Senior Leadership - Guardians of Research Integrity

*Recognising the importance of senior leaders for influencing good research practice and integrity within their institutions*

The recent International Research Integrity Survey (IRIS) data highlights the value of scholarly communities and local culture to UK researchers in terms of being an important source of research integrity-related information, across all academic disciplines and career stages, and as an important and valued source of professional recognition.*

UK researchers strongly identify themselves with their institution and department, indicating that research organisations and departments occupy a significant position of influence with their researchers, perhaps more than they recognise. This resonates strongly with the Vitae Landscape Study on Research Integrity (June 2020), where:

80% of researchers agree that it is their immediate research environment that drives them to achieve high levels of research integrity.

Such findings indicate that senior leaders in position of influence play a key role, albeit often less visible, as guardians of research integrity. They can inspire the younger generation and they influence their peers by leading by example.

**Core Principles of Research Integrity**

- Honesty
- Rigour
- Transparency and Open Communication
- Care and Respect
- Accountability

By embedding the core principles of research integrity into local institutional culture, they can ensure that this is not simply a “box-ticking” exercise but the only way of doing and teaching research on a daily basis.

The group of local senior leaders in the UK is diverse, ranging from research active University deans to institute directors and industry leaders.

Prof Robert Semple, Dean of Postgraduate Research and senior clinician-scientist at the University of Edinburgh, shares why it is important to have robust processes in place to ensure high quality supervision of research students, and a reward system that promotes such good practice:

“Doctoral training, the first substantive exposure to a research environment for many students, is a crucial formative period.

Students start as research idealists aiming to do good and enhance knowledge, and to effect sustained culture change. It is essential that their energy and idealism is not squandered through assessment practices and incentives that do not align with the best possible practice in research integrity.

Funders of doctoral programmes can exert influence through the terms of funding competitions, but HEIs themselves must also ensure that explicit consideration of open research and research integrity run through supervisor training and appraisal, thesis committee meetings, and student cohort activities. Imbuing students with detailed knowledge of open science will be among the best ways to drive behaviour change across academia.

As part of our research culture strategy, we highlight the importance of research integrity for a healthy research culture. For postgraduate researchers we provide training in both responsible research and innovation and research ethics which is mandatory for most PGR students already. Research ethics is also part of mandatory supervisor training. We cannot be complacent, however, and much is still to be done to ensure that everyone is on board this train of culture change, and that researchers are well-supported, independent of career stage.”

Prof Dario Alessi, Director of the MRC-PPU and senior principal investigator, is passionate about Open Research and works hard to make it the default way of operation across his institute. When asked why this is important to him, Dario says:

“This is key for reproducibility, for rapid sharing of results and knowledge advance. Ultimately, it benefits the public who fund our research.

Some of the things we do include making reproducible protocols openly available on www.protocols.io, sharing all of our reagents with the rest of the research community via our dedicated reagents website, discussing all our ongoing data and ideas openly and publishing all of our findings as preprints.

The MRC-PPU is widely known for its focus on the quality of the research, not where it is published, an aspect that is particularly appreciated by our early career researchers and which contributes to a positive and collaborative research culture. We encourage frank and open discussions about our research to ensure that considerations of research integrity and sound experimental design are part of everyone's work.”