



SUSTAINABLE DIGITAL  
INFRASTRUCTURE ALLIANCE

# Letting European values & transparency shape the digital sector.

Keynote, ECP, 29th of September 2022



# How come we don't know the answer to these questions?

Total minutes of videos stored	?
Total minutes of videos streamed in the Netherlands	?
Environmental impact per stored video minute	?
Environmental impact per delivered video minute	?
Social impact per video minute	?
Added GDP by digital sector	?



Total amount of photos stored	?
Total amount of photos delivered to customers	?
Environmental impact per stored photo	?
Environmental impact per delivered photo	?
Amount of customers in the age group 14-18 years old	?
Added GDP by digital sector	?



IJmuiden	unit	201
Crude steel production	Mio ton	6.9
CO <sub>2</sub> emission (scope 1,2,3)	Mio ton	12.7
Fresh water consumption	M <sup>3</sup> /ton steel	4.4
Waste generated	kton	32
Waste disposed to landfill	Kton	5
Waste intensity	t/t	0.008
Waste re-used, recycled	Kton	25
Environmental complaints	No.	87



# And we also know little about the fundamental infrastructure

MWh of heat recovered at > 45C	?
MWh of electricity consumed during low renewable energy production	?
Hours of diesel generation operation and pollution per hour	?
Digital resources produced & waste generated	?
Water usage and environmental impact of it	?
Leased co-location space to NL tax contributing companies	?

# Yet, we allow all positive claims, even though have no information on the societal, economic & environmental downsides



Cloud Migrations Can Reduce CO2 Emissions by Nearly 60 Million Tons a Year, According to New Research from Accenture

The European Green Digital Coalition (EGDC) is an initiative of companies, supported by the European Commission and the European Parliament, based on the request of the EU Council, which aims to harness the enabling emission-reducing potential of digital solutions to all other sectors.

The Microsoft Cloud can save customers 93 percent and more in energy and carbon efficiency

May 17, 2018 | Microsoft News Center

Digital Transformation to contribute \$45 billion to Australia's GDP by 2021

Digital technology can have 'transformational' effect on achieving the UN Sustainable Development Goals

The green cloud: How cloud computing can help the public sector achieve energy efficiency targets

September 22, 2022

CREATOR ECONOMY

ECONOMIC IMPACT

**\$25B+**

YouTube's creative ecosystem contributed \$25B+ to the US GDP in 2021.

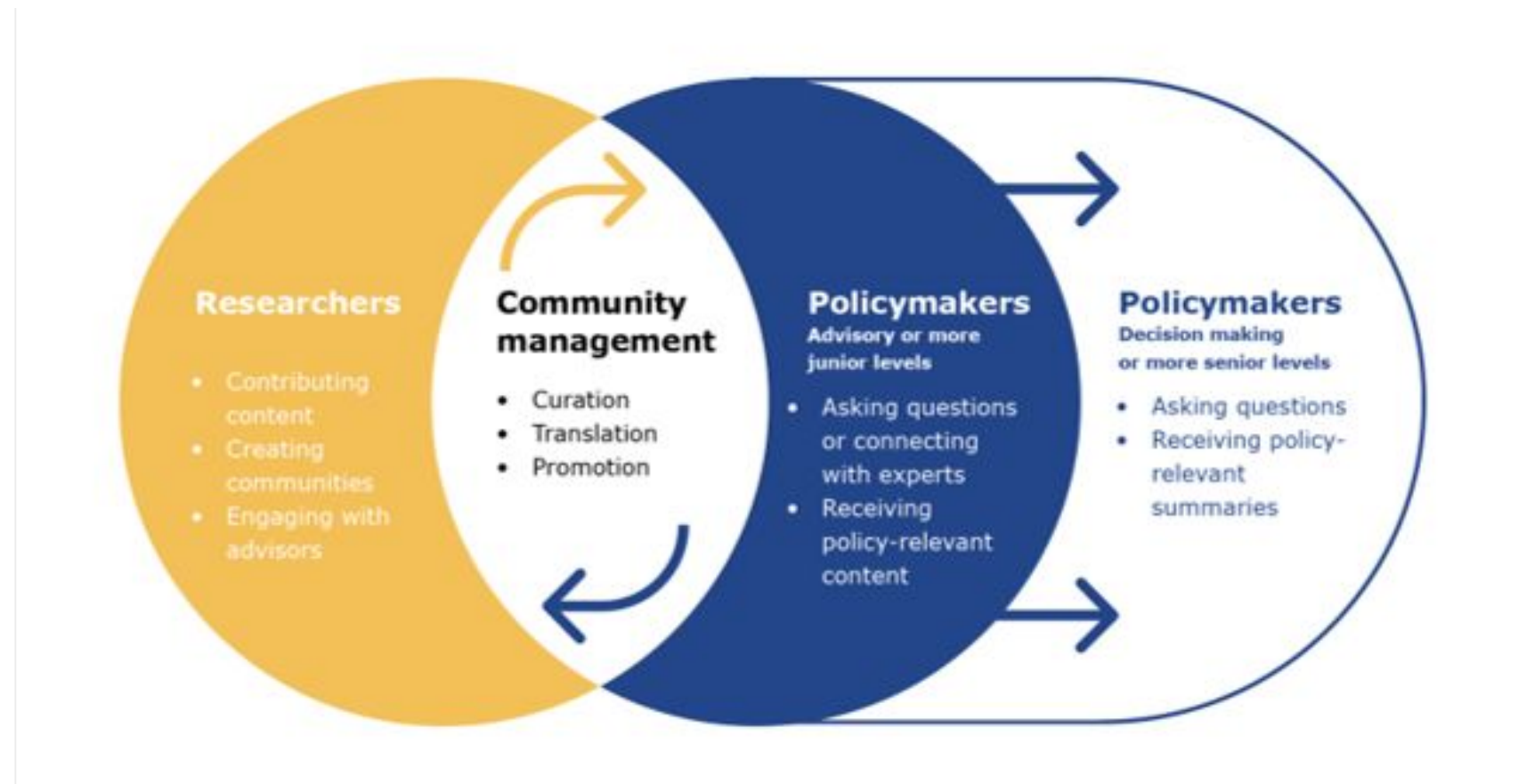
CREATOR ECONOMY

ECONOMIC IMPACT

**425K+**

In 2021, YouTube's creative ecosystem supported 425K+ Full Time Equivalent (FTE) jobs in the US.

# How can we design effective policy without facts about the impacts of the digital economy & digitalization?



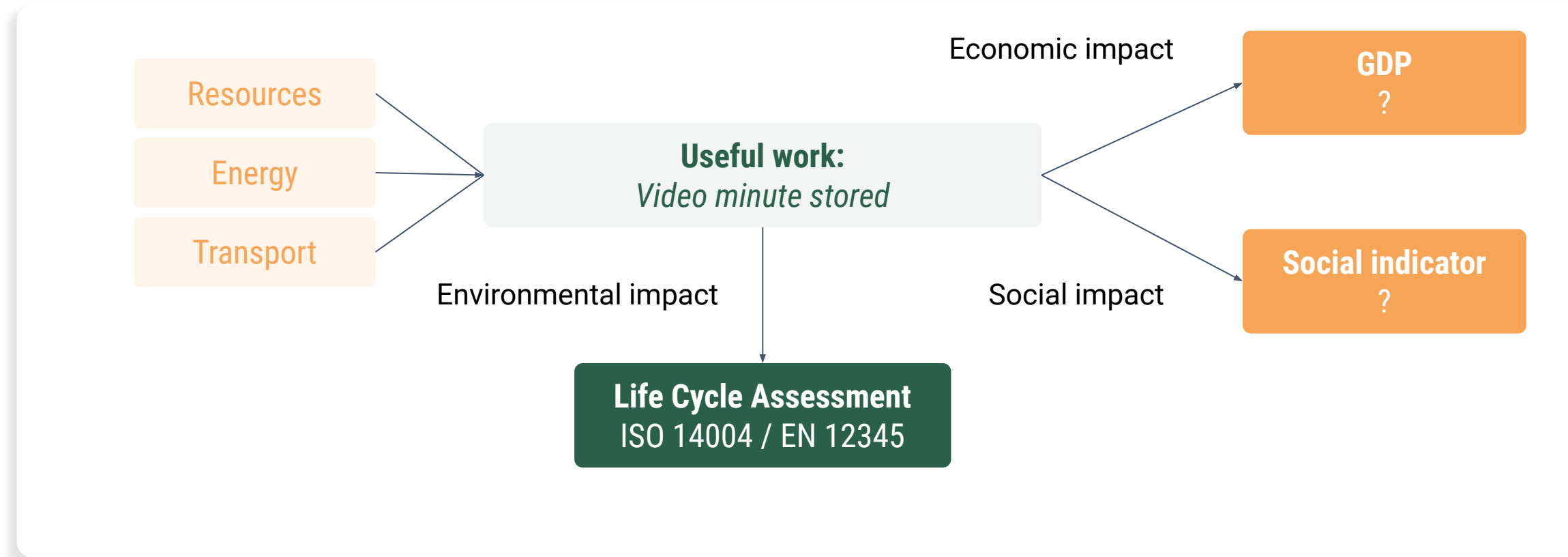
European evidence-based policy model



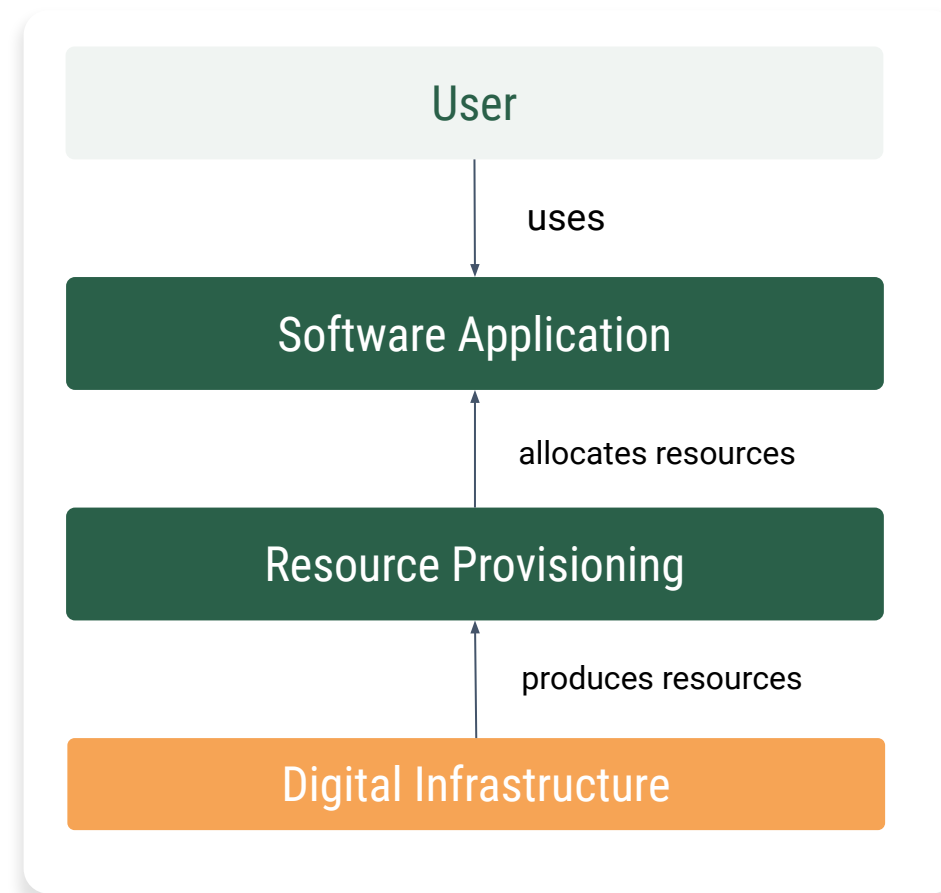
**Lord Kelvin: “to measure is to know”**

The first step is transparency.

# Transparency is possible, existing standards can be tailored to the digital sector & new ones developed



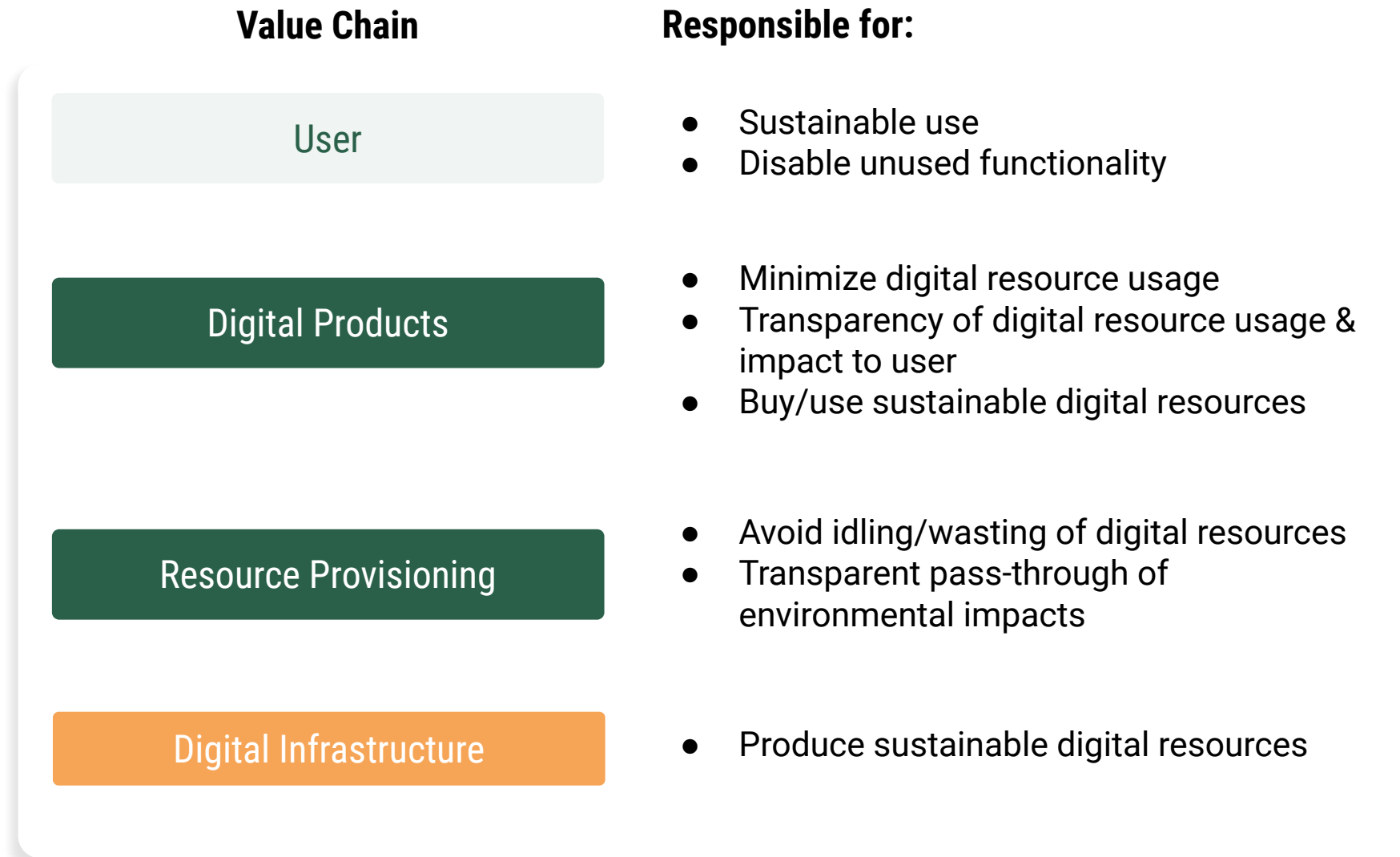
# Combined with a clear understanding of value creation in the digital sector



*A more detailed version can be found in the paper [Taxonomy for a Digital Economy](#) Schulze, Kumar, Oghia, 2021 published by the Commonwealth & SDIA*



# We can assign clear responsibilities to market actors and design effective policy



# Effective policies towards embedding our European values & shaping the sustainable development of the digital sector

What we are talking about in Europe?

TELECOM  
**Germany is getting a sovereign cloud**  
By Sue Marek · Sep 8, 2021 11:50pm

84 miljoen liter  
**Nederlands datacenter Microsoft verbruikte vier keer meer water dan gedacht**

12 augustus 2022 17:19

**Germany advocates regaining “digital sovereignty”**

Published: 12 November 2020 Author: Stefan Talmon

What are our values?

- Peace
- Democracy
- Human rights
- Freedom
- Social justice
- Equality
- ...
- **Sustainability**

# European & Dutch digital policy can rest on 3 pillars:

Transparency

Sustainable Development

European Values



*Shaping the vision for a sustainable digital economy & digitalization*





**Thank you!**

# My contact details



## Max Schulze

[max.schulze@sdialliance.org](mailto:max.schulze@sdialliance.org)

Colonnaden 5  
20354 Hamburg, Germany

Keizersgracht 62-64  
1015 CS Amsterdam, Netherlands

**Sustainable Digital  
Infrastructure Alliance e.V.**

Colonnaden 5  
20354 Hamburg  
Germany