



UHASSELT

KNOWLEDGE IN ACTION

Research assessment

...why change is needed and what we can do about it

Presentation for the *International Open Access Week* organised by the Library of the Faculty of Education,
University of Iceland

28 October 2023

Noémie Aubert Bonn



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Noémie Aubert Bonn together with **Karen Stroobants**



A bit about me...

Frustrated researcher in Cognitive Neuroscience

Strategic networking
Publish
Media attention
Fashionable topics
Convincing grant writing
Publish
High impact factors
Publish
Publish
Publish!

Wait... Is this what it means to be a researcher?

A bit about me...



researcher doing research on research
especially on research integrity
open and reproducible research

What causes research misconduct?

How can we help researchers do quality, reproducible, open research?



+ policy advisor on **Research assessment!**

In this presentation, we will talk about...

Problems with current
research assessment

A few of the **many**
initiatives that offer
hope for the future

Select findings from research I have been involved in...

1. Focus groups and interviews with different stakeholders
2. Small scale survey with researchers
3. Large scale survey with researchers

...not the whole picture, but largely consistent with existing research.

Before we start, let's see what YOU think



<https://www.menti.com/algp96td58ha>

2. Focus groups and interviews

56 stakeholders in the Flemish biomedical science

What is
success in science?

PhD candidates



Post Doc



Faculty researchers



Past-Researchers



Integrity network



Institution leaders



Policy makers



Research funders



Editors/Publishers



Integrity offices



Lab technicians

What is **success** in science?

Research success



Career success

Quality

Quantity

Valid, reproducible findings

Exceptional findings

Collaboration

Individual achievements

Open science

Competitive

Innovation and negative findings

Positive results

Transparency, honesty, modesty

Sensational

3.1 Small scale survey with researchers

126 respondents

Mostly from Flemish
research institutions

18 statements of potential indicators for success

Publishing papers is...

Publishing in high impact journals is...

Publishing commentaries or editorials is...

Publishing more papers than others is...

Publishing open access is...

Peer reviewing is...

Replicating past research is...

Publishing findings that did not work (i.e., negative findings) is...

Sharing your full data and detailed methods is...

Reviewing raw data from students and collaborators is...

Conducting research with a high risk of failure is...

Connecting with renowned researchers is...

Collaborating across borders, disciplines, and sectors is...

Getting cited in scientific literature is...

Having your papers read and downloaded is...

Having public outreach (e.g., social media, news, etc.) is...

Having your results used or implemented in practice is...

Having luck is...

Publishing in high impact journals is...

...in advancing my career

...in advancing science

...to my
personal satisfaction

essential

☐☐☐

important

☐☐☐

irrelevant

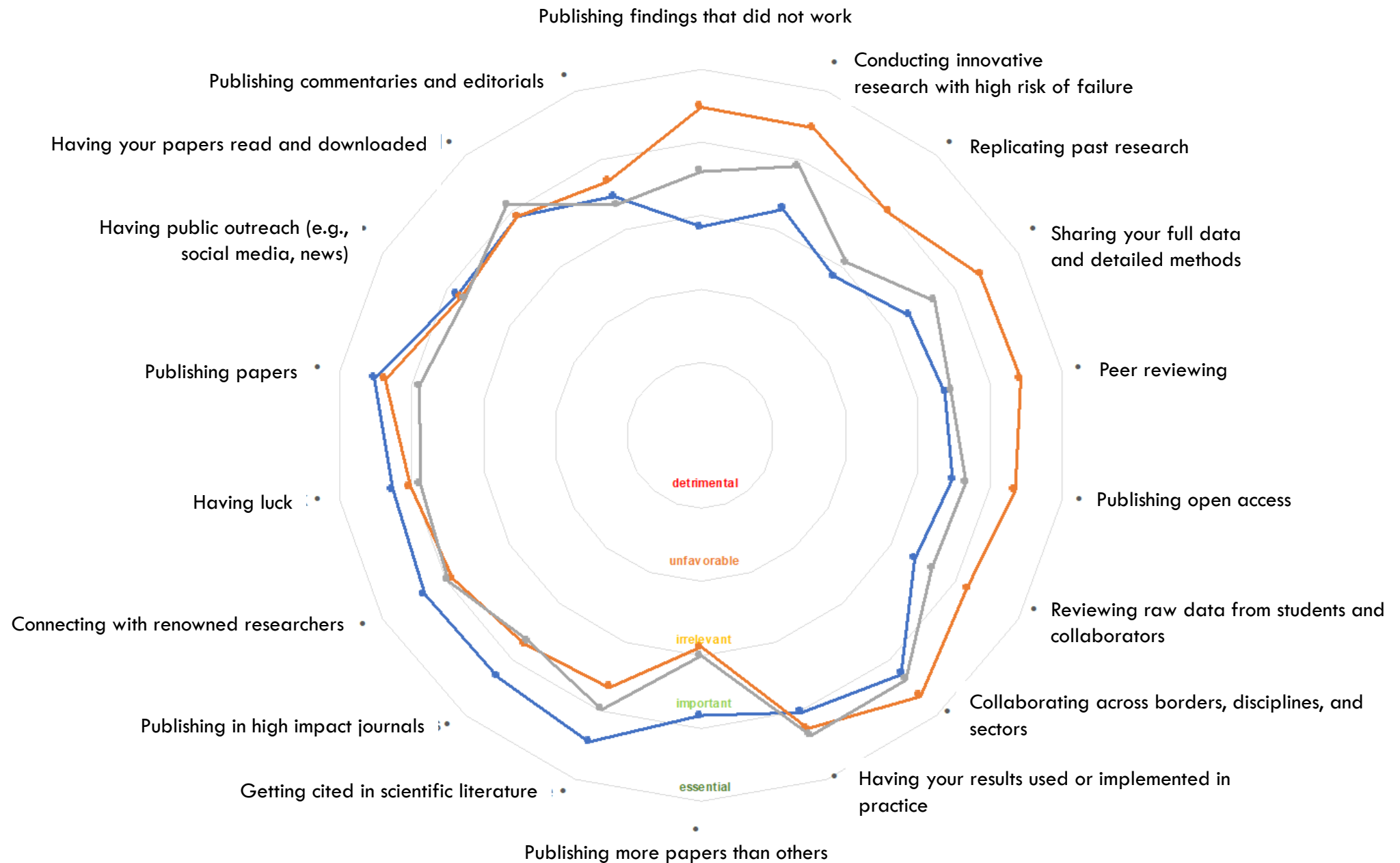
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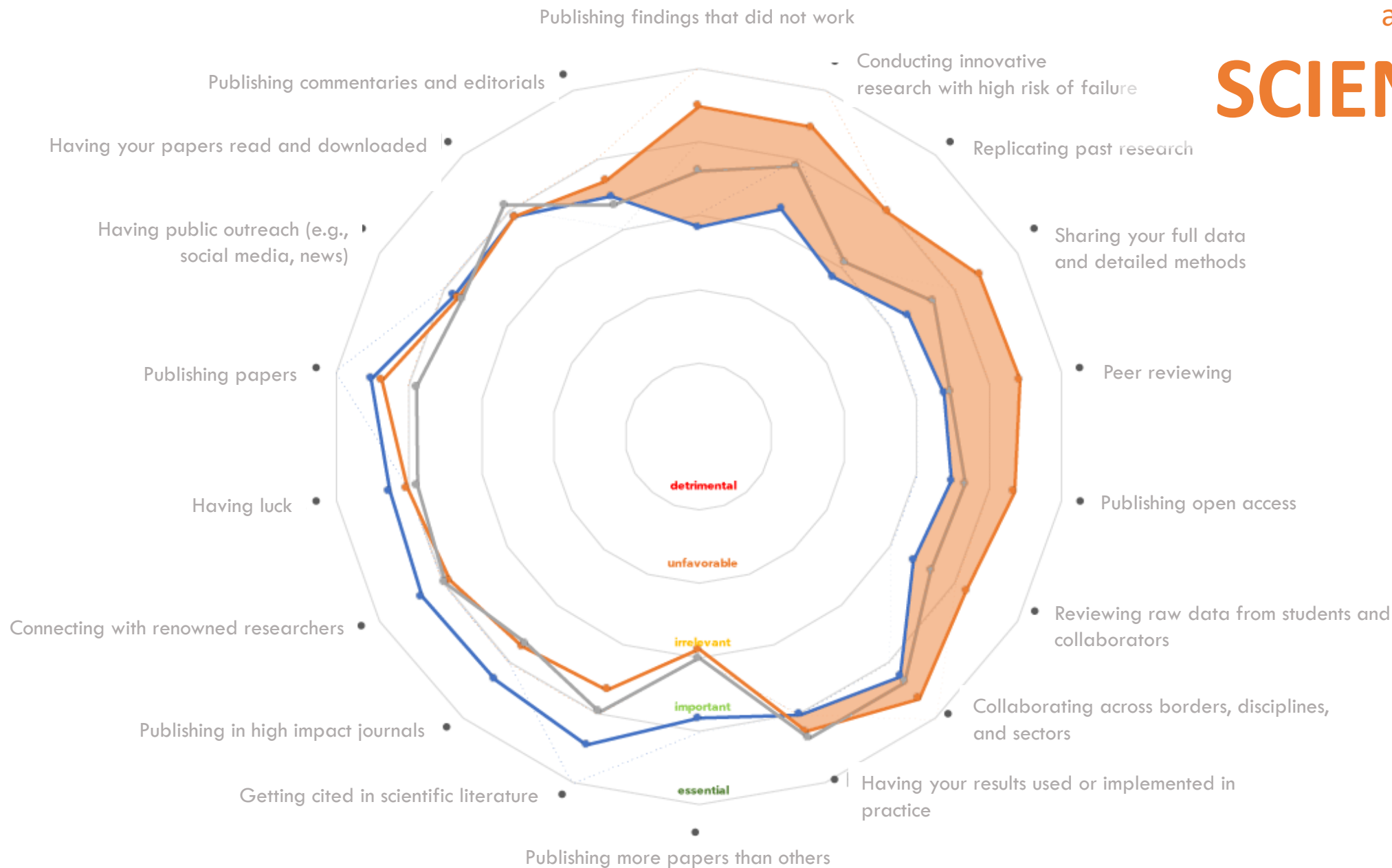
unfavorable

☐☐☐

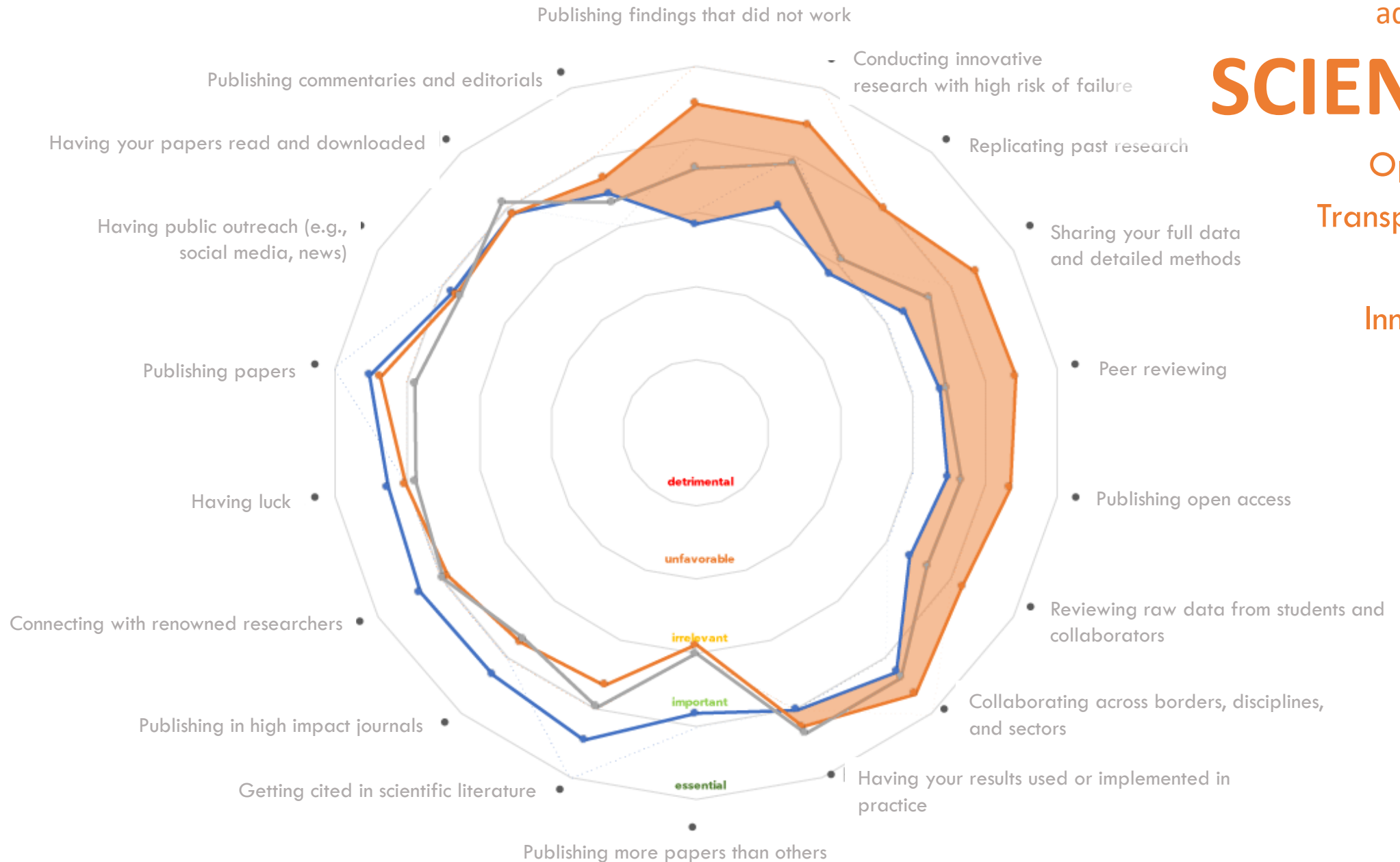
detrimental

☐☐☐



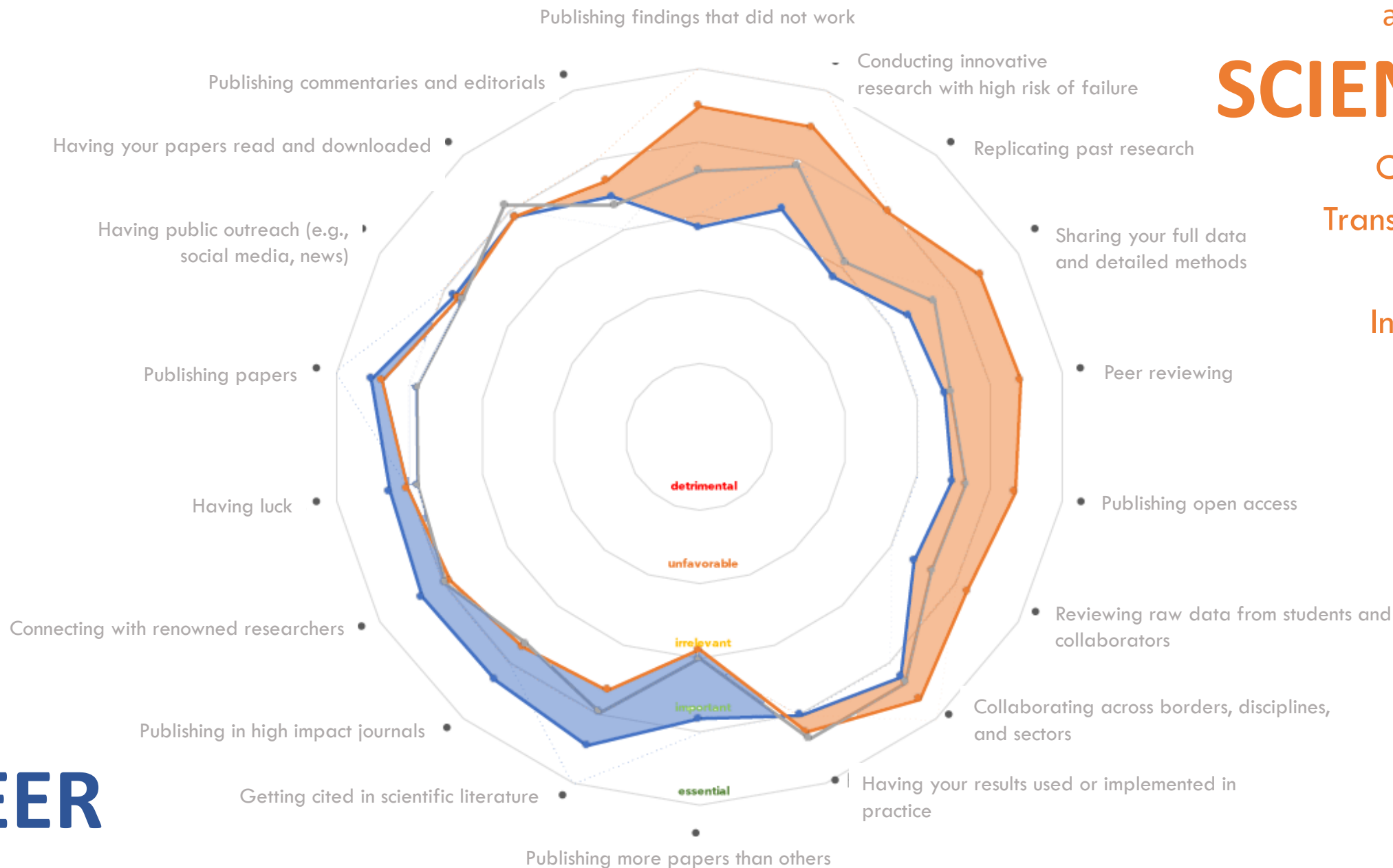


advancing
SCIENCE
 Openness
 Transparency
 Quality
 Innovation



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SCIENCE

Openness
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Innovation

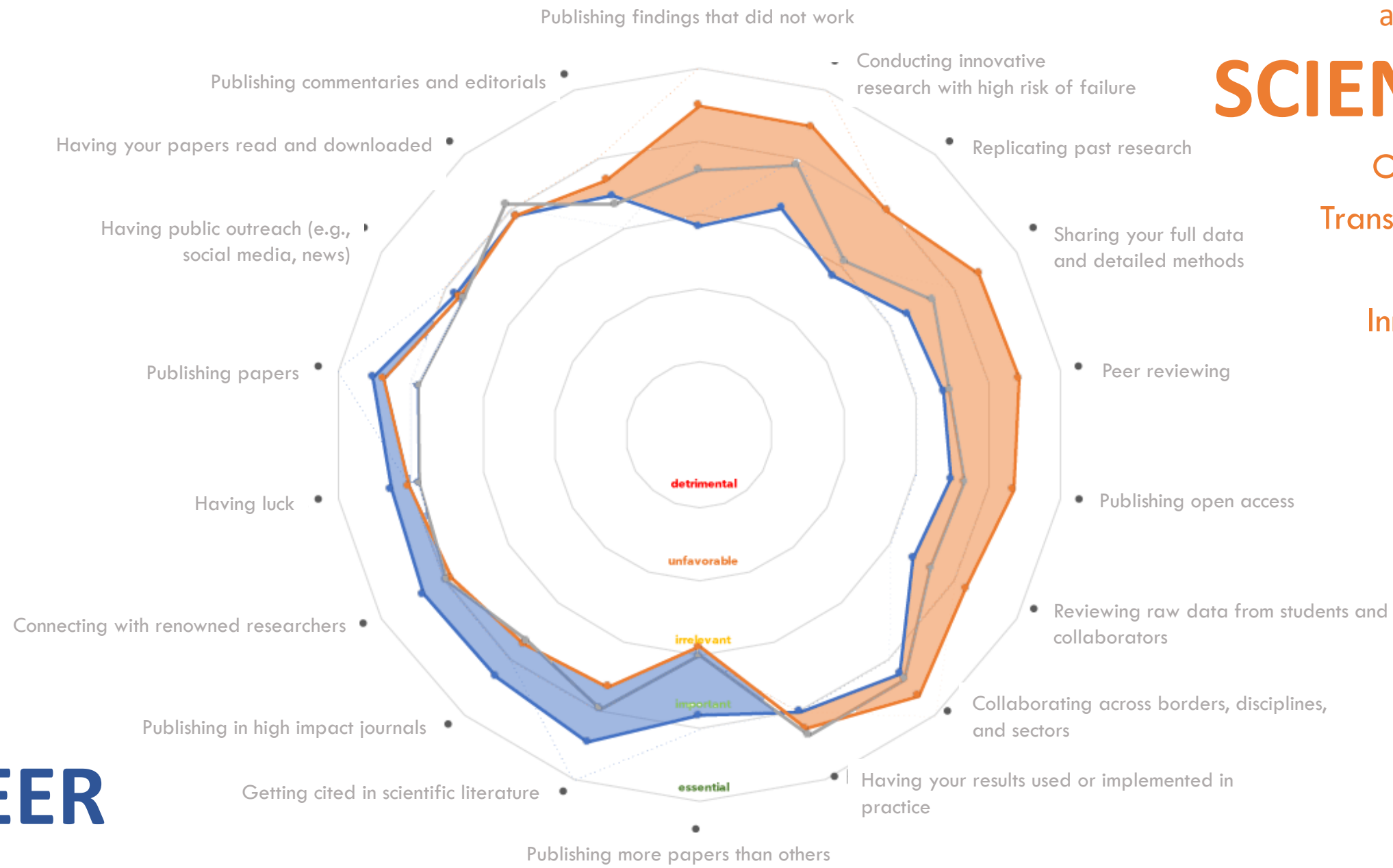


advancing
CAREER

advancing
SCIENCE

Openness
Transparency
Quality
Innovation

Luck
Prestige
Status
Competition
advancing
CAREER

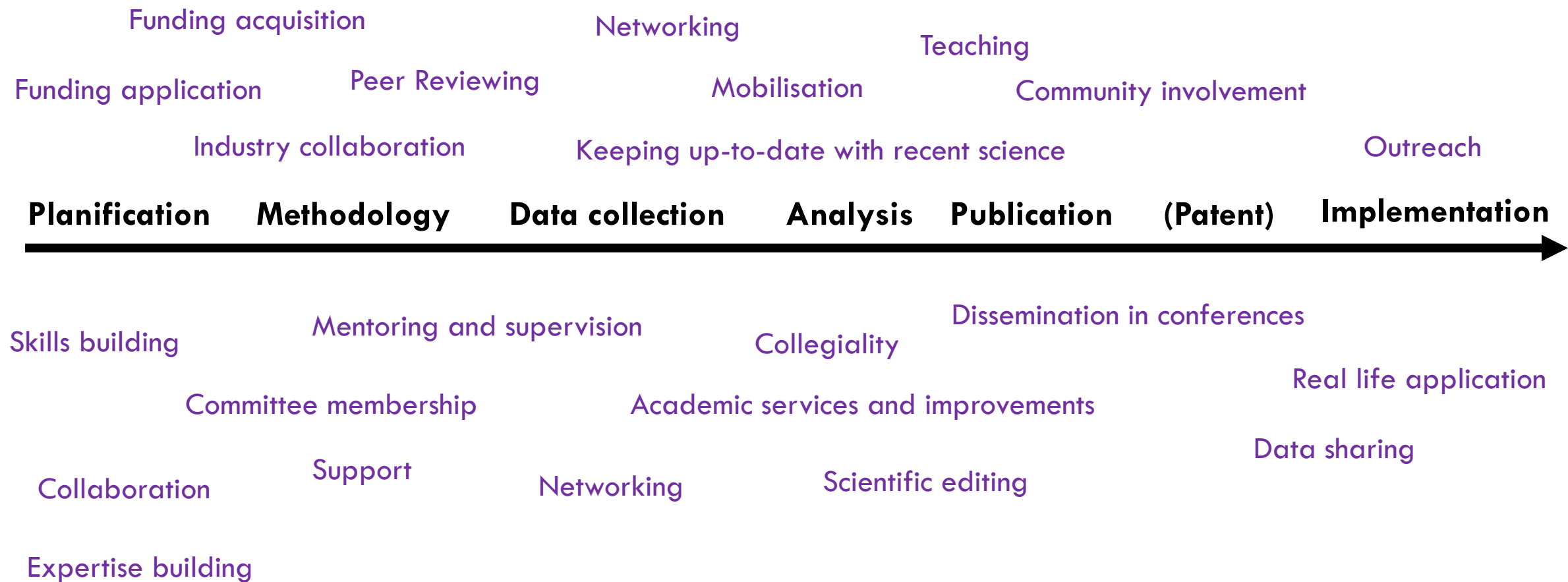


The problems...

- ◎ Indicators used to assess researchers often **fail to capture** high quality research and knowledge advancement.

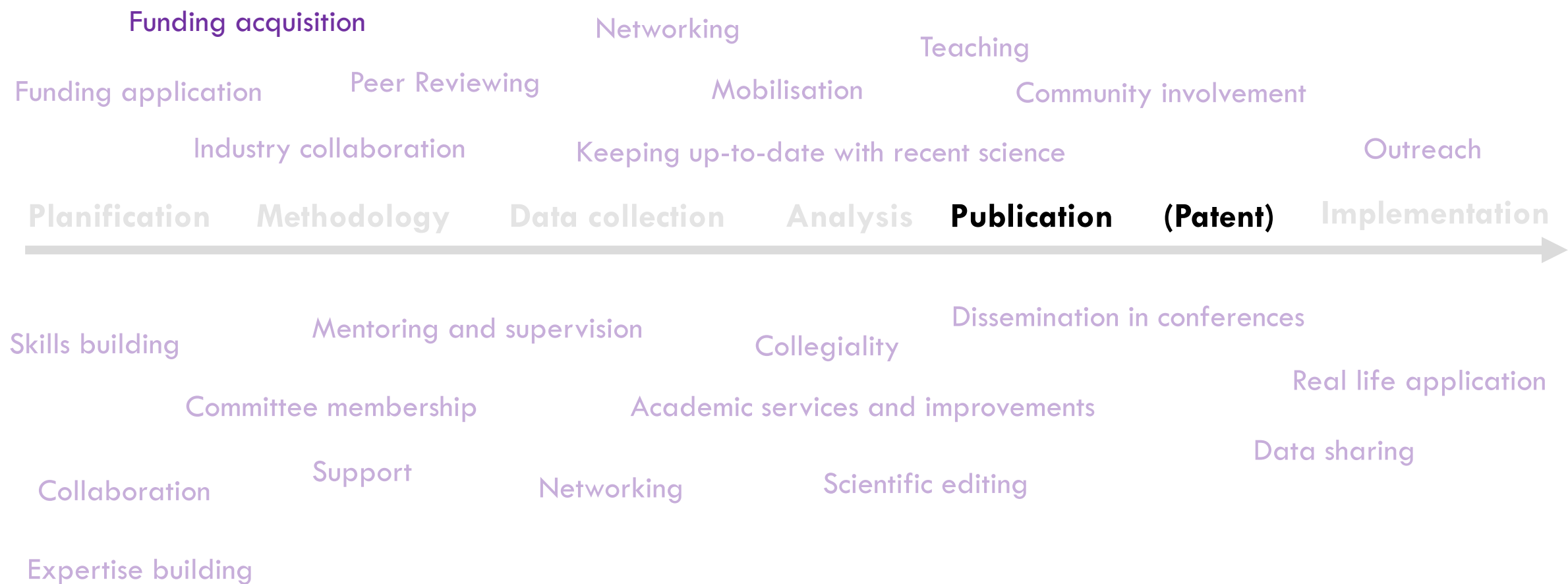
Which areas of researcher's work are recognised in their career?

2. Findings from focus groups and interviews



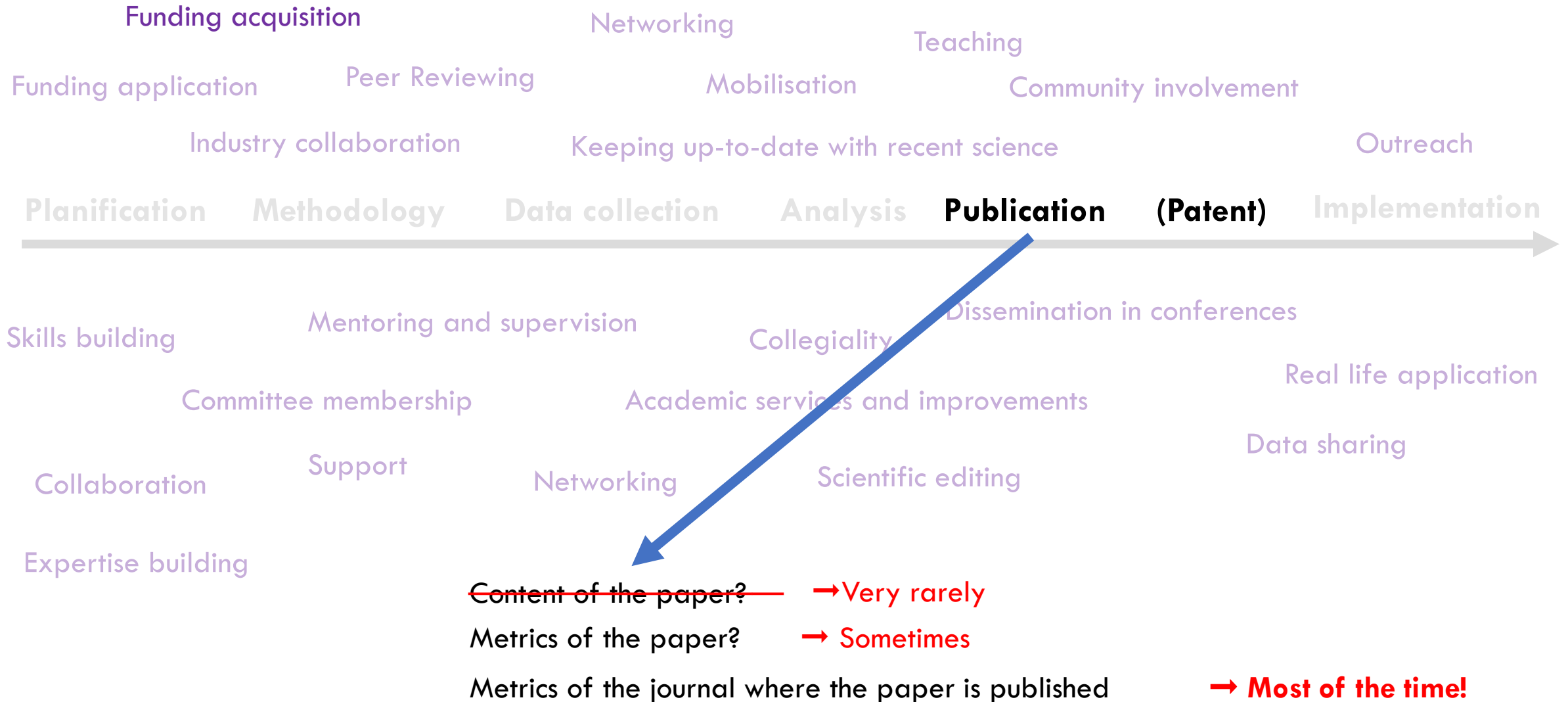
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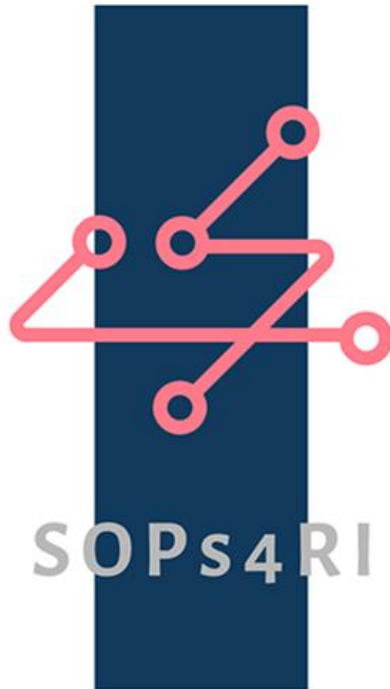
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The problems...

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- ◎ Current research assessments almost exclusively look at **outputs**, overlooking **how** the research is conducted and often also the **content** of the outputs themselves.

3.2 Large scale survey with researchers



European Commission H2020 project
sops4ri.eu

coordinated by University of Essex
Nick Allum, Abigail Reid

n = ± 50 000 researchers, mostly
European, but sample extended
beyond Europe

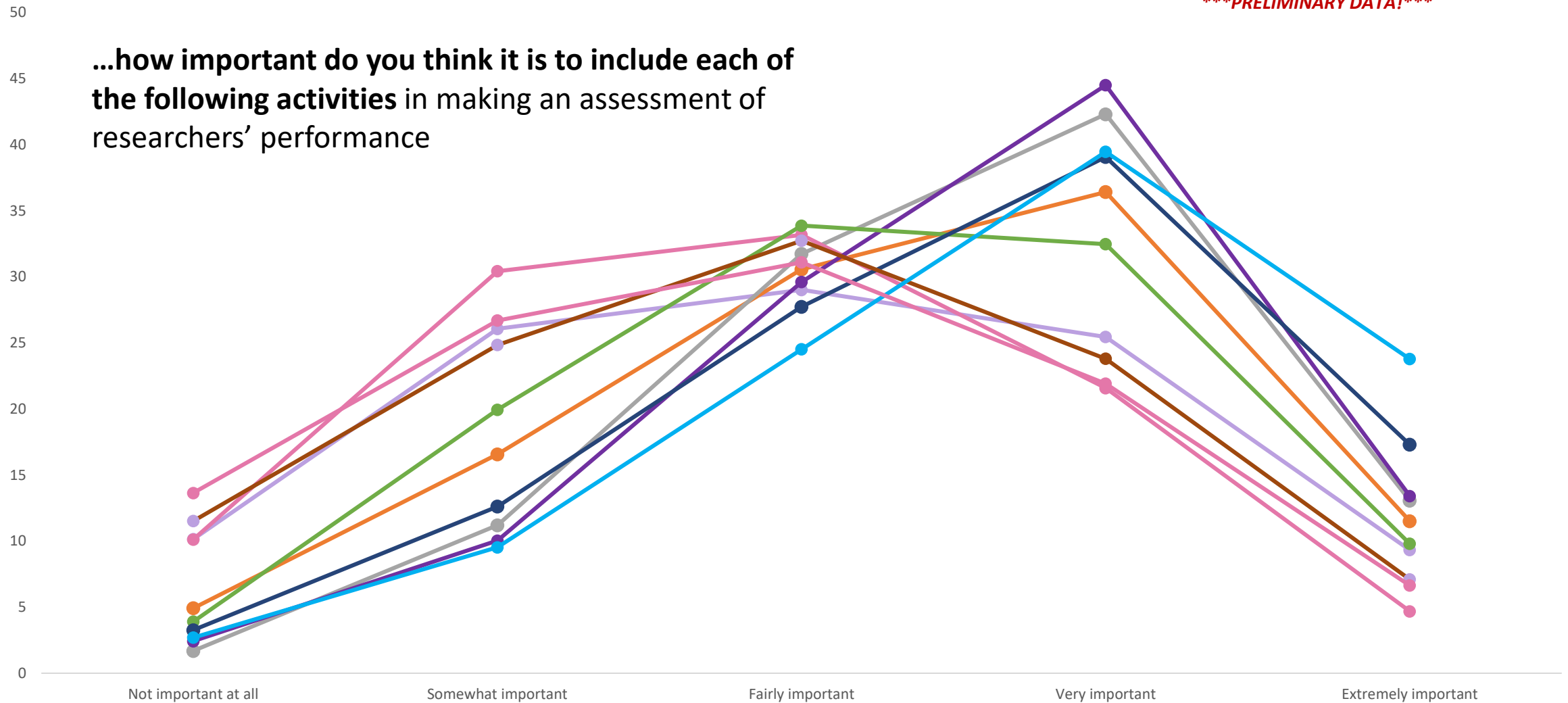
PRELIMINARY DATA!

QUESTION:

...When a researcher's performance is being evaluated by an employer or potential employer, **how important do you think it is to include each of the following activities in making an assessment of their performance?**

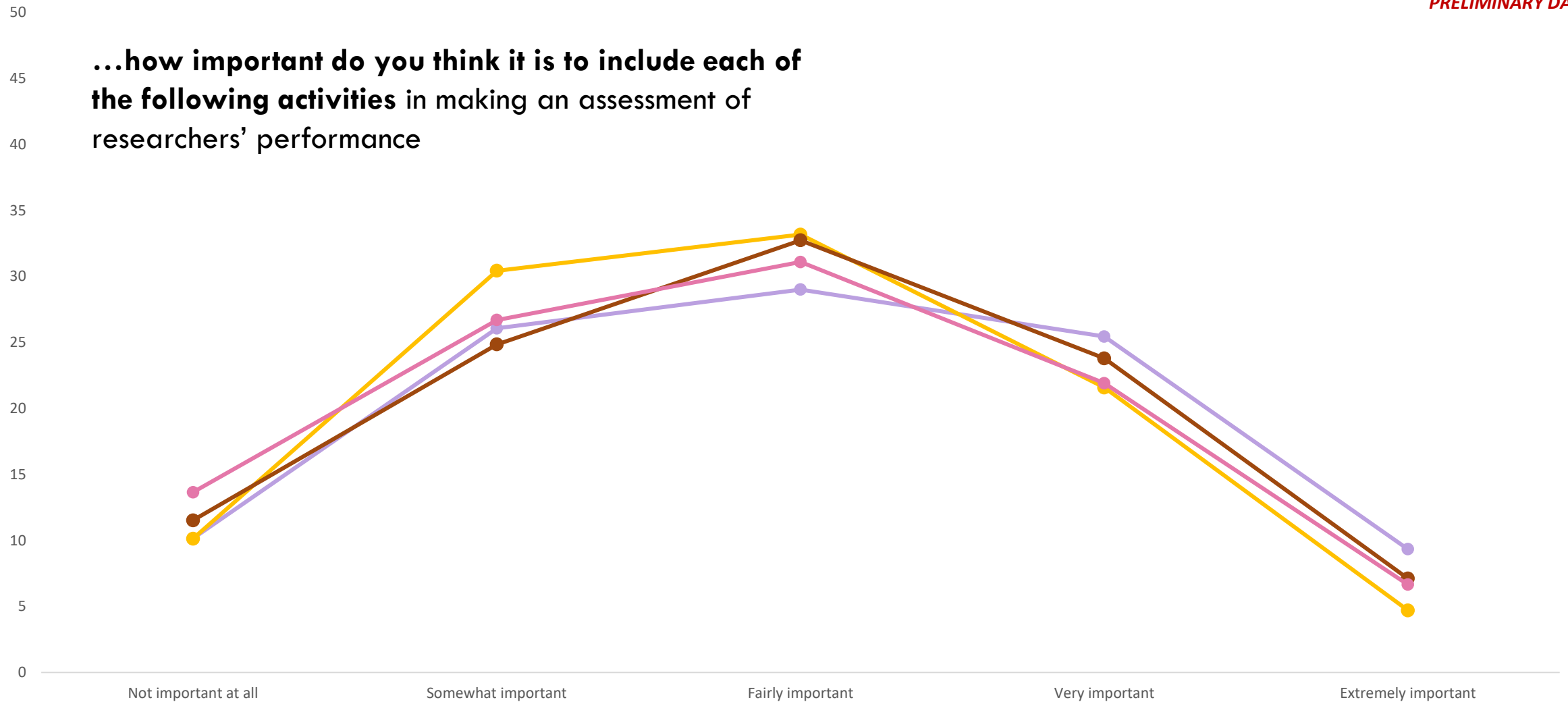
- Societal impact of their research
- Teaching
- Leadership
- Editorship of journals and other publications
- Supervisory responsibilities
- Outreach and communication of research to public audiences
- Peer review
- Publication metrics (JIF, H index)
- Collegiality
- Participation in, or delivery of, research integrity training

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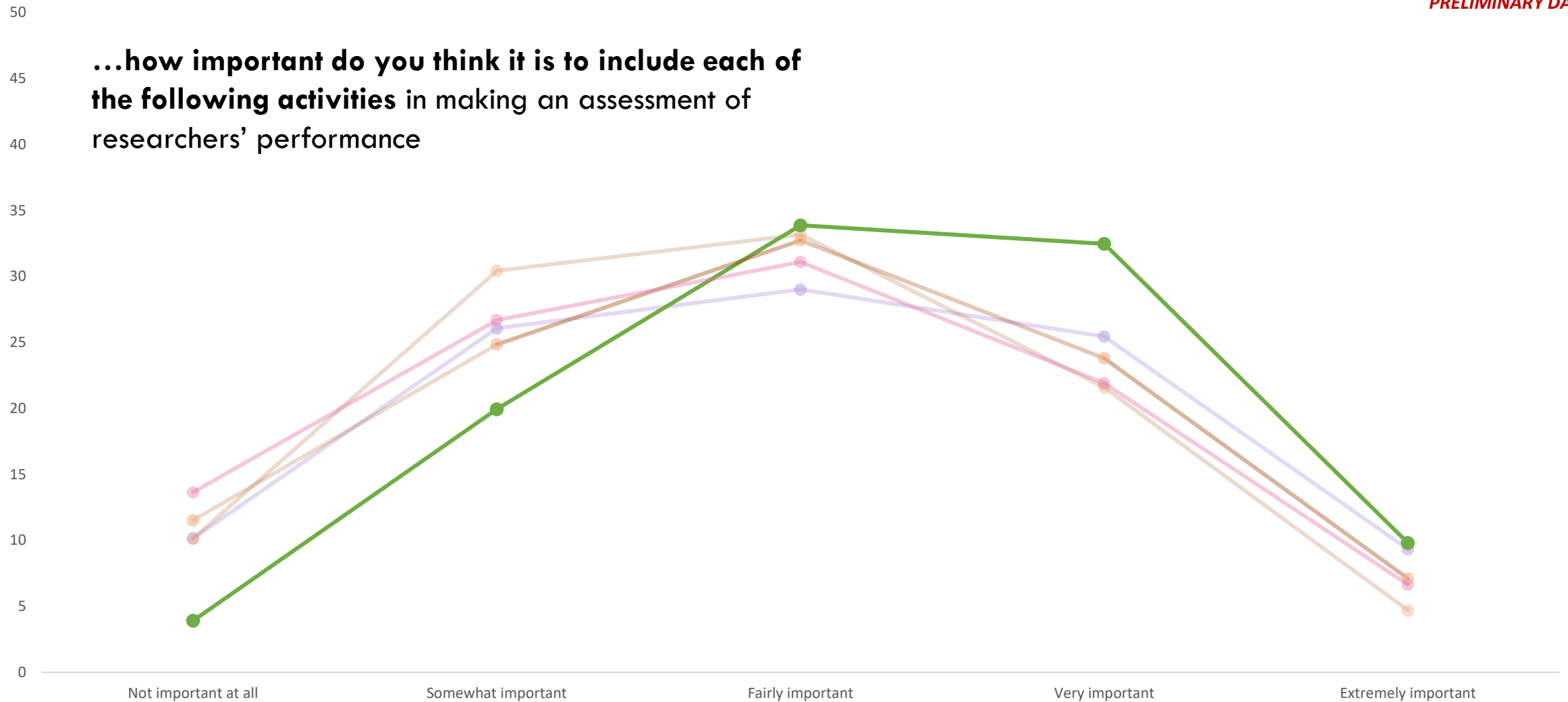
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- Editorship of journals and other publications

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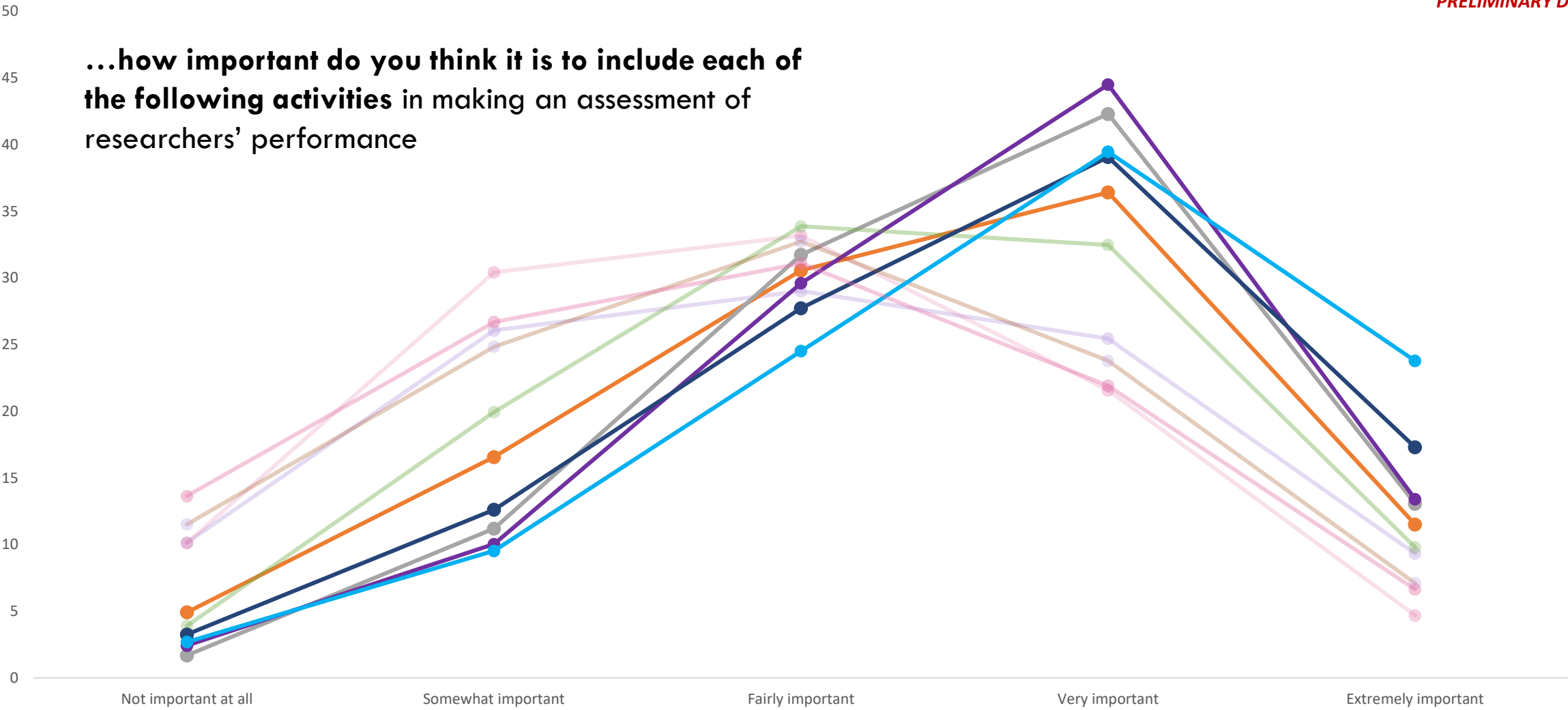
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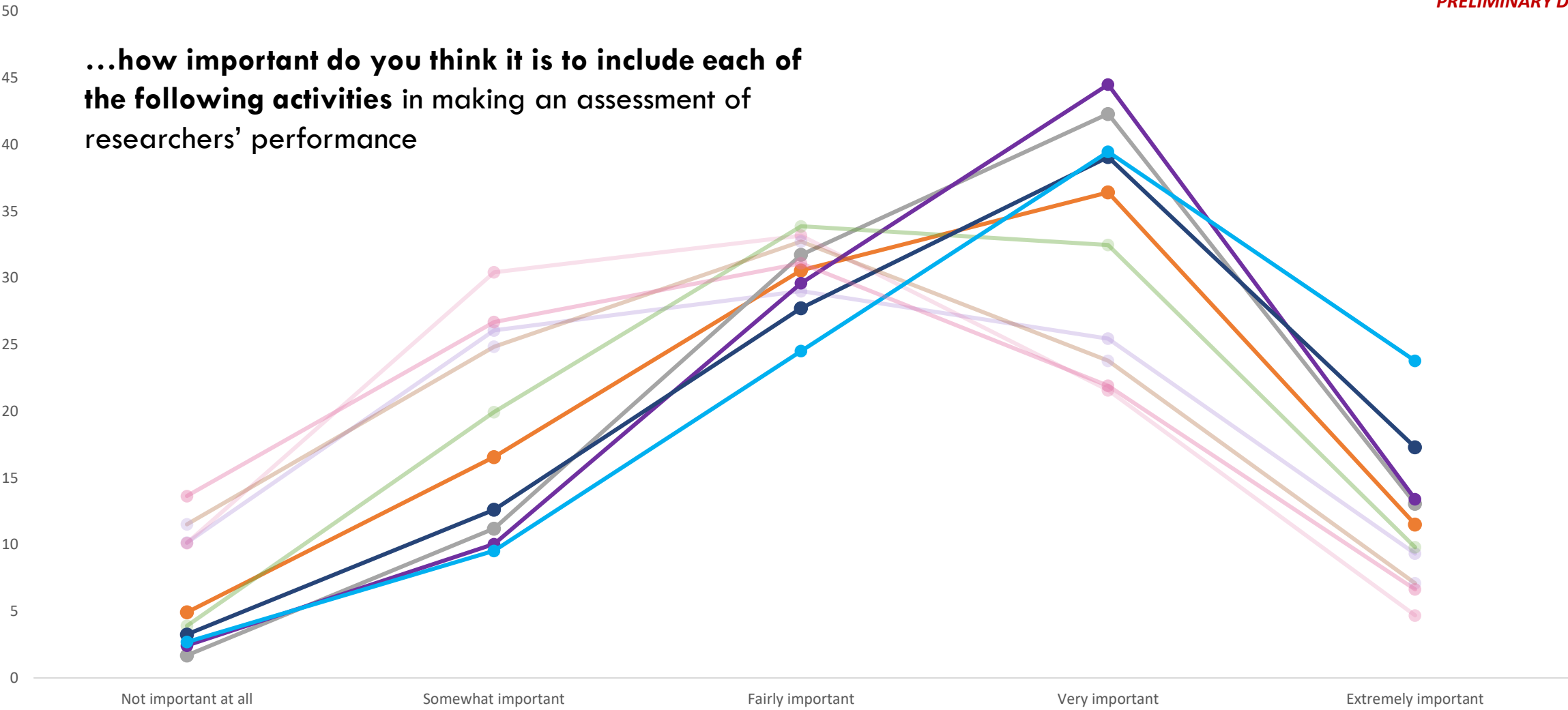
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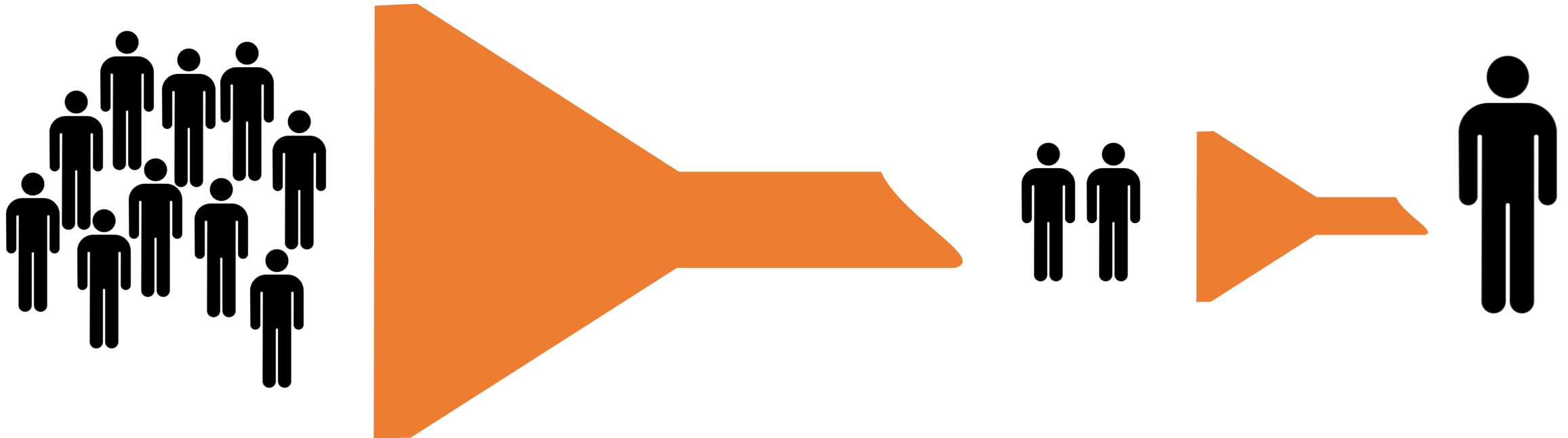


- Teaching
- Leadership
- Supervisory responsibilities
- Peer review
- Collegiality

Not research outputs!
Largely absent in current assessments

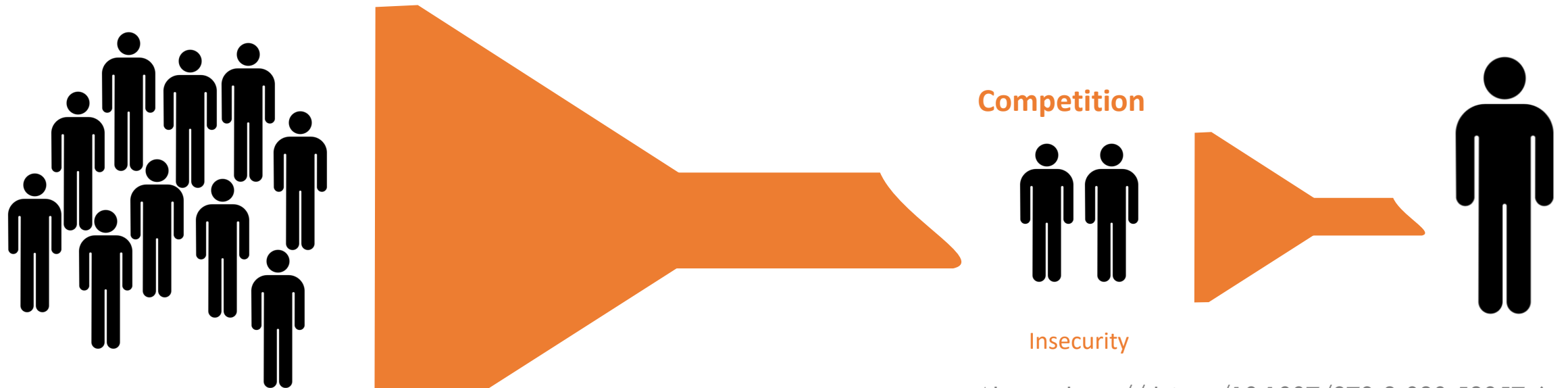
It's not only the **assessment process** that is problematic, **current career structures** also add to the problem

Current career structures



2. Findings from focus groups and interviews

Current career structures create competition between ECR



Competition

Stress
Isolation
Mental health risks

Also see <https://doi.org/10.1038/nj7677-549a>
<https://doi.org/10.1016/j.respol.2017.02.008>
[https://doi.org/10.1016/S0962-8924\(99\)01686-4](https://doi.org/10.1016/S0962-8924(99)01686-4)
<https://doi.org/10.1038/nbt.4089>

Also see <https://doi.org/10.1007/978-3-030-53857-6>
<https://doi.org/10.1038/538444a>

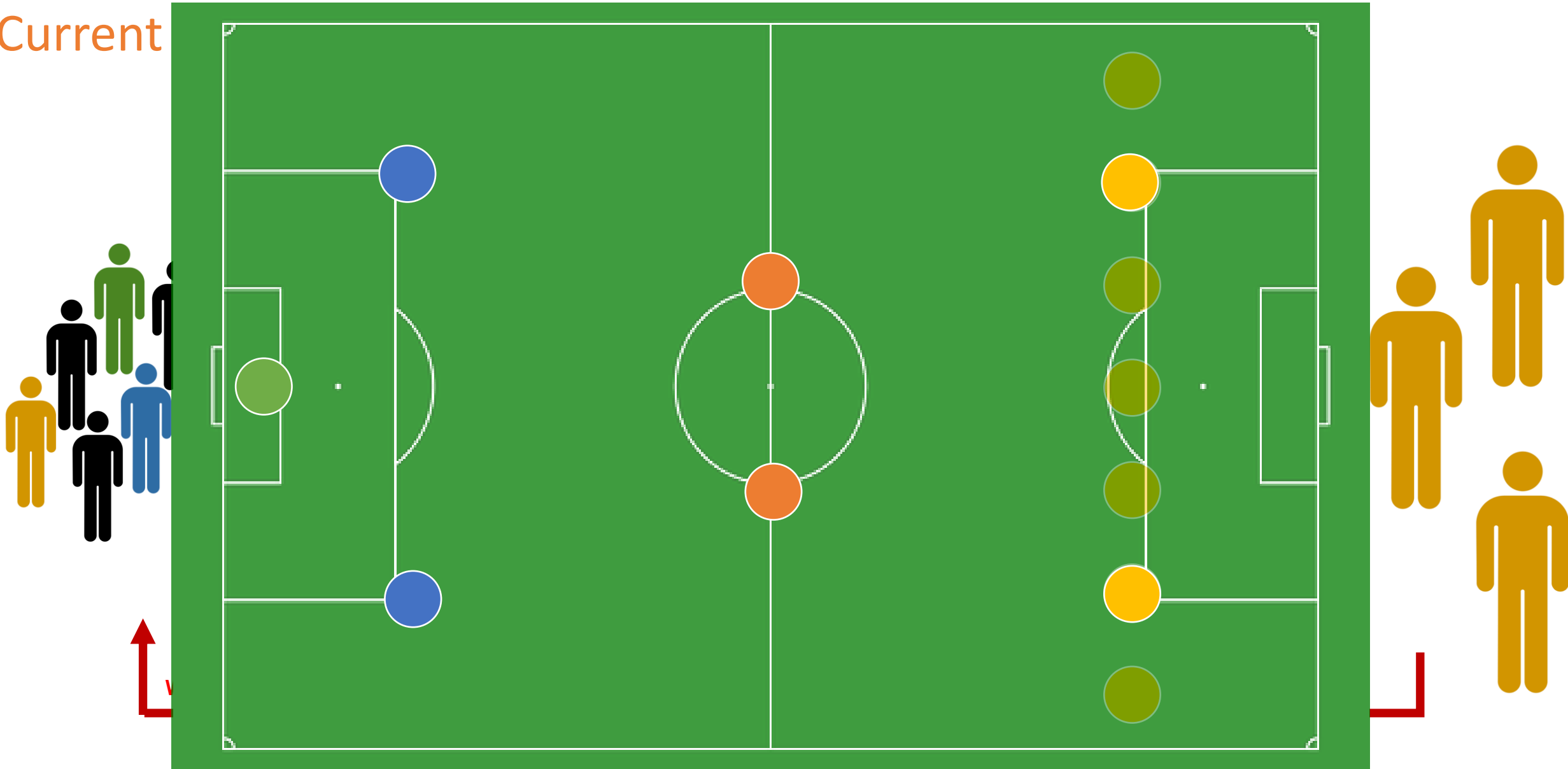
2. Findings from focus groups and interviews

Current career structures **block diversity**



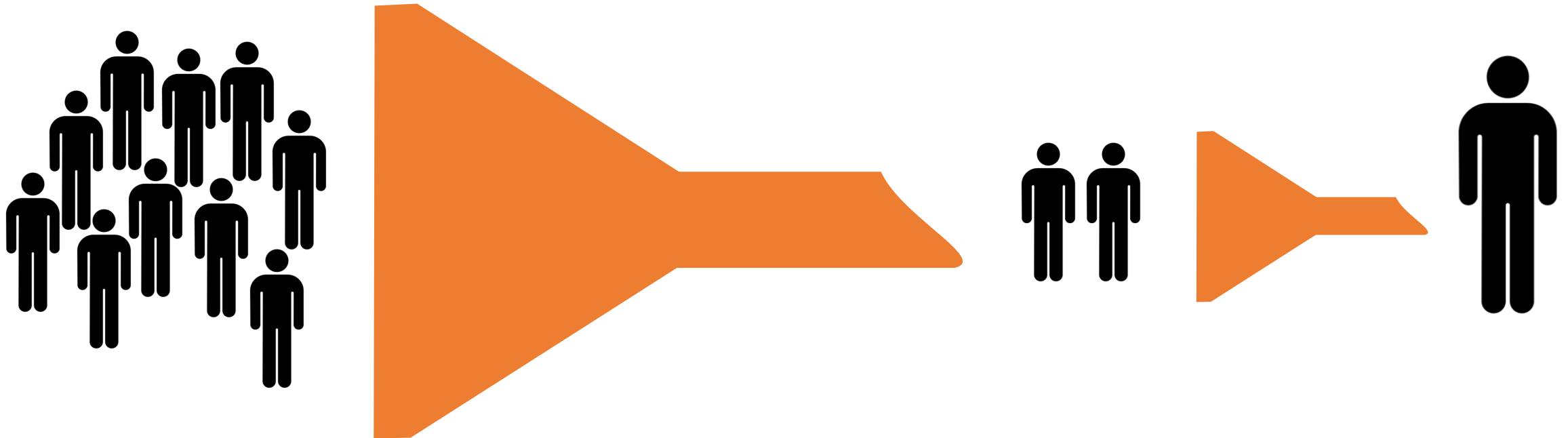
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Current



2. Findings from focus groups and interviews

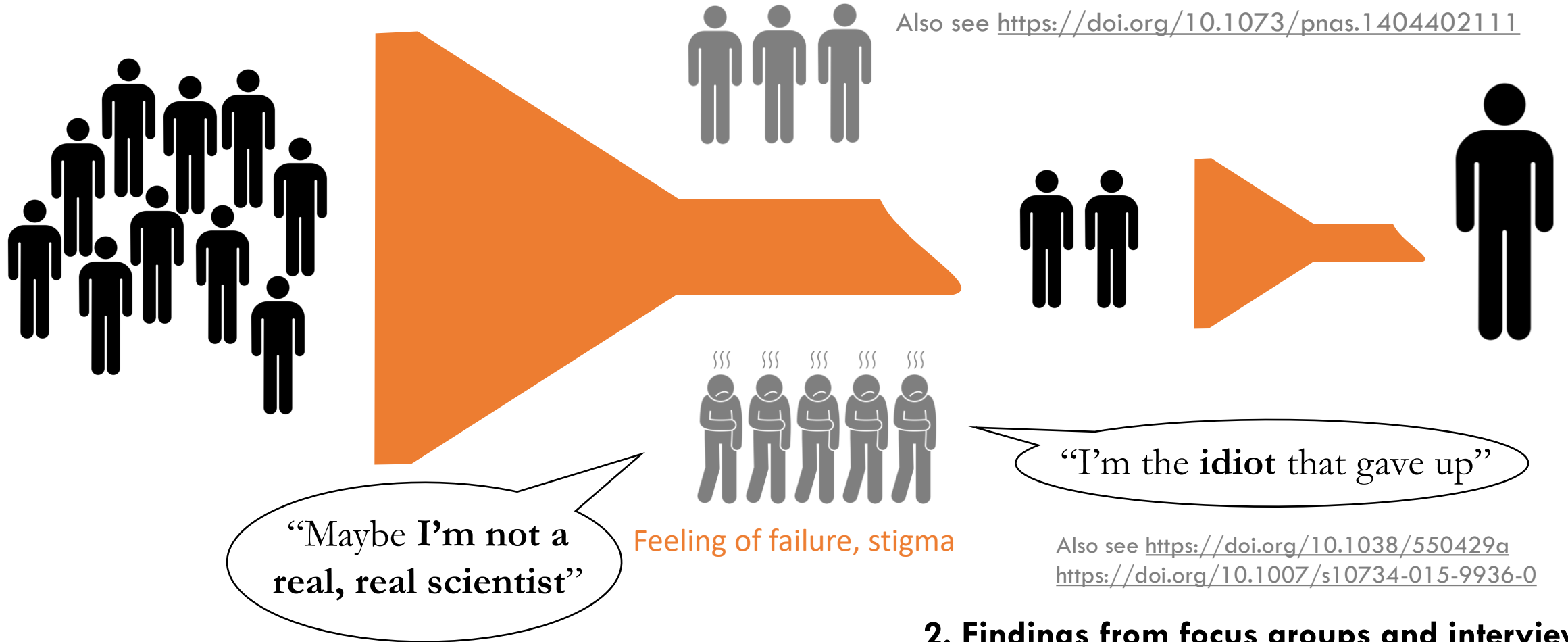
Current career structures



2. Findings from focus groups and interviews

Current career structures don't support those who leave academia

Lack skills for non-academic careers

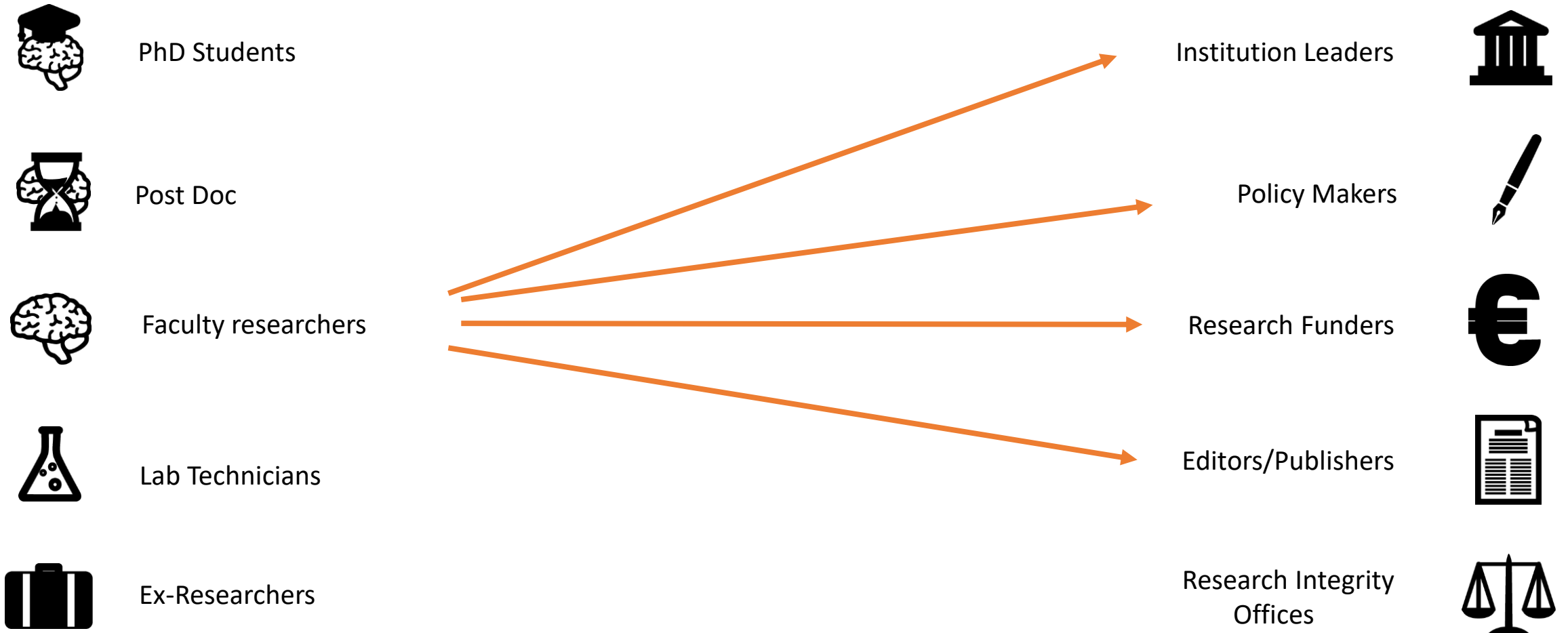


2. Findings from focus groups and interviews

The problems...

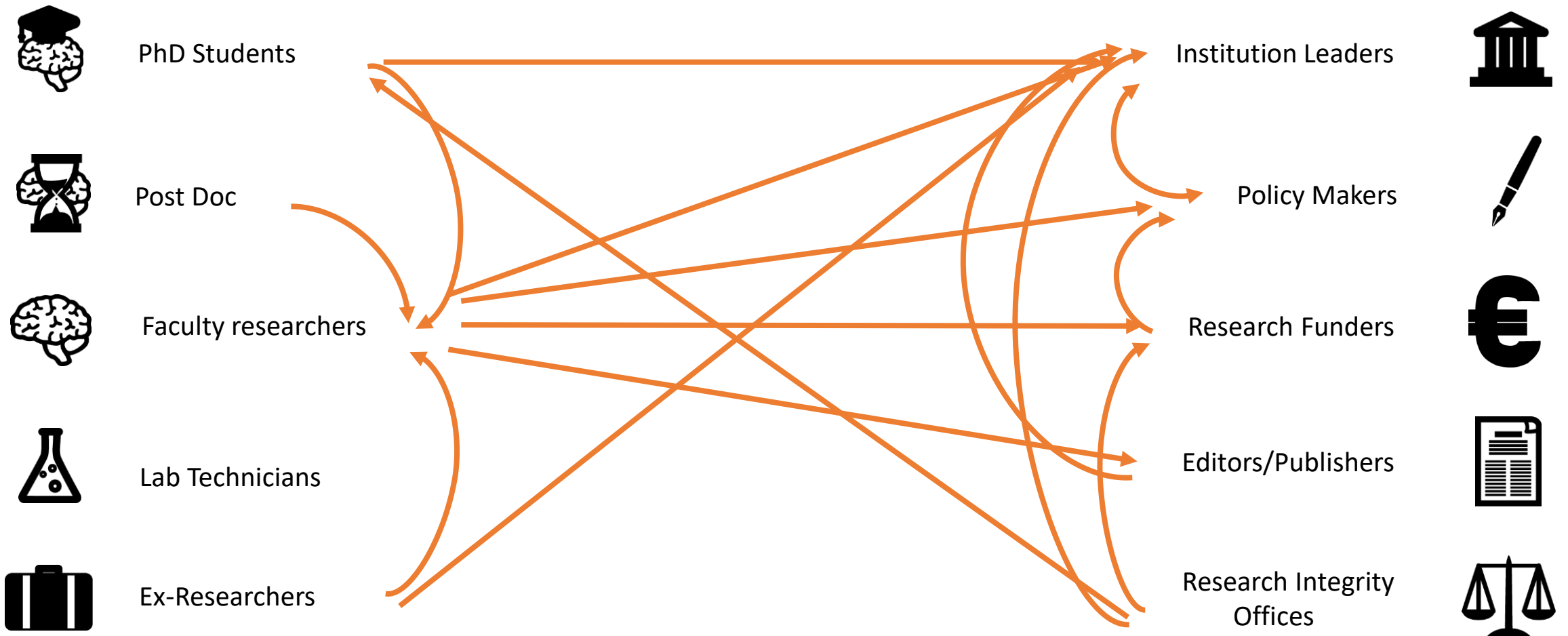
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- ◎ Current **career structures** further deepen the problem, creating competition, lack of diversity, and lack of support.

Who is responsible...?



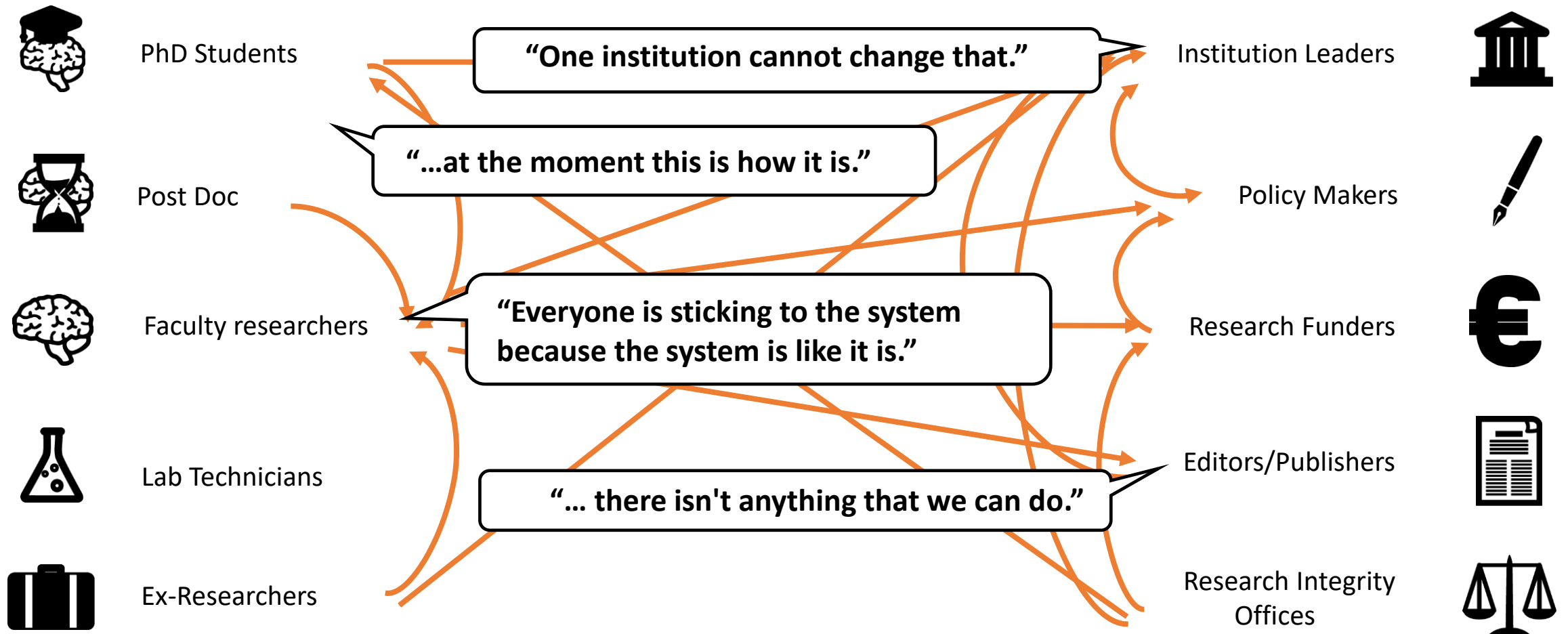
2. Findings from focus groups and interviews

Who is responsible...?



2. Findings from focus groups and interviews

Who is responsible...?



Interdependencies, first mover disadvantage, incompatibilities...

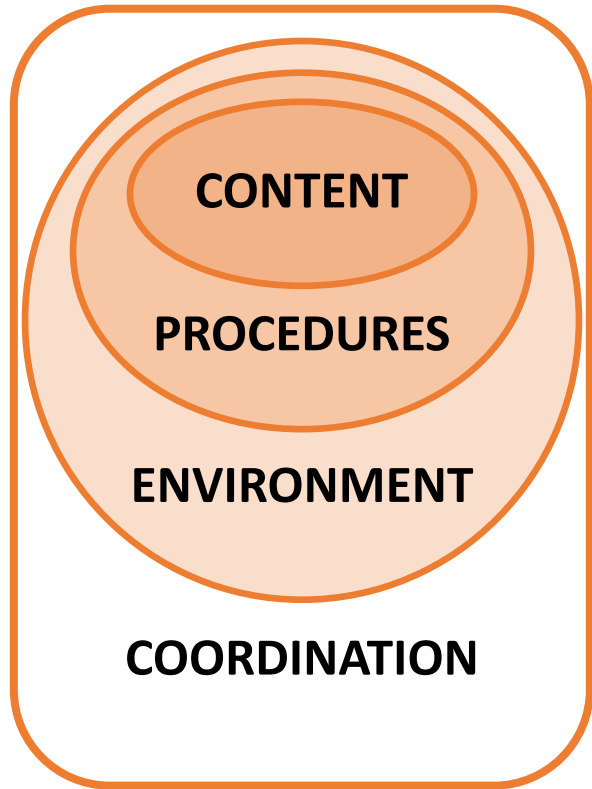
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- ◎ Current research assessments almost exclusively look at **outputs**, overlooking **how** the research is conducted and often also the **content** of the outputs themselves.
- ◎ Current **career structures** further deepen the problem, creating competition, lack of diversity, and lack of support.
- ◎ These problems are systematic and difficult to address

So... are we doomed?

No!

We are even in a momentum for change.



What

How and Who

Where

Between

Different **layers of change** are needed



CONTENT

CRT

Responsible use of metrics

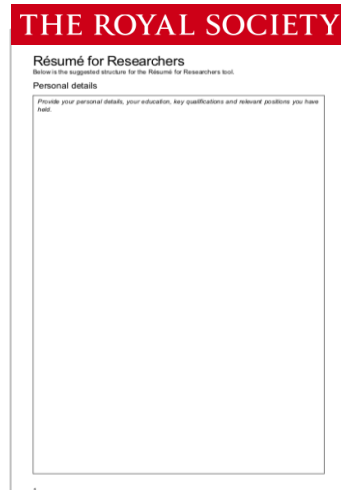
Creating awareness about responsible use of metrics,
improving metrics literacy, limiting volumes assessed



24 000 individuals
3000 organisations

Looking beyond research outputs

CONTENT



Narrative or R4RI CVs
providing flexibility in what
researchers value

More room for individual
profiles and diversity of
skills...

Valuing diversity

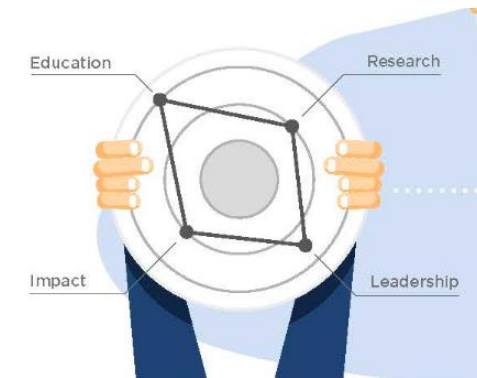
Embrace
diversity as
an asset to
research



Broadening views of impact

Different dimension of impact

- Different stages of the research impact
- Concrete societal impact



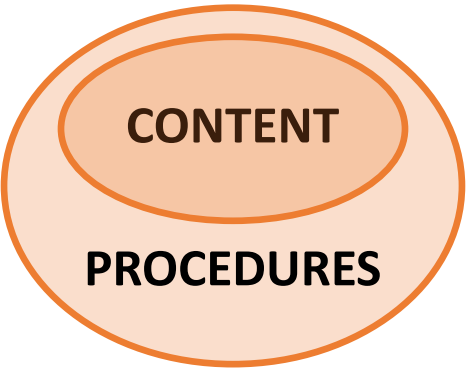
Value diverse
profiles and
areas of focus

Carefully think about assessment processes

- 'What do we value?'
- Evaluate only where necessary
- Evaluate with the evaluated



Clear definitions of terms



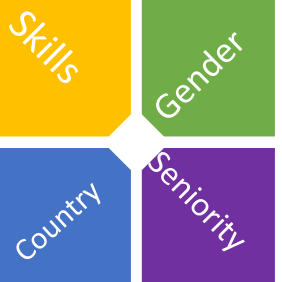
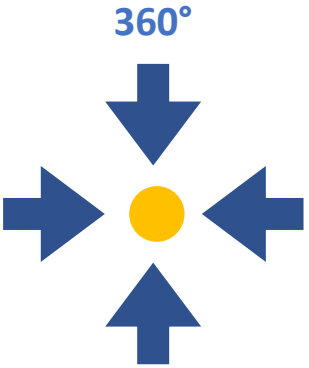
Impactful
Excellent
Wold-class
Significant
Innovative



Train assessors to minimise biases

Diversify the assessors

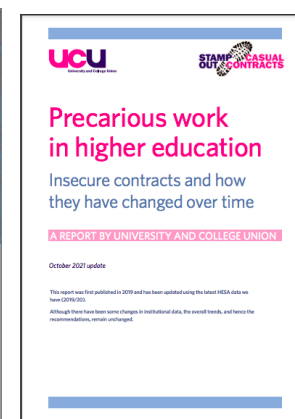
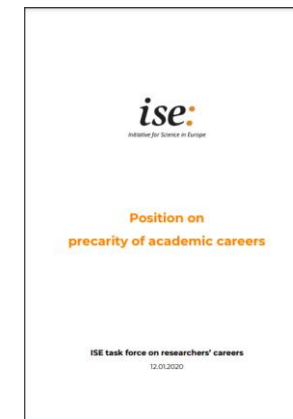
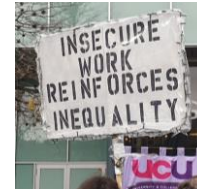
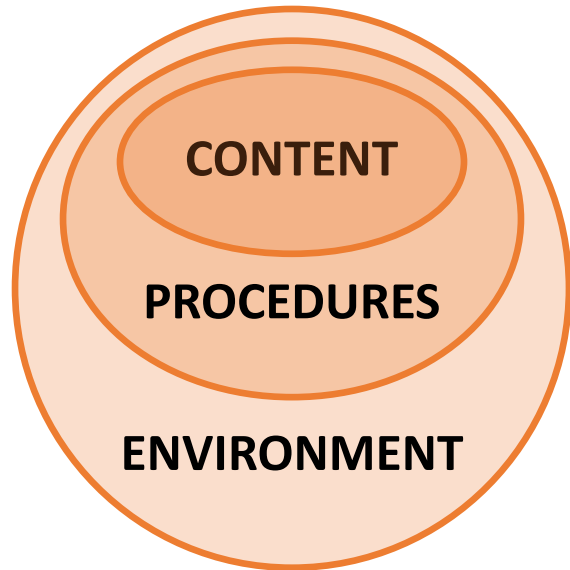
Assessors from all sides
of the hierarchy to
capture different aspect
and perspectives



- Implicit bias training
- Diversity training,
- Training for new CV formats

Address employment precarity

More stability in and between contracts, mobility from and to academia, awareness raising



Foster intersectoral mobility

Fight the stigma for non-academic employment



Teach transferable skill, build career continuity portfolio, raise awareness...



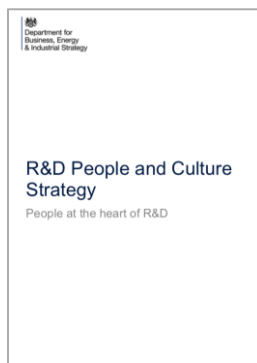
Create healthier research environments

Value and support healthy research environment, Culture experts

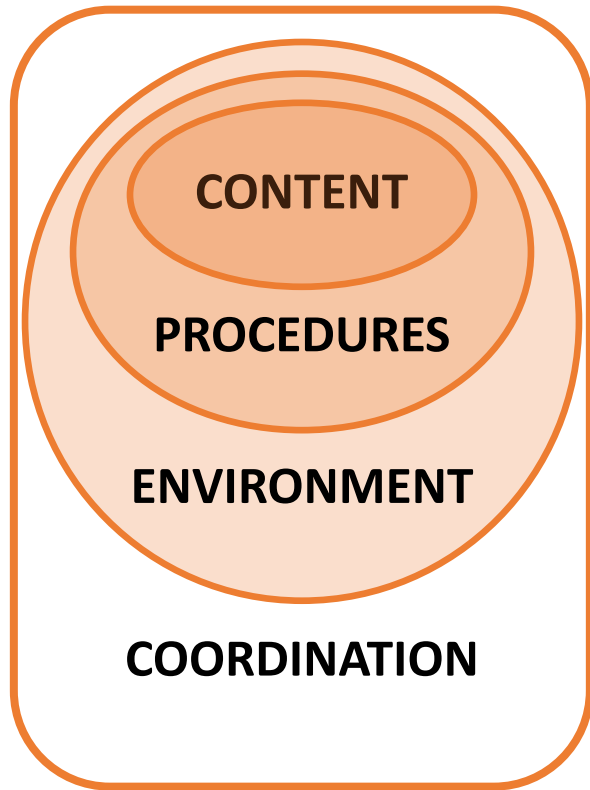


Address higher levels of assessments

Rethink university rankings, and institution-level funding



DORA has been a real driver for uniting voices,
raising awareness, and encouraging actions



Agreement on reforming research assessment

- Multi-stakeholder agreement
- From statements to commitment and action
- Global initiative



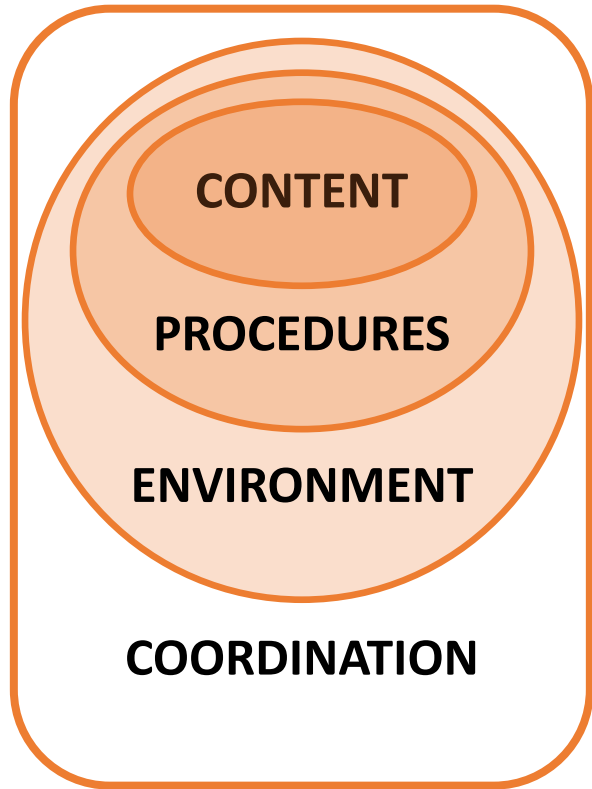
Tools to Advance Research Assessment (TARA) is a project to facilitate the development of new policies and practices for academic career assessment.

Dashboard
An interactive online dashboard that tracks criteria and standards academic institutions use for hiring.

Toolkit
A toolkit of resources informed by the academic community to support academic institutions working to improve policy and

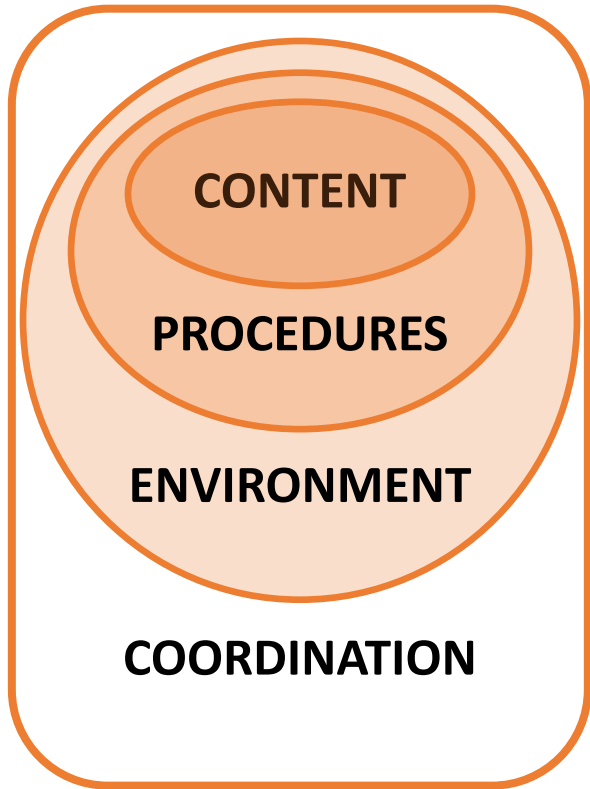
Survey
A survey of U.S. academic institutions to gain a broad understanding of institutional attitudes and approaches to





Commitments

1. Recognise the **diversity** of contributions to, and careers in, research
2. Base research assessment primarily on **qualitative evaluation**, supported by responsible use of quantitative indicators
3. **Abandon** the inappropriate uses of **journal- and publication-based metrics** in research assessment
4. **Avoid** the use of **rankings of research organisations**
 - Three commitments to **pilot and enable** the move towards new criteria, tools and processes for research assessment
 - Three commitments to **facilitate mutual learning**, communicate progress and sharing of evidence



At this point in time...

- Over **565 organisation members**

- Including 2 Icelandic members



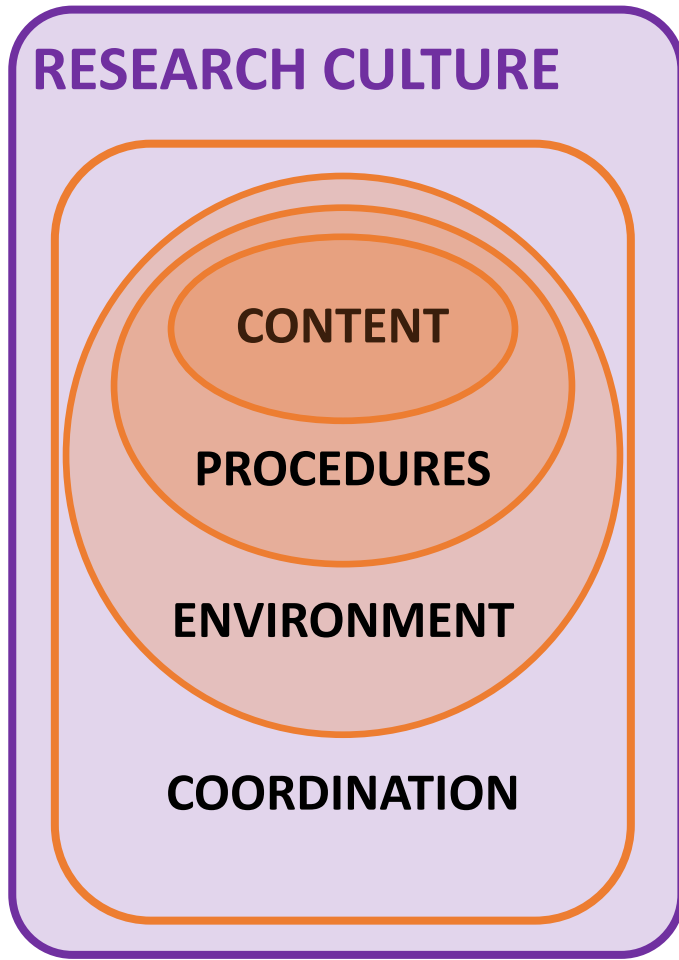
- Icelandic Centre for Research

- University of Iceland

Karen Stroobants

- Pen behind the Agreement
- Vice Chair of CoARA





Everyone in the research community
can contribute to reforming research
assessment, including individual
researchers

We are the assessors.

We can choose how we promote ourselves.

We shape what success means.

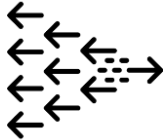
How can individual researchers contribute?



Join the conversation – *organise a [café culture](#) discussion*



Share your insights and opinions – *participate in research on research*



Change expectations – *help shape what success means*



Become an ambassador for change – ***raise awareness of [coara.eu](#)***



Consider broad criteria in research(er) assessment – *be a responsible assessor*

We may be part of the problem... but we can all be part of the solution!



Email: noemie.aubertbonn@uhasselt.be

Twitter: @naubertbonn

We may be part of the problem... but we can all be part of the solution!