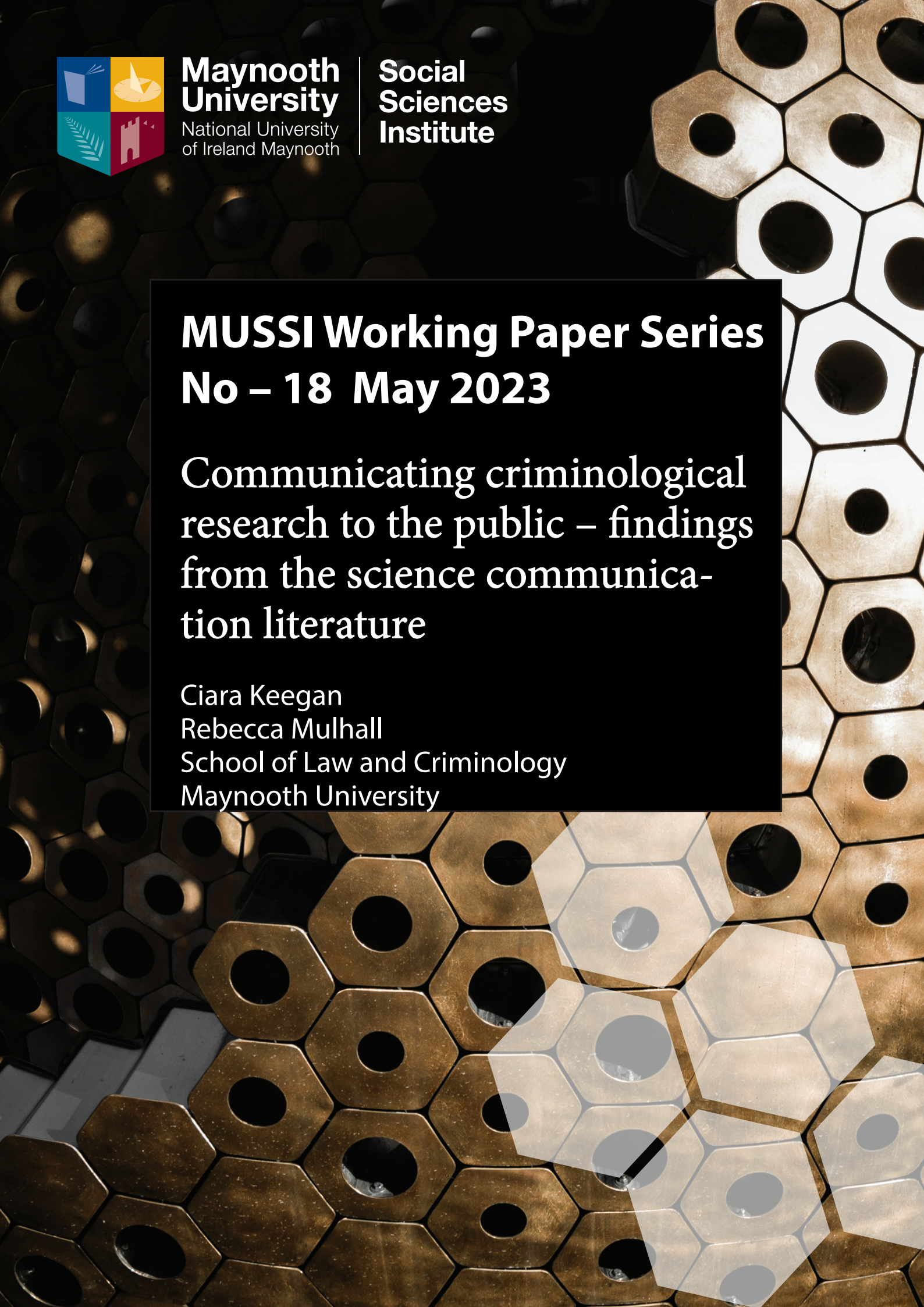

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Communicating criminological research to the public – findings from the science communication literature

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It is necessary to communicate the findings of social research to educate the public, challenge problematic beliefs and inform the political discourse (Uggen & Inderbitzen, 2010). In the field of criminology, this is essential given the highly political nature of criminal justice policy and the fact that criminological findings on how to meet needs and keep society safe are often complex, countercultural and counterintuitive to many. How best to do so, however, presents challenges to academics of all disciplines.

Research on science communication is burgeoning, finding common pitfalls around the framing of research communications, their visual and linguistic presentation, and the pedagogical techniques commonly employed. When communicating with the public,

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many educators rely on traditional lecturing methods, neglecting situated, discussion-based learning. Yet, the evidence suggests that traditional lecturing is not experienced as engaging and does not sufficiently hold learners' attention, rendering it ineffective. Rather, research consistently shows the benefits of facilitating independent learning and engaging learners dialogically to explore deeply held assumptions. Research pertaining to framing, meanwhile, shows that challenging existing narratives and justifying reform in relation to crime and justice requires careful consideration as to which findings and arguments are prioritised, and what types of language, values and metaphors are used.

This briefing argues that academics who wish to engage the public must explore and understand the research on methods of effective science communication, and consider its key messages in their instructional design, when seeking to inform public attitudes and discourse. Merely presenting scientific facts does not engage an audience's limited attention in a meaningful way; rather, educators should engage learners with different forms of information and enable them to undertake a self-directed learning process. This encourages independent, critical thinking, which research suggests is a much more rewarding and effective way of acquiring knowledge. We outline that criminologists who want to communicate research to the public should a) refrain from presenting statistics without also providing qualitative context and stories to illustrate their meaning, b) engage with the reframing literature when deciding which language to use and concepts to prioritise to challenge assumptions, and c) make space for situated learning, in which learners experience the social context behind the content.

Combining statistics and stories

Academics must consider how to present research findings effectively to challenge the audience's assumptions and understandings of a subject on a fundamental level (Uggen & Inderbitzen, 2010). Choices in the framing, visualisation and delivery of information is crucial, yet researchers often have trouble expressing their findings in ways that resonate with their target audience.

Studies of sociological and criminological public teaching and of communicating science suggest that the mere presentation of facts and statistics, despite their importance, fails

to encourage reflection and engagement, or challenges existing beliefs (Franker, 2020). The move towards ‘public criminology’ is a conscious shift towards amplifying the impact of criminological research on the public’s attitudes (Carrier, 2014). However, the findings criminologists obtain from rigorous quantitative and qualitative studies seldom resonate with the public when portrayed exclusively statistically or in abstract ways.

The public’s main sources of ‘information’ in modern society include social media, news networks and fiction (Nisbet & Mooney, 2007). Communicating complex and nuanced scientific findings to the public who may have limited experience with scientific sources of information requires a translational process to ensure that information is accessible and understandable. In this, the presentation of statistics alone is insufficiently contextualised to challenging stigmas, beliefs, and misconceptions already constructed within society (Fischhoff & Scheufele, 2013).

In cases where research findings do not align with public beliefs (which they often do not), statistics that contradict those beliefs will not have the desired educational effect without the support of a social context through case studies and stories. Equally, communicating to the public and relying only on anecdotal evidence and ‘intuitive teaching’ can create a misinformed bias about society and the social sciences involved (Fischhoff & Scheufele, 2013). This means that if an educator relied primarily on anecdotal evidence to make their argument, they run the risk of over-generalisation. This would be damaging to the public’s learning process and understanding of the issue at hand, given the wide variety of factors explaining human behaviour and justice responses. Instead, sociological arguments must combine statistics and examples to construct accurate and resonating arguments, rather than relying on either component alone.

Researchers face difficulties in every field when communicating their findings outside the academic sphere. Too often, they neglect the importance of reaching publics that would benefit from their knowledge, or could apply them to social policy, culture, and economics (Greenfield, 1992). Higher education needs cultural change to prioritise applying scientific findings to law, public policies, and service delivery beyond tertiary institutions.

Greenfield argues the benefits of highlighting the importance of applying statistics towards such a change in culture within business, economics and science. Social sciences are no

different. A limited amount of research exists regarding the delivery of research findings in the discipline of criminology to the wider public. However, much can be inferred from the success of those contextualising statistics in the realm of administrative criminology. Although administrative criminology has been criticised for its politicised approach and 'comparative lack of theoretical thrust,' it has seen success in delivering information on topics such as situational crime prevention (Mayhew, 2016). The approach incorporates task-focused thinking with statistical research methods, and contextualised analyses of policing methods that research showed to be ineffective. 'Crime reduction programmes' (CRPs) taught to police officers, for example, showed that situated policing, a suggestion made through the CRP, gained positive results in America and the UK (Mayhew, 2016). Most importantly for our purposes, the way in which information was presented allowed for a deeper understanding and application of the information into their practices, resulting in the perception that CRPs were groundbreaking and the most ambitious effort to reduce crime thus far. This exemplifies how effective teaching about criminal justice reform must be embedded in societal context to be convincing.

Reframing

Reframing is about recognising that the language we use to talk about crime can affect people's support for progressive change. It involves a careful process in which those who seek to change attitudes must select their language, arguments, metaphors and values carefully, and in alignment with research on which approaches can help build acceptance for criminal justice reform (Transform Justice, 2023).

Reframing plays a vital role in criminological education as the many social constructions and social issues that help explain and contextualise the level and nature of crime, why people commit crime and social responses to victimisation are simplified and reified over time. This creates a stigma around certain issues and people, and a set of assumptions which can be difficult to break down, and which are contrary to research findings about the causes of crime and how best to respond to crime in order to keep people safe and organise the justice process in a fair and humane manner.

For instance, in the UK, a commonly held belief is that people carry knives with them for protection and safety. However, this belief has not contributed to evidence-based policy reform or to lowering the levels of knife crime in the UK. Harding (2020) seeks to reframe the contemporary narrative behind the reasons people feel the need to carry weapons, moving away from the common narrative of protection and safety by examining social influences. Harding suggests that the use of knives make people appear more "authentic" on the street and gives them a dominance perceived as desirable in their social circles. Reframing the motivations for carrying knives can help construct arguments for policies to tackle this issue that account for the empirically verified overlap between victimisation and offending (Harding, 2020). The assumptions we hold about criminal justice emerge from years of regular exposure to them. Exposure to new ideas in an educational context represents a significant opportunity to propose alternative perspectives and narratives, without necessary 'myth busting' existing ones.

Assumptions that people make about crime and justice have been instilled from a young age, such as that punitive sentencing deters people from offending – something we know is untrue from decades of criminological research. Reframing could help criminological educators find new ways to discuss counter-intuitive criminological findings, such as the need to reduce the use of prisons and the null or negative effect that prisons actually have on people in custody and on their reoffending rates. People often believe the prospect of punishment will deter people from committing crimes and that the harsher the punishment the least likely a person is to reoffend. If an educator triggers an individual's faith in deterrence, they may call for harsher punishments for offenders, even if presented with information and statistics that would contradict this. Rather than necessarily seeking to dispel these myths, which risks triggering these beliefs, reframing asks educators to trigger others commonly held values around the importance of rehabilitation (Transform Justice, 2017). Framing theory focuses on the importance of language: certain words and arguments trigger beliefs that restrict learners from taking in contrary information. Thus, we need not engage with every argument, but we can prioritise arguments based on the research findings regarding which beliefs are most valuable to trigger.

Transform Justice 2020, 2023) further demonstrate the importance of avoiding jargon and dismantling myths and labels when discussing criminal justice with the public. The

use of jargon in nonprofessional settings potentially isolates people who do may not understand the words used, or who may not have English as their first language.

Accessible language helps people better to understand the topics being discussed. The use of repetition is also vital when getting information across to people. It is important to avoid the repetition of already deep-rooted unhelpful ideas, as every time it is used, the meaning is reinforced. It is equally important to repeat ideas that you aim to reinforce in the minds of the target audience. When discussing topics such as criminal justice, avoid labels that can potentially create division among people and conjure up negative frames that people may already have. Instead, use person-centred language, such as by replacing the label of 'offender' with 'person who has committed a crime' and the word 'addict' with 'person living with addiction'.

People should be supported to connect emotionally with the messages being presented to them. The use of values as ways to understand the reasoning or the "why" behind the message allows people to form this connection. In relation to communicating criminal justice reform, three values have been tested and showed positive results: that national progress is the ultimate goal of criminal justice reform; human potential, which highlights how every individual can contribute to society; and problem solving, which shows how the changes presented are achievable, practical and sensible. Using anecdotes alone can potentially weaken the impact of the message when not combined with scientific findings, as stated (Batur & Cakiroglu, 2014). A combined narrative, using both anecdotal stories and statistics, thus provides a deeper understanding.

One example of successful reframing is seen in the academic article *Reframing climate change as a public health issue: an exploratory study of public reactions* (Maibach et al, 2010). This study suggested that discussing climate change using a novel frame, in this case human health, can enhance public engagement with the topic. The authors studied reactions to a public health-framed essay about climate change. They concluded that the public responded more positively to the paper that was public health-framed, specifically to information about the health benefits of specific mitigation-related policy actions, than other papers on climate change. The process of reframing the topic of climate change as being a public health issue made the information more personally relevant to the public,

leading to better understanding and engagement than when only discussing the natural or planetary consequences of climate change (Maibach, 2010). The readers gained an emotional and personal connection to these materials, which still highlighted the bigger, globalised picture of climate change.

Situated learning

A successful method of communicating scientific information is situated learning. Situated learning refers to the relationship between the learning process and the environment in which it occurs (Lave, 1991). Such environments typically include the classroom, but also places where learners can undertake work placements, conduct interviews relating to the topic, and, in the case of criminal law and justice, participate in mock trials. According to Mandl and Kopp (1996), situated learning can help challenge learners' values and beliefs through independent learning. In other words, critical, emotional and self-directed learning may be more possible in contextualised environments.

Learners are only capable of paying attention to a small portion of their environment at a given time, making attention a limited resource for learners and teachers alike (Lupia, 2012). When communicating information, learners may focus on the speaker more than the information itself: *who* rather than *what*. Furthermore, the public becomes divided due to media influences and communicating science becomes lost in translation, due to public attention being pulled towards fiction and anomalies, rather than trends and big pictures.

Situated learning combats these obstacles by helping learners fully engage and critically reflect on their existing beliefs through interactive learning. One study aimed to encourage criminology students to engage with materials and lessons beyond the classroom (Israel, 1997). Students were tasked with conducting qualitative interviews with people who were recently involved in the criminal justice system. This replaced passive classroom learning with a distinctly independent and active learning, enabling 'independent thought, problem solving, and developing their abilities to obtain and manage information' (Israel, 1997: 143). The study reported that the students and lecturer developed a different dynamic, wherein the students were not being taught information as novices by an expert, but the lecturer became a 'resource' that students could use for guidance, while remaining critical

and independent thinkers. Students were better able to retain the information and apply it within a professional setting, reporting the experience to be beneficial and enjoyable. Similar results were seen in the delivery of information about the criminal justice system by getting students involved in mock trials, as in a study by Ivkovic and Reichel (2016). After learning about both inquisitorial and adversarial legal procedures, students reported that the experience was informative, enjoyable and advanced their learning. They also felt that they could retain and apply the information to their environment, wherein passive learning often resulted in loss of attention during teaching (Ivkovic & Reichel, 2016).

Experiential learning achieves a deeper understanding of topics. Dialogues, discussion-based teaching and situated learning yields effective learning and increases motivation and performance (Flynn & Klein, 2001). One of us had personal experience with situated learning within our master's, visiting a male prison and conducting a dialogue with justice-involved individuals on the landing. The experience involved these individuals sharing their stories and experiences of the justice system and their progression through it. The experience was very valuable and offered great insight into our penological education by allow us to feel it and apply it in a real-life environment.

Conclusion

This briefing shows how traditional teaching and lecturing methods may fail to challenge public beliefs regarding crime and justice. Without careful consideration of pedagogical and science communication literatures, academics risk defaulting to the presentation of facts without stories and context, which is disengaging and inaccessible. Criminologists and educators in other disciplines alike should explore the reframing literature to consider the different narratives that can be utilised in public education. Reframing techniques such as engaging strategically with alternative narratives can help challenge popular beliefs. Research finds that learning experiences are much more rewarding when interacting with information beyond the classroom in a meaningful way. Educators should also consider situated learning to help their learners understand, apply and contextualise their learning.

Overall, it is imperative for educators to move away from conventional teaching methods such as didactic lecturing, and towards research-informed approaches, if they hope to communicate their knowledge to the public in way that can inform wider attitudes.

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