforts to minimise the environmental impact of PP
Example of CERN and other key players in MS

Campaign #1

- Joint EPPCN social media week-long campaign 5-10 June
- Use material collected during the survey as basis
- Stick to stories directly related to the PP communities
- Week-long campaign: CERN + 5 countries (CH, DE, NL, FIN, SWE)
- Define a post for the social media [Did not know that...? + link]
- Work with local contacts on the web-based article(s)

In collaboration with the SoMe WG, CERN ECO and HSE



**WORLD
ENVIRONMENT
DAY**

50th Anniversary

social media

+

web-based articles

+

local (internal) events

Instagram

Página inicial

Pesquisa

Explorar

Reels

Mensagens

Notificações

Criar

Perfil

Live with CERN.

CERN

HUBS PLATFORM

CERN is committed to environmentally responsible research

cern Áudio original

cern Today we celebrate the 50th anniversary of @unitednations' #WorldEnvironmentDay. 🌍

#OnThisDay, CERN reflects on and commits to environmentally responsible research. Curious about the diverse ways in which CERN acts to minimise its impact on the #environment? Watch this video to learn more. 📺

For the rest of this week, join CERN and its partners as we celebrate our efforts and reiterate our commitment to continuing to do better. #EPPCNeenvironment

22 sem Ver tradução

👍 🗨️ 📌

Gostos: dunescience e 2136 outras pessoas

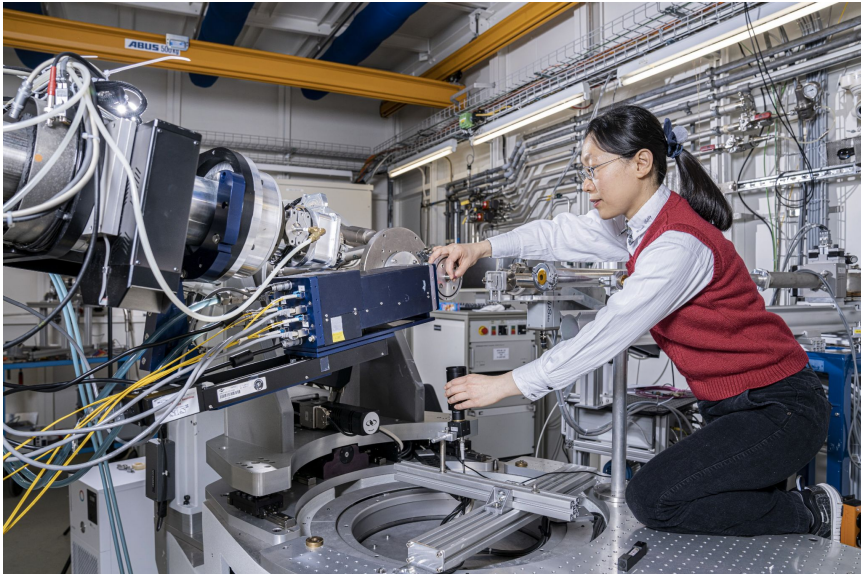
5/6

😊 Adiciona um comentário... Publicar

<https://videos.cern.ch/record/2297993>

DID YOU KNOW THAT...

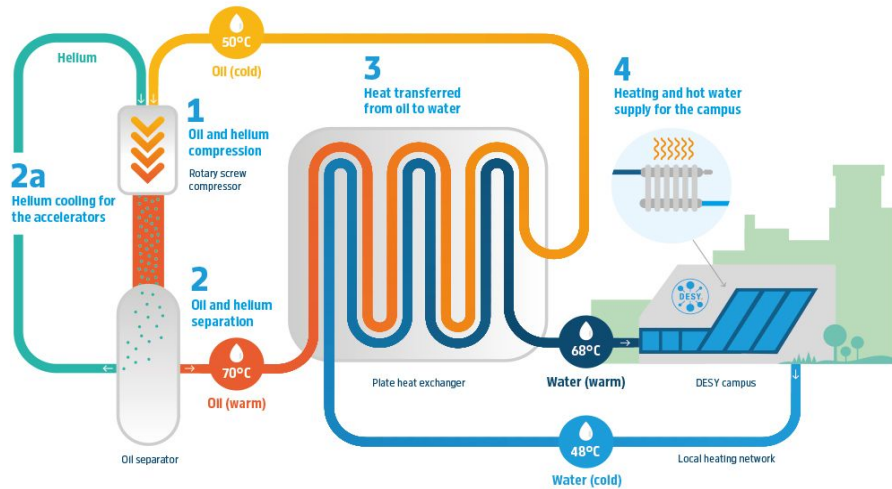
The Swiss Light Source SLS 2.0 project at the PSI will significantly improve the intensity of the synchrotron light at the experimental stations from 2025 onwards, while reducing energy consumption by 30%?



The PSI is researching novel, more efficient and sustainable energy technologies and also using them in its own facilities. Learn more in <https://psi.ch/en/media/energy-and-climate>

DID YOU KNOW THAT...

DESY already heats one third of its campus with waste heat from the accelerators, and this is just a starting point ?



Learn more about this project in [DESY's first sustainability report](#) or in the [DESY news](#).

https://nachhaltigkeit.desy.de/sustainability_report/index_eng.html

https://www.desy.de/news/news_search/index_eng.html?openDirectAnchor=2769&two_columns=0

DID YOU KNOW THAT...

NIKHEF's Roadmap for Sustainability aims at making the institute climate neutral by 2030?



Meet NIKHEF's Sustainability Ambassadors!

Learn about the 5 pillars in the Roadmap and the actions that have already been taken.

<https://nikhef.nl/en/focusblokken/nikhefs-ambition-climate-neutral-in-2030/>

DID YOU KNOW THAT...

Every summer about 20 master students from Finland address sustainability and other challenges in a Bootcamp at CERN?



Meet Summer 2022 participant Juniper Tyree and learn more about the #study concept and the “Sustainable City Contest”.

<https://www.helsinki.fi/en/news/sustainability-transformation/eurovision-inspired-sustainable-city-contest>

DID YOU KNOW THAT...

The use of scientific software and Machine Learning algorithms can have a significant environmental cost and green software development is an active field of research and innovation?



Projects studying this issue are arising in several research institutions.

Learn about the new project “Tackling the energetic cost of scientific software” in which Lund University researchers are involved.

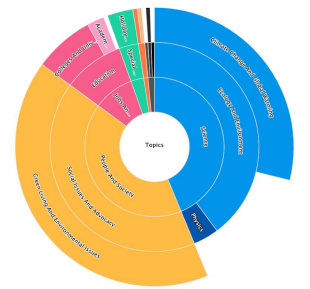
<https://www.fysik.lu.se/en/article/towards-green-software-tackling-energy-cost-scientific-software>

Overview

Total Mentions
100 ↑ 9900%
 Previous period

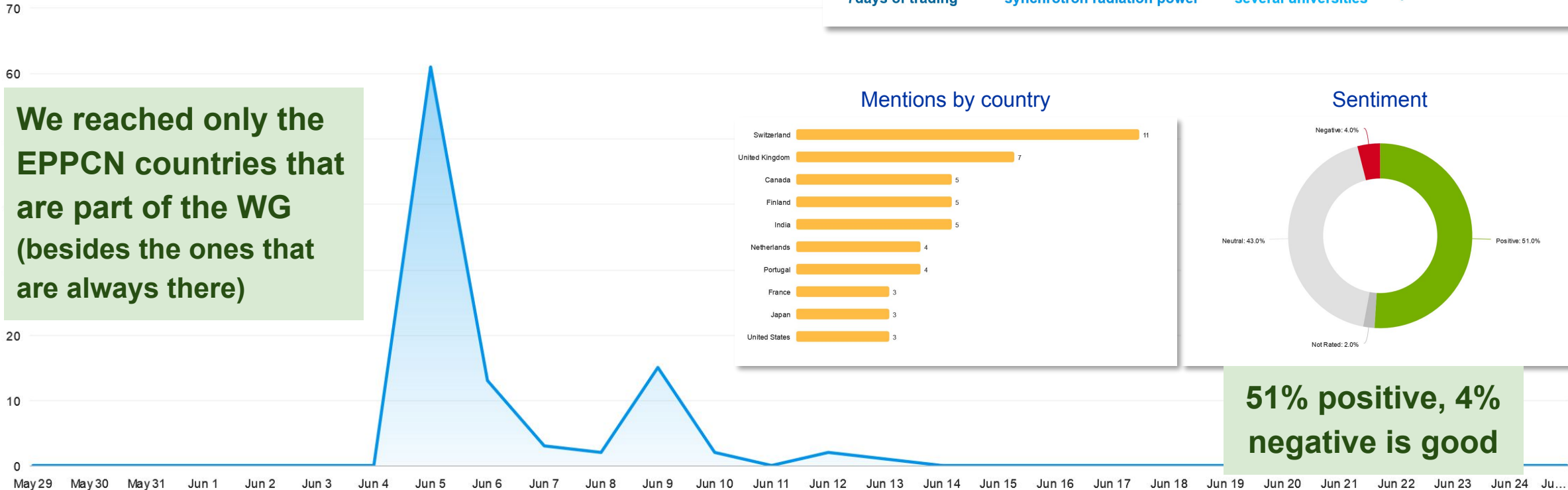
Daily Average
3 ↑ 9900%
 Previous date

Topic analysis

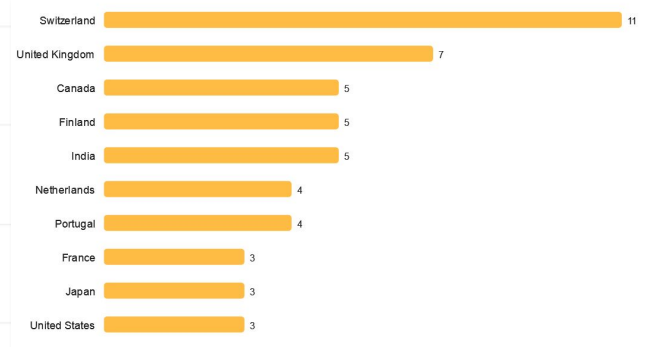


Environment came up as a subject in itself!

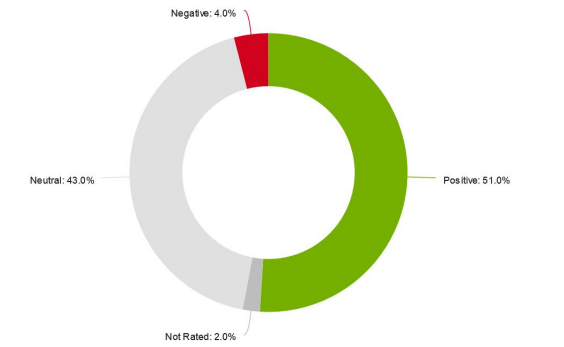
Word cloud



Mentions by country

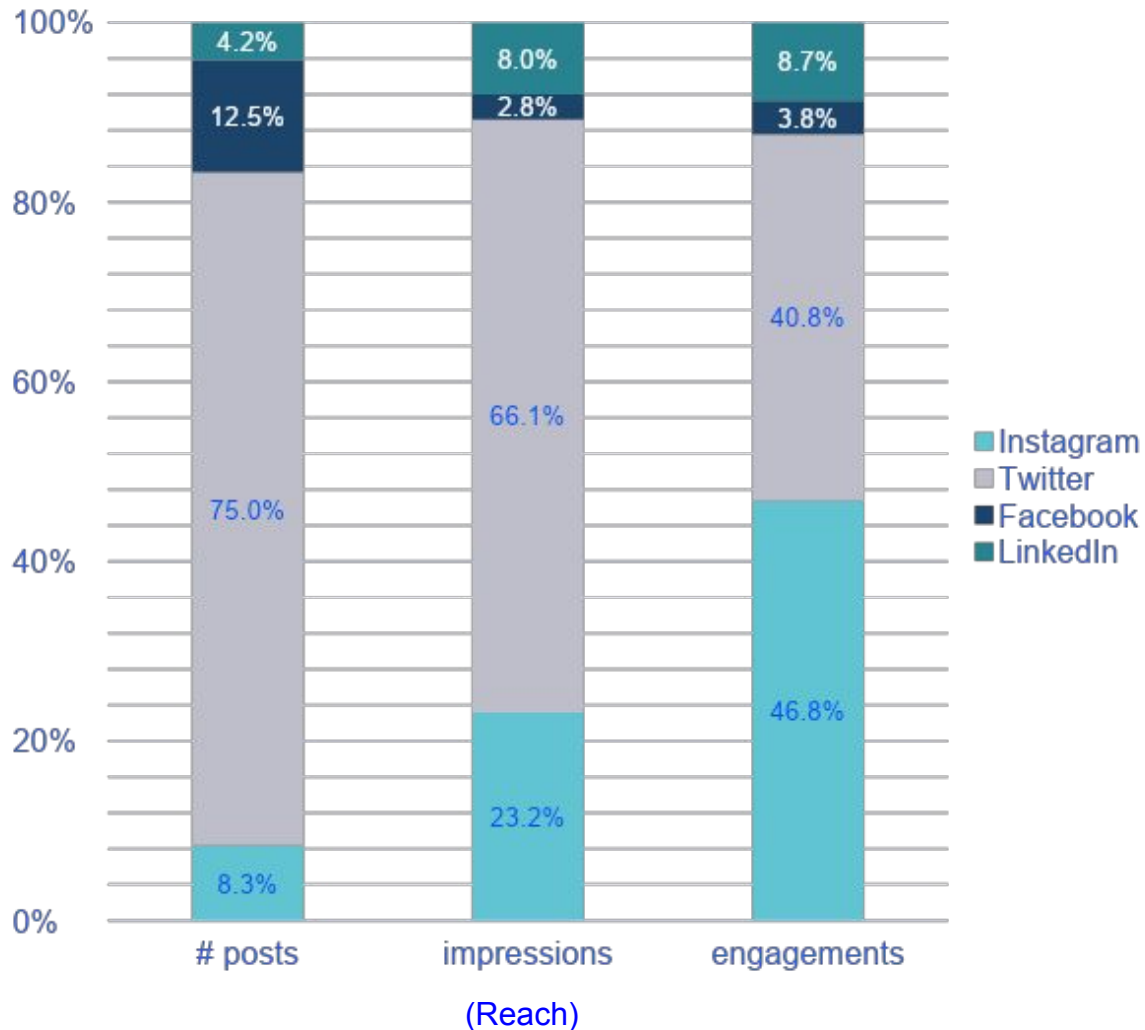


Sentiment



51% positive, 4% negative is good

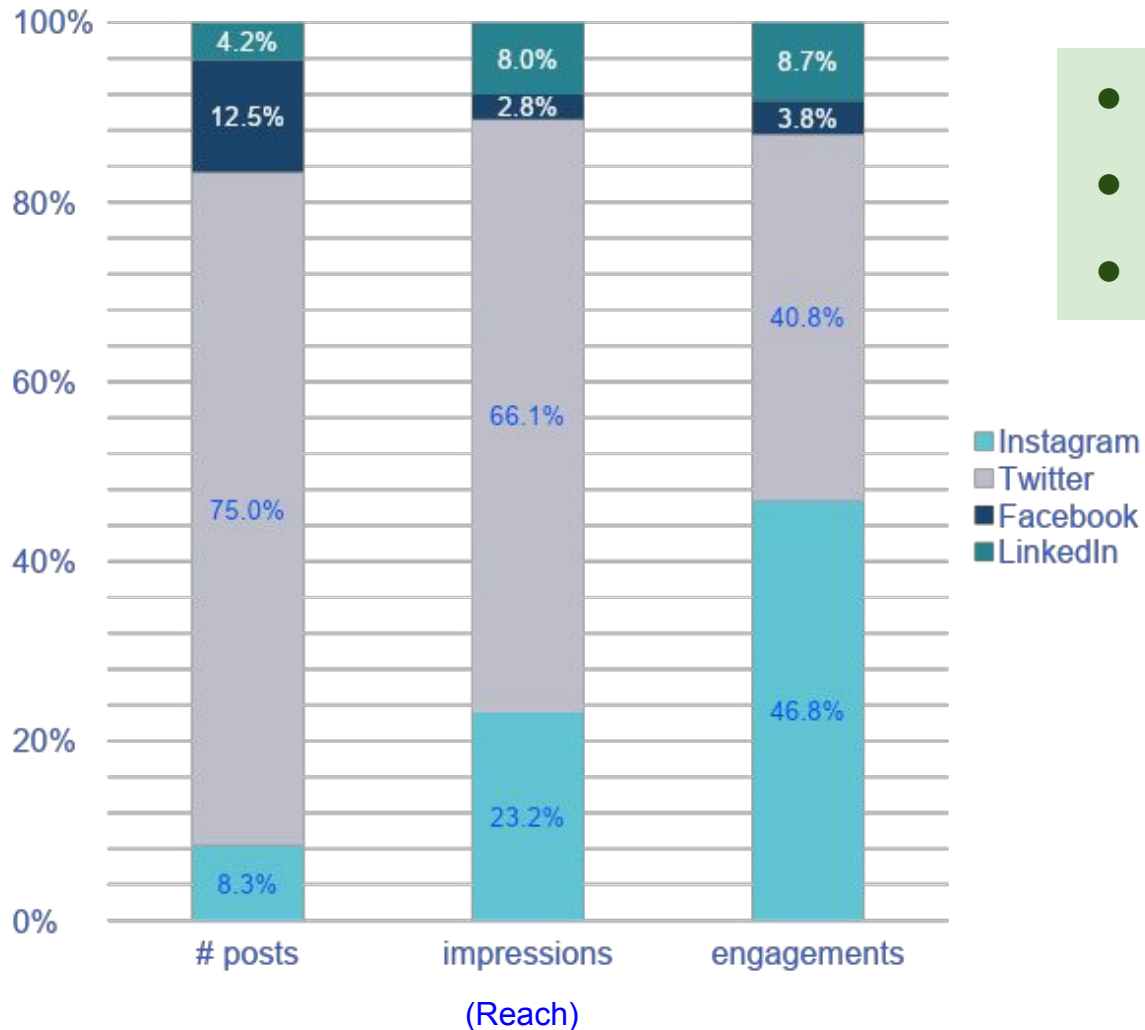
#EPPCNewenvironment – June 2023



Key numbers:

- 252.8K impressions (reach)
- 4772 engagements
- 82.2K video views
- Engagement rate: 1.89%

#EPPCNenvironment – June 2023



- Apart from the CERN video: campaign mainly on twitter
- Most posts were on twitter and facebook, but...
- Instagram and linkedin: more efficient!

Key numbers:

- 252.8K impressions (reach)
- 4772 engagements
- 82.2K video views
- Engagement rate: 1.89%

In total (5-6 posts)

→ **NEEDS TO INCREASE**

Engagement rate is OK (average)

What we learned

- Involve CERN SoMe WG and HSE also in the planning & development phases
- Make sure content is shareable by all teams
 - **Reach full EPPCN** → we need your help to understand how to improve
 - Possible issues: content about another country/ lab + publication language + ...?
- Make sharing easy (also across platforms)
 - Having the same style for every post was a good thing (common start & format)
 - Create pool of templates + material
 - Hashtags: (world)+campaign+country
(#WorldEnvironmentDay, #EPPCNEEnvironment, #PTatCERN)

Campaign #2

- December 4th 2023
Contribute to communicate the publication of CERN's third Environment Report (2021-2022)
- With ECO-SoMe and HSE
- As many EPPCN Countries (and platforms) as possible
 - Defined hashtags
 - Like + comment + share + add national/local angle

Survey

Conducted in January 2023; Responses from 12 countries

Campaign #1

Prepared, conducted, evaluated

Learning ground + pool of stories collected

Campaign #2

To be conducted in December 4th

Ideas

- Relaunch the survey in December 2023/January 2024 → Update info + More countries
- Prepare a web page with MS sustainability-related links/resources
- Keep joint EPPCN environment campaigns on specific hooks (once or twice per year)

Survey

Conducted in January 2023; Responses from 12 countries

Campaign #1

Prepared, conducted, evaluated

Learning ground + pool of stories collected

Campaign #2

To be conducted in December 4th

Ideas

- Relaunch the survey in December 2023/January 2024 → Update info + More countries
- Prepare a web page with MS sustainability-related links/resources
- Keep joint EPPCN environment campaigns on specific hooks (once or twice per year)

What next?

To be discussed in this meeting

Thank you

Backup slide

It's useful to look at some details numbers from the network posts

Organisation	Platform	Content	Link	Impressions	Engagements	Views	Shared ("EPPCN")
CERN	Twitter	Video	https://twitter.com/CERN/status/1665659616020054017	33024	826	6261	STFC, CPAN, CHIPP, NIKHEF, LIP, IN2P3, SMARTHEP
CH/CHIPP	Twitter	Article	https://twitter.com/CHIPP_news/status/1666022760647213056	23058	283		CERN, NIKHEF, LIP, PSI
DE/DESY	Twitter	Article	https://twitter.com/desynews/status/1666389749572009984	~ 28500			CERN, NIKHEF, CHIPP, LIP
NL/NIKHEF	Twitter	Article	https://twitter.com/_nikhef/status/1666743948872925184	23616	355		CERN, CHIPP, LIP, SMARTHEP
FIN/HIP	Twitter	Article	https://twitter.com/HIPhysics/status/1667107781470572544	23 800	57		CERN, CHIPP, LIP, NIKHEF, HEPNET, UHelsinki-F.Sciences
SWE (*)	Twitter	Article	https://twitter.com/lip_pt/status/1667513074775990275	910	30		(Posted by LIP) CHIPP, NIKHEF, SMARTHEP

(*) Not posted by Lund University. Posted on Saturday by LIP and shared by SMARTHEP ITN, CHIPP, NIKHEF