

Institution: University of Stirling

Unit of Assessment: A4 Psychology, Psychiatry and Neuroscience

Title of case study: Changing Policy And Practice In The Prevention Of Suicide And Self-Harm

**1. Summary of the impact:** Our research has made an outstanding contribution to the policy and practice of Health bodies acting to prevent suicide and self-harm. Research conducted within the Suicidal Behaviour Research Laboratory (SBRL) has systematically examined the causal antecedents of self-harm and risk of suicide, leading to the creation of a new theoretical model of suicide that: (1) has substantially informed new public policy, including the National Institute for Health and Care Excellence's (NICE) and Royal College of Psychiatrists' (RCP) Clinical Guidelines on the management of self-harm and suicide risk, and; (2) has demonstrably altered practice, both Nationally and Internationally, via the development of assessment tools specifically designed to identify those who are at greatest risk of psychological distress, self-harm and suicide.

**2. Underpinning research:** There is no doubt that suicide and self-harm (one of the most robust predictors of suicide) are significant societal problems with substantial personal and economic consequences – estimates suggest that each suicide costs £1,290,000 (see <u>goo.gl/z5AYgz</u>). Suicide is a large-scale problem, killing approx. 1 million people *per annum* globally, leading suicide to be the leading cause of death among young and mid-life people in some countries: for example, Scotland has the highest rate of suicide in the UK, and rates of self-harm in the UK are among the highest in Europe. Consequently, the prevention of suicide and self-harm are key public policy priorities for most Western governments, including all UK legislative bodies. Although there is widespread agreement that action is required, it is equally clear that suicide and self-harm are complex multi-cause problems that have proved resistant to public intervention for many years. To date, no Government has been able to demonstrate that their National suicide prevention strategy has directly led to a reduction in suicide. Consequently, within the public health arena there is now a consensus that, to maximise their effectiveness, government policies *must* be informed by high-quality research evidence. Here we detail two key types of evidence from the SBRL that have had clear and demonstrable Impact on Government policy and practice Nationally and Internationally.

First, research in SBRL identified the scale of adolescent self-harm in Scotland for the first time: we conducted the first, large-scale, representative study of adolescent self-harm in the UK and identified the key risk factors associated with adolescent self-harm<sup>1,2</sup>. Second, and more broadly impacting on the UK and Internationally, over the last 15 years we have been arguing that to better understand suicide risk and, therefore, to prevent suicide, research needs to identify the proximal mechanisms that translate distal risk factors into suicidal behaviour. For example, take mood disorders, a distal risk factor: although mood disorders are important correlates of suicidal behaviour they are not sensitive enough to differentiate between the vast majority of people with mood disorders who do not die by suicide and those who do (<5% of those with depression).

In terms of psychological theory our research has moved beyond psychiatric disorder explanations by identifying the psychological mechanisms that make it more likely that, for example, one particular individual with depression is at greater risk of attempting suicide than someone else with depression. To accomplish this, we focused on personality and cognitive risk factors, recently described in the new Integrated Motivational–Volitional model of suicidal behaviour (IMV; see Figure 1 left-hand panel) and conceptual model of rural suicide<sup>3-6</sup>. The IMV model provides a map of the proximal risk factors (e.g., perfectionism, rumination, defeat, entrapment) that explain when distal risk will be translated into suicidal behaviour. Notably, our research suggests perfectionism should be considered a key factor when assessing risk of suicide<sup>3,4</sup>). Indeed, our findings highlight the need for policy and practice to explicitly address how we equip young people (e.g., in schools) to manage their expectations, and those of others, and we demonstrated the need to ensure that perfectionism is included in risk assessment protocols. As a result, attention to such factors is now included in key policy documents and incorporated into risk assessment tools (cf. Section 4).

Over many years, we have conducted a programme of research to investigate the causes of suicidal behaviour, developing new diagnostic assessment tools, funded by a range of sources: between 2003 (when SBRL was established) and 2013, our research to identify the proximal



mechanisms of suicide has been supported Nationally and Internationally (£3-4 million from ESRC, MRC, NHS and UK and US Governments). The SBRL was led by Rory O'Connor (developing from Senior Lecturer to Professor) between 2003 and 2013 at Stirling. Other personnel within Psychology have also contributed to this programme of research, notably O'Carroll (2003-2013).

## 3. References to the research:

- O'Connor, R.C., Rasmussen, S., Miles, J., & Hawton, K. (2009a). Self-harm in adolescents: self-report survey in schools in Scotland. *British Journal of Psychiatry*, 194, 68-72. [Scopus citation = 40; JCR IF 2011 = 6.606; 7/130 Psychiatry]
- O'Connor, R.C., Rasmussen, S., & Hawton, K. (2009b). Predicting deliberate self-harm in adolescents: a six month prospective study. *Suicide & Life-Threatening Behavior*, 39, 364-375. [Scopus citation = 12; JCR IF 2011 = 1.333; 45/125 Psychology, Multidisciplinary]
- O'Connor, R.C. (2011). Towards and Integrated Motivational-Volitional Model of Suicidal Behaviour. In R.C. O'Connor, S. Platt, & J. Gordon (Eds.). *International Handbook of Suicide Prevention: Research, Policy & Practice* (pp.181-198). Chichester: Wiley-Blackwell.
- 4. O'Connor, R.C., Rasmussen, S., & Hawton, K. (2012). Distinguishing Adolescents Who Think About Self-harm From Those Who Engage in Self-harm. *B. J. of Psychiatry*, 200, 330-335. [Scopus citation = 3; JCR IF 2011 = 6.606; 7/130 Psychiatry]
- 5. Stark, C., Riordan, V., & O'Connor, R.C. (2011). A conceptual model of suicide in rural areas. *Rural and Remote Health*, 11: 1622.
- [Scopus citation = 5; JCR IF 2011 = 0.979; 114/158 Public, Envir. & Occupational Health] **6.** O'Connor, R.C. & Noyce, R. (2008). Personality & cognitive processes: Self-criticism, different types of rumination as predictors of suicidal ideation. *Beh. Res. & Therapy*, 46, 392–401. [Scopus citation = 20; JCR IF 2011 = 3.295; 12/110 Psychology, Clinical]
- 7. O'Connor, R.C. (2007). The relations between perfectionism and suicidality: A systematic review. *Suicide and Life-Threatening Behavior*, 37, 698-714.

[Scopus citation = 28; JCR IF 2011 = 1.333; 45/125 Psychology, Multidisciplinary]

Table 1. Funding awarded competitively via full peer review to O'Connor as PI or Co-I

| Funding body - Pls   | Year    | Amount           |   |
|--|---------|------------------|---|
| Chief Scientist Office, Health<br>Department – O'Connor (PI) with<br>Armitage (Uni. Sheffield), Smyth (Royal<br>Infirmary of Edinburgh), Beautrais (Uni.<br>Auckland) & McDaid (LSE)                 | 2012-15 | £224K            | A volitional helpsheet to<br>reduce self-harm: A<br>randomised trial.   |
| US Department of Defense Basic<br>Research Award – O'Connor (PI) with<br>O'Carroll (Uni. Stirling), D O'Connor (Uni.<br>Leeds), Ferguson (Uni. Nottingham) &<br>Smyth (Royal Infirmary of Edinburgh) | 2012-15 | \$2.9<br>million | Study To Examine<br>Psychological Processes in<br>Suicidal ideation and behavior<br>(STEPPS).                                     |
| National Institute of Health Research<br>Programme Grant – O'Connor (Co-I)<br>with Gunnell (Uni. Bristol), Kapur (Uni.<br>Manchester) & Hawton (Uni. Oxford)   | 2012-17 | £1.75<br>million | A multi-centre prog. of clinical<br>& public health research to<br>guide service priorities for<br>preventing suicide in England. |
| Northern Ireland Government –<br>O'Connor (PI) with Rasmussen (Uni<br>Strathclyde), Hawton (Uni Oxford) &<br>Conachy (Uni. Belfast)  | 2008-09 | £79K             | Lifestyle and Coping Survey in Northern Ireland.  |
| <i>GL Assessment</i> – O'Connor (PI) with S<br>O'Connor, Carney & House (NHS<br>Ayrshire & Arran) & Ferguson (Uni.<br>Nottingham)  | 2008-10 | £99K             | Development and Evaluation<br>of the Paediatric Anxiety and<br>Depression Inventory.  |
| Chief Scientist Office, Health<br>Department – O'Connor (PI) with  | 2007-10 | £224k            | The role of psychological factors in predicting short-term  |

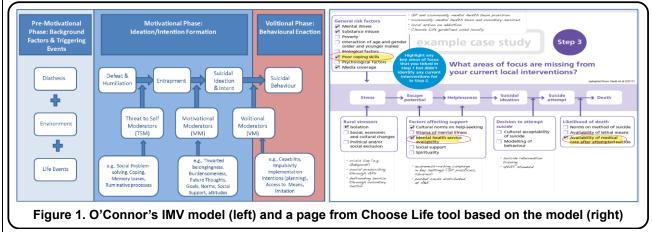


| Williams (Uni. Oxford), Masterton (Uni.<br>Edinburgh) & Smyth (RI of Edinburgh)  |         |       | outcome following suicidal behaviour.  |
|--|---------|-------|--|
| NHS Scotland, West of Scotland<br>Research Consortium – O'Connor (PI)<br>with Bradley (NHS Forth Valley) &<br>Rasmussen (Uni. Stirling).             | 2006    | £25K  | Understanding parasuicide<br>from the suicidal person's<br>perspective and a test of a<br>psychological model. |
| <i>Economic &amp; Social Research Council</i><br><b>Research Grant – O'Connor (PI)</b> with<br>Masterton & MacHale (Royal Infirmary of<br>Edinburgh) | 2005-06 | £46K  | Predictors of Suicidality:<br>Towards an Integrated<br>Motivational Model.                                     |
| Choose Life/Stirling Council Research<br>Grant – O'Connor (PI)   | 2006-07 | £7.5K | A survey of young people's experiences, beliefs and well-<br>being in Stirling.                                |

**4. Details of the impact:** The SBRL's research programme has had extensive National and International reach. In this case study, we outline three distinct types of Impact, on: (i) government policy, (ii) development of clinical guidelines for the management of self-harm and suicide risk, and (iii) using theory to inform practice in terms of the identification and assessment of risk.

First, SBRL's research<sup>1,2,3,5</sup> has informed the development of National policy to prevent suicide and self-harm. In Scotland, SBRL's research<sup>1,2</sup> highlighted the scale of adolescent self-harm in Scotland for the first time and the key risk factors associated with self-harm and its repetition<sup>A</sup>. The former, a large study of a representative sample of 15-16 years (N>2,000), was the most comprehensive study of its kind ever to be conducted in Scotland. In Northern Ireland, in addition to O'Connor being asked to address the Northern Irish Government's 2007 Inquiry into the Prevention of Suicide & Self-harm, SBRL's research on rumination and entrapment (key components of O'Connor's Integrated Motivational-Volitional model of suicide<sup>4</sup>) was cited by others in evidence to the Inquiry including the submission by the Methodist Church in Ireland<sup>B</sup>.

In terms of having a direct impact on Government Policy on suicide and self-harm, SBRL's research<sup>1,2,3,5</sup> has informed development of policy in Scotland & Northern Ireland by highlighting the scale of self-harm, as well as identifying key risk factors and high risk groups. Importantly, SBRL's research is cited in all the key policy documents<sup>C,D,E</sup>. Indeed, one of the specific objectives (SO1) in the Scottish Government's Responding to Self-harm in Scotland Report<sup>C</sup> highlights training in schools, this was a key recommendation from SBRL's research<sup>1,2</sup>. More recently, the Scottish Government has launched a national guide to help NHS and Councils reduce risk of suicide among people living in rural areas (Fig 1 shows correspondence between model and tool). This guide and toolkit<sup>F</sup> would not have been possible without our research and that of our collaborators<sup>3,5</sup>.



Similarly, one of the recommendations in the Northern Ireland Suicide Prevention strategy review<sup>E</sup> (Section A. Population Approach. Action Area: Children & Young People) is to promote positive mental health and emotional literacy in schools. This includes citation of SBRL's research<sup>1,2</sup>. Our research is routinely employed by Non-Governmental Organisations, e.g., Scottish Association of Mental Health's submission to United Nation's Office of the High Commissioner for Human Rights'



Committee on Economic, Social & Cultural Rights<sup>G</sup> cited our work on adolescent self-harm<sup>1,2</sup>.

Second, SBRL's research has informed the development of the key National Clinical Guidelines on the management of self-harm, including the National Institute for Health and Care Excellence (NICE) guidelines for the longer-term management of self-harm (2011)<sup>H</sup>. The NICE guidelines are the gold standard recommendations for clinical care throughout the NHS, and in all local authorities. Moreover, NICE guidelines are recognised Internationally as a model of research-informed clinical excellence, raising standards worldwide. Within the UK all professional and care workers engaging with people who self-harm should adhere to these guidelines because they describe the optimal clinical care based on the best quality International research evidence. Our research<sup>1,2,3</sup> on the prevalence of self-harm and the associated risk factors, causes and motives for self-harm is cited within the NICE guidelines, as well as in the Royal College of Psychiatrists' clinical guidelines on "Self-harm, suicide and risk: helping people who self-harm" (2011)<sup>I</sup>.

Third, our research has informed practice, notably by informing advances in the identification and assessment of suicide risk. For example, the Suicide Assessment and Treatment Pathway guidelines (2009) developed in Scotland<sup>J</sup> highlight perfectionism as a key risk factor, citing our research<sup>7</sup> as the sole evidence. The pathway guidelines assist staff within the NHS, local authorities and the third sector in the assessment of people at risk of suicide, and to provide appropriate and timely treatment. Our work<sup>1,2</sup> is also included in the training of psychiatrists who are at the frontline of suicide prevention efforts (goo.gl/NKU28t). This work<sup>1,2</sup> is also used by social enterprises; for example, HarmLESS Psychotherapy (goo.gl/UrVTwE), which was set up in 2010 to raise awareness about the issues which affect people who self-harm cite our research. Importantly, our research has International reach, as evidenced by US Defence agency funding (cf. Table 1). Equally, a US University has developed a range of diversity-specific resources as part of a suicide prevention initiative, again highlighting the role of perfectionism<sup>K</sup>. Our IMV model has also been adopted by Lifeline Australia (a national charity which provides access to 24 hour crisis support and suicide prevention services across Australia), citing our research as a key influence on their Lifeline Service Model (goo.gl/BNcjMV). Our research also informed the Samaritans' media and public education UK-wide campaign targeted at mid-life men from disadvantaged backgrounds<sup>L</sup>.

**5. Sources to corroborate the impact:** The names and details of five contacts are provided – these individuals can corroborate the impact. Additional evidence cited above includes:

A. Scottish Government Health & Sport Committee Official Report, 2009: <u>goo.gl/8CCxAk</u> Scottish Government Child & Adolescent Mental Health & Wellbeing Debate, 2010: <u>goo.gl/w8vPBL</u>

Scottish Executive Question Time, Suicide (Young People), 2010: goo.gl/g0GKEQ

- **B.** NI Executive Committee for Health, Social Services & Public Safety. Official Report (Hansard). Inquiry into the Prevention of Suicide & Self-harm. UK Government, 2007: <u>goo.gl/Hwppde</u>
- **C.** Responding to Self-harm in Scotland Final Report. Mapping out the next steps of activity in developing health improvement approaches. Scottish Government, 2010: <u>goo.gl/xwTP2w</u>
- D. Refreshing the National Strategy and Action Plan to Prevent Suicide in Scotland. Report of the National Suicide Prevention Working Group. Scottish Government, 2011: <u>goo.gl/7Ax6Np</u>
- **E.** Review of the evidence base for Protect Life A shared vision: The Northern Ireland Suicide Prevention Strategy. NI Government, 2010: <u>goo.gl/ZMPJRB</u>
- F. Scottish National guide on suicide prevention in rural areas, 2013: goo.gl/ZHM6fO
- **G.** Scottish Association of Mental Health's submissions to the United Nation's Committee on Economic, Social and Cultural Rights, 2009: <u>goo.gl/XVNMXD</u>
- H. National Institute of Health and Clinical Excellence. Clinical Guidelines on the Longer-Term Management of Self-harm, 2011: <u>goo.gl/DKtcpo</u>
- I. Royal College of Psychiatrists' Report 'Self-harm, suicide and risk: helping people who selfharm', 2011: <u>goo.gl/2ePDG1</u>
- J. Suicide Assessment and Treatment Pathway. Supporting Guidance developed jointly by Choose Life (Scottish National Suicide Prevention Strategy), NHS Lanarkshire, North and South Lanarkshire Council: <u>goo.gl/t5lBy3</u>
- K. Nova SouthEastern University Office of Suicide and Violence Prevention, 2009: goo.gl/ZG9P8e
- L. Samaritans Media Campaign, 2012: <u>goo.gl/m0zkD4</u>