







Royal United Services Institute for Defence and Security Studies

Countering Lone-Actor Terrorism Series No. 4

Lone-Actor Terrorism

Analysis Paper

Clare Ellis, Raffaello Pantucci, Jeanine de Roy van Zuijdewijn, Edwin Bakker. Benoît Gomis. Simon Palombi and Melanie Smith



About this Paper

This paper is the fourth publication in the Countering Lone-Actor Terrorism (CLAT) project, which aims to improve understanding of, and responses to, the phenomenon of (potentially) violent lone actors through analysis of comprehensive data on cases from across Europe. The eighteen-month project is co-funded by the Prevention of and Fight against Crime Programme of the European Union, and has been undertaken by a RUSI-led consortium. Partnering institutions include Chatham House, the Institute for Strategic Dialogue (ISD) and Leiden University, one of the founding organisations of the International Centre for Counter-Terrorism (ICCT) at The Hague.

The project is grateful for the additional support received from the Dutch National Coordinator for Security and Counterterrorism (NCTV). It also acknowledges the support of associate partners, the Association of Chief Police Officers (ACPO, now the National Police Chiefs' Council, NPCC) in the UK and the Polish Institute of International Affairs (PISM).

Analysis Paper

Clare Ellis, Raffaello Pantucci, Jeanine de Roy van Zuijdewijn, Edwin Bakker, Benoît Gomis, Simon Palombi and Melanie Smith

Countering Lone-Actor Terrorism Series No. 4









Over 180 years of independent defence and security thinking

The Royal United Services Institute is the UK's leading independent think-tank on international defence and security. Its mission is to be an analytical, research-led global forum for informing, influencing and enhancing public debate on a safer and more stable world.

Since its foundation in 1831, RUSI has relied on its members to support its activities, sustaining its political independence for over 180 years.

London | Brussels | Nairobi | Doha | Tokyo | Washington, DC

The views expressed in this publication are those of the author(s), and do not reflect the views of RUSI or any other institution.

Published in 2016 by the Royal United Services Institute for Defence and Security Studies.



This work is licensed under a Creative Commons Attribution – Non-Commercial – No-Derivatives 4.0 International Licence. For more information, see http://creativecommons.org/licenses/by-nc-nd/4.0/.

RUSI Occasional Paper, February 2016. ISSN 2397-0286 (Online).

Royal United Services Institute

for Defence and Security Studies
Whitehall
London SW1A 2ET
United Kingdom
+44 (0)20 7747 2600
www.rusi.org

RUSI is a registered charity (No. 210639)

Executive Summary

ONE-ACTOR TERRORISTS ARE perceived as presenting acute challenges for law-enforcement practitioners in detection and disruption. By definition, they act without direct command and control from a wider network, and it is assumed that without such communications they may evade the 'tripwires' that would usually bring them to the attention of the authorities. The Countering Lone-Actor Terrorism (CLAT) project aims to investigate this assumption. Through the construction and analysis of a database of 120 lone actors from across Europe, it seeks to improve understanding of lone-actor terrorists, their behaviour and their activities in the period leading up to intended attacks.

Methodology

Defining 'Lone-Actor Terrorism'

Although the term 'lone-actor terrorism' is often used, there remains significant disagreement regarding its interpretation. Rather than seeking to settle ongoing debates on these issues, a working definition was established for the purposes of this project:¹

The threat or use of violence by a single perpetrator (or small cell), not acting out of purely personal-material reasons, with the aim of influencing a wider audience, and who acts without any direct support in the planning, preparation and execution of the attack, and whose decision to act is not directed by any group or other individuals (although possibly inspired by others).

This working definition was broken down into specific inclusion criteria. In order to be included in the database there must be evidence to indicate that each of these criteria has been met. Absence of evidence to the contrary is insufficient. While this may mean that some cases of lone-actor terrorism are omitted, this approach reduces the possibility of contamination by cases that fall outside the definition and therefore increases the validity of subsequent analysis.

Data Collection and Coding

The CLAT database captures instances of lone-actor terrorism – both plots and attacks – across thirty European countries (EU member states, in addition to Norway and Switzerland) between 1 January 2000 and 31 December 2014. In the first instance, the Global Terrorism Database was used to find possible cases;² these were then investigated through news reporting to

^{1.} For further discussion regarding this definition and how it was established, see Edwin Bakker and Jeanine de Roy van Zuijdewijn, 'Lone-Actor Terrorism: Definitional Workshop', *RUSI Occasional Paper* (December 2015).

^{2.} National Consortium for the Study of Terrorism and Responses to Terrorism (START), 'Global Terrorism Database', 2015, https://www.start.umd.edu/gtd/, accessed 22 February 2016.

determine whether they met the project criteria for inclusion. This was followed by additional internet searches, in English and local languages, using broad search terms to identify any further examples. Finally, country experts were contacted to verify that relevant cases had been identified, thereby ensuring the database was as comprehensive as possible.

Guided by the CLAT literature review,³ the researchers identified subject areas and issues to be investigated by the project; variables were then created to capture the information required, with coding guidance detailed in a project codebook to ensure consistency across the research teams. Double-coding exercises were also conducted, with different teams coding the same cases to highlight and eliminate any difference in practice.

To record the ideology of lone-actor terrorists, the project adopted the categories used by Europol in its 'Situation and Trend' reports.⁴ In cases where the perpetrator appeared to have taken inspiration from multiple ideologies, the case was coded as 'other'.

Limitations

Despite extensive effort by the research team, the CLAT database does not contain every lone-actor terrorism plot during the period studied. First, not all plots are in the public domain, especially where they have been abandoned or disrupted by the authorities at an early stage. Second, there are variations across Europe in the way incidents are perceived and reported; for example, some incidents may be reported as a 'hate crime', but meet the criteria for inclusion in the CLAT database. The research team took steps to compensate; however, some cases will undoubtedly have been missed.

There are also some important limitations to the data due to the use of open-source reporting. First, complete information is not always available, leading to a number of variables featuring high levels of 'unknown' entries. For some variables, this unavoidably limited the analysis that could be conducted and the strength of the conclusions that could be drawn. Second, there is an inevitable element of reporting bias: whether information is publicly available may depend on whether it was interesting to the journalists investigating the story. Finally, the research teams faced particular challenges in finding open-source information in relation to mental-health issues.

Analysis

Four thematic areas were identified for analysis: attack methodology and logistics; political engagement and online activity; personal characteristics; leakage and interactions with authorities. Due to the limitations of the data, the consortium agreed that the data-set did not support detailed and sophisticated quantitative analysis. Instead, more

^{3.} Raffaello Pantucci, Clare Ellis and Lorien Chaplais, 'Lone-Actor Terrorism: Literature Review', *RUSI Occasional Paper* (December 2015).

^{4.} See Europol, European Union Terrorism and Situation Trend Report 2015 (The Hague: Europol, 2015).

limited quantitative analysis was used to explore the data and highlight key trends; these were subsequently explored in greater detail through examination of case information.

Key Findings

Process Variables: Attack Methodology and Logistics

- Of the seventy-two successfully launched attacks recorded in the database, religiously inspired attacks were the most frequent at 38 per cent, but caused only 8 per cent of fatalities; right-wing terrorist attacks were more lethal, accounting for 24 per cent of launched attacks but 48 per cent of fatalities
- The most frequent targets were civilians, in particular ethnic and religious minorities, asylum seekers and immigrants. A large majority of religious targets were Muslim
- Explosives resulted in only 4 per cent of fatalities, contrasting sharply with firearms which accounted for 89 per cent
- Lone-actor terrorists with military training or experience were, on average, more lethal than their untrained counterparts, accounting for 19 per cent of perpetrators but 29 per cent of fatalities.

Process Variables: Political Engagement and Online Activity

- Religiously inspired and right-wing perpetrators account for three out of four lone-actor terrorists in Europe over the past fifteen years (religiously inspired 38 per cent; right wing 33 per cent)
- The majority of lone-actor terrorists communicate their motivations orally or through internet postings; very few write detailed manifestos (only 13 per cent)
- The majority of lone-actor terrorists (58 per cent) did not exhibit signs of political engagement. However, of those that did, right-wing lone actors were more likely to be active in political movements than those motivated by religion
- Approximately two-thirds of lone actors had never been active within an extremist group; however, where links were found, 65 per cent were with groups known to advocate or at least condone violence
- For lone actors who were active online, mainstream social media was the most popular medium for communication. More broadly, the Internet was used for downloading training material and conducting basic reconnaissance.

Personal Variables: Personal Characteristics

Religiously inspired and right-wing ideologies present very different age profiles: the
majority of religiously inspired perpetrators were younger than twenty-five years old,
with the number of perpetrators declining as age increased; this is in direct contrast to
right-wing lone-actor terrorists where the majority were at least forty years old

• The findings indicate a possible link between social isolation and mental-health disorders; this was particularly pronounced in the case of school shooters

- Religiously-inspired perpetrators were seldom socially isolated
- Where legally owned firearms were the weapon chosen for attack, there was an indication of mental-health disorder in 53 per cent of perpetrators.

Process Variables: Leakage and Interactions with Authorities

- Of lone-actor terrorists recorded in the database, 34 per cent exhibited a change in behaviour. These changes were more prevalent within the religiously inspired category where 50 per cent of perpetrators exhibited this potential indicator, in contrast to only 15 per cent of right-wing terrorist plotters
- Of perpetrators, 46 per cent exhibited 'leakage' giving an indication of either their extreme views, intention to act or even some attack details in advance
- Of the religiously inspired perpetrators that exhibited leakage, 45 per cent 'leaked' to friends or family, in contrast to only 18 per cent of leakage by right-wing perpetrators. Right-wing lone-actor terrorists were more likely to post telling indicators online, where 41 per cent of their leakage occurred
- Excluding cases where a perpetrator was identified during (or immediately following) an incident, 40 per cent of right-wing extremists were uncovered by an element of chance for example, as part of an investigation into other offences or because the perpetrator accidentally detonated a device.

Conclusion

Analysis of the CLAT database reaffirms a key assertion from the literature review: there is no consistent profile for a lone-actor terrorist. However, systematic analysis of cases from across Europe has provided valuable insights into the scale of the threat, the ways in which it is most likely to manifest, and the activities of lone-actor terrorists in the period leading up to the attack. The policy implications of these findings will be explored in detail within dedicated papers in the CLAT series:

- 1. 'Lone-Actor Terrorism: Policy Paper One: Personal Characteristics of Lone-Actor Terrorists'
- 2. 'Lone-Actor Terrorism: Policy Paper Two: Attack Methodology and Logistics'
- 3. 'Lone-Actor Terrorism: Policy Paper Three: Motivations, Political Engagement and Online Activity'
- 4. 'Lone-Actor Terrorism: Policy Paper Four: "Leakage" and Interaction with Authorities'.

ONE-ACTOR TERRORISTS ARE perceived as presenting acute challenges for law-enforcement practitioners in detection and disruption. By definition, they act without direct command and control from a wider network, and it is assumed that without such communications they may evade the 'tripwires' that would usually bring them to the attention of the authorities. The Countering Lone-Actor Terrorism (CLAT) project aims to investigate this assumption. Through the construction and analysis of a database of 120 lone-actor cases from across Europe, it seeks to improve understanding of lone-actor terrorists, their behaviour and their activities in the period leading up to intended attacks.

This paper presents the key findings from analysis of the CLAT database. Given the extensive nature of the enquiries conducted, the results from every test are not recorded here; instead this paper offers a comprehensive outline of the most interesting — and policy-relevant — findings. It is structured as follows: the first section outlines the methodologies used in data collection, coding and analysis, in addition to discussing the limitations of the research. Sections two to five present findings from the analysis within the following themes: attack methodology and logistics; political engagement and online activity; personal characteristics; leakage and interactions with authorities. The final section outlines the next steps in taking these findings and producing recommendations for policy-makers and practitioners.

Methodology

Defining 'Lone-Actor Terrorism'

Although the term 'lone-actor terrorist' is often used, there remains significant disagreement regarding its interpretation. Principal areas of divergence relate to the level of isolation, for example: can a dyad (a group of two people) or triad (three people) be included if they act without direction from a wider network; can a lone actor be inspired by the ideology of a terrorist group; and what degree of engagement with a broader network is acceptable?

Rather than seeking to settle ongoing debates about such issues, a working definition of loneactor terrorism was established for the purposes of this project:¹

The threat or use of violence by a single perpetrator (or small cell), not acting out of purely personal-material reasons, with the aim of influencing a wider audience, and who acts without any direct support in the planning, preparation and execution of the attack, and whose decision to act is not directed by any group or other individuals (although possibly inspired by others).

^{1.} For further discussion regarding this definition and how it was established, see Edwin Bakker and Jeanine de Roy van Zuijdewijn, 'Lone-Actor Terrorism: Definitional Workshop', *RUSI Occasional Paper* (December 2015).

By design, the definition is broad so that as many potential cases as possible are captured in the database. This enables the CLAT project – and users of the database – to potentially refine the definition of lone-actor terrorism through case analysis, discarding categories (where appropriate) in an evidence-based manner.

The working definition was subsequently broken down into the following inclusion criteria:

- 1. Violence, or the threat of violence, must be planned or carried out
- 2. The perpetrator(s) must be an individual, dyad or triad
- 3. The perpetrator must act without any direct support in the planning, preparation and execution of the attack
- 4. The perpetrator's decision to act must not be directed by any group or other individuals
- 5. The motivation cannot be purely personal-material gain
- 6. The target of the attack extends beyond those victims who are immediately impacted by the act.

In order to be included in the database there must be evidence to indicate that *each* of these criteria has been met. Absence of evidence to the contrary is insufficient. For example, if the number of perpetrators is unknown or in doubt, then the case has not been included within the data-set. While this may mean that some cases of lone-actor terrorism are omitted, this approach reduces the possibility of contamination by cases that fall outside the definition and therefore increases the validity of subsequent analysis.

Data Collection and Coding

The CLAT database captures instances of lone-actor terrorism – both plots and attacks – across thirty European countries (EU member states, in addition to Norway and Switzerland) between 1 January 2000 and 31 December 2014. Partners in the CLAT project were divided into research teams, each responsible for gathering data from an open source in relation to specific countries within the study area. In the first instance, the Global Terrorism Database was used to find possible cases;² these were then investigated through news reporting to determine whether they met the project criteria for inclusion. This was followed by additional internet searches, in English and local languages, using broad search terms to identify any further examples. Finally, country experts were contacted to verify that relevant cases had been identified, thereby ensuring the database was as comprehensive as possible.

Guided by the CLAT literature review,³ the researchers identified subject areas and issues to be investigated by the project; variables were then chosen to capture the information required, with coding guidance detailed in a project codebook to ensure consistency across the research teams. Double-coding exercises were also conducted: sample cases that had been coded by

^{2.} National Consortium for the Study of Terrorism and Responses to Terrorism (START), 'Global Terrorism Database', 2015, https://www.start.umd.edu/gtd/, accessed 22 February 2016.

^{3.} Raffaello Pantucci, Clare Ellis and Lorien Chaplais, 'Lone-Actor Terrorism: Literature Review', RUSI Occasional Paper (December 2015).

one team were presented to another and the coding results compared; where any differences were identified, the teams discussed those variables, determined the correct coding option and further clarification was added to the codebook where necessary.

Some variables were designed to record biographical information such as age or gender, some the methodology and impact of the plot, while others sought to capture the activities of the perpetrator in the period leading up to the attack. To record the ideology of lone-actor terrorists, the project adopted the categories used by Europol in its 'Situation and Trend' reports: 'religiously inspired'; 'ethno-nationalist and separatist'; 'left-wing and anarchist'; 'right-wing'; 'single issue'; 'other'; and 'unknown'. The use of Europol's categories is intended to facilitate the use of CLAT data alongside other studies of terrorism within Europe.

In cases where the perpetrator appeared to have taken inspiration from multiple ideologies, their case was coded as 'other'. This category also includes the perpetrators of school shootings, particularly significant across Scandinavian countries since 2007. This cohort is often omitted from studies of lone-actor terrorism; however, in many cases they present the same identification challenges from a practitioner perspective. Following consultation with national experts, some 'school shooters' were therefore included on the basis of their compatibility with the CLAT project definition: that is, those who were motivated by an ideology and the desire to convey a political message to a wider audience.

Limitations

Despite extensive effort by the research team, the CLAT database does not contain every lone-actor terrorism plot during the period studied. First, not all plots are in the public domain, especially where they were abandoned or disrupted by the authorities at an early stage. Second, there are variations across Europe in the way incidents are perceived and reported; for example, some incidents may be reported as a 'hate crime', but meet the criteria for inclusion in the CLAT database.

This under-reporting was particularly evident when collecting data on attacks or plots in Eastern Europe. For example, in Hungary there are known to be incidents of xenophobic violence;⁵ however, the task of collecting detailed media reportage of attacks proved very difficult. In many cases, the research teams found limited media coverage of potential right-wing extremism plots and attacks, with far greater public attention focused on religiously inspired incidents. The research team took steps to compensate, searching in local languages and using broad search terms to identify possible cases and then examine them against the project criteria (for instance, also searching for hate crimes); however, some cases will undoubtedly have been missed.

^{4.} See Europol, European Union Terrorism and Situation Trend Report 2015 (The Hague: Europol, 2015)

^{5.} European Roma Rights Centre, 'Attacks against Roma in Hungary: January 2008–September 2012', October 2012, http://www.errc.org/cms/upload/file/attacks-list-in-hungary.pdf>, accessed 22 February 2016.

There are also some important limitations to the data due to the use of open-source reporting. First, complete information is not always available, leading to a number of variables featuring high levels of 'unknown' entries. This creates challenges in analysis as it cannot be determined whether the 'unknown' entries would have the same ratio of distribution between the different options as the complete entries. Therefore, although the database contains 120 cases, analysis of specific variables was sometimes conducted using a subset of the data where complete information was available; in this scenario, and in particular when comparing subgroups within the data-set, the sample used is more limited than the overall number of cases suggests. For some variables, this unavoidably limited the analysis that could be conducted and the strength of the conclusions that could be drawn.

Second, there is an inevitable element of reporting bias: whether information is publicly available may depend on whether it was interesting to the journalists investigating the story. For example, whether a terrorist exhibited mental-health problems is perhaps more often a question raised in relation to lone actors than cases involving larger terrorist cells.⁶

It is conceivable that for certain variables of particular interest to journalists, such as mental-health issues, illicit drug use or indications of previous violence, where there is evidence it is likely to be reported. However, where variables are not mentioned in reporting, it is not clear whether it is because they are not applicable to the case or simply that they were not covered: absence of evidence does not equate to evidence of absence. Some variables were therefore designed to record whether there was an 'indication' that it applied to the case, and the research team focused on cases where there was positive evidence, rather than trying to interpret the significance of missing information.

Finally, the research teams faced particular challenges in finding open-source information in relation to mental-health issues. Many perpetrators may not have received a clinical diagnosis, but personal information included in news reports acts as a proxy indicator, clearly suggesting a relevant condition. Given the potential significance of this issue, as highlighted in the literature review, there was a reluctance to exclude it from the CLAT analysis. Separate variables were therefore created: first, capturing whether there were any proxy indicators of mental-health problems in case reporting, enabling the team to make use of the information available; and second, detailing clinical diagnoses where they had been conducted, to record and clearly distinguish medical opinion where it was available.

^{6.} See, for example, Toby Archer, 'Breivik's Mindset: The Counterjihad and the New Transatlantic Anti-Muslim Right', in Max Taylor, P M Currie and Donald Holbrook (eds), Extreme Right Wing Political Violence and Terrorism (London: Bloomsbury, 2013), pp. 169–86. In discussing the scrutiny applied to the mental state of Breivik, the author highlights that questions are rarely raised regarding the mental health of 'the Palestinian or Iraqi suicide bomber, of Jihadi terrorists around the world, or of ethno-nationalists radicals be they Basque, Corsican or Tamil'. See p. 170.

Analysis

Four thematic areas were identified for analysis: attack methodology and logistics; political engagement and online activity; personal characteristics; leakage and interactions with authorities. Due to the limitations of the data, the consortium agreed that it did not support detailed and sophisticated quantitative analysis. Instead, more limited quantitative analysis was used to explore the data and highlight key trends; these were subsequently explored in greater detail through examination of case information. Various techniques were employed: in some cases, it was necessary to find the right benchmarks for comparison with the broader population; for others the most useful findings were uncovered through analysis of subcategories, while correlations between variables also produced valuable insights.

Process Variables: Attack Methodology and Logistics

Box 1: Key Findings.

- Of the seventy-two successfully launched attacks recorded in the database, religiously inspired
 attacks were the most frequent at 38 per cent, but caused only 8 per cent of fatalities; rightwing terrorist attacks were more lethal, accounting for 24 per cent of launched attacks but 48
 per cent of fatalities
- The most frequent targets were civilians, in particular ethnic and religious minorities, asylum seekers and immigrants. A large majority of religious targets were Muslim
- Explosives resulted in only 4 per cent of fatalities, contrasting sharply with firearms which accounted for 89 per cent
- Lone-actor terrorists with military training or experience were, on average, more lethal than
 their untrained counterparts, accounting for 19 per cent of perpetrators but 29 per cent of
 fatalities.

Database Overview

Ninety-eight lone-actor terrorist plots were identified between 1 January 2000 and 31 December 2014, including seventy-nine led by individuals, twelve by dyads and seven by triads. Among the ninety-eight plots identified, seventy-two were successfully launched attacks, including sixty perpetrated by individuals acting alone, six by dyads and six by triads (see Table 1 overleaf).

Table 1: Number of Lone-Actor Terrorism Plots Planned, Attempted or Carried Out in Thirty European Countries (EU Member States, Norway and Switzerland) between 1 January 2000 and 31 December 2014.

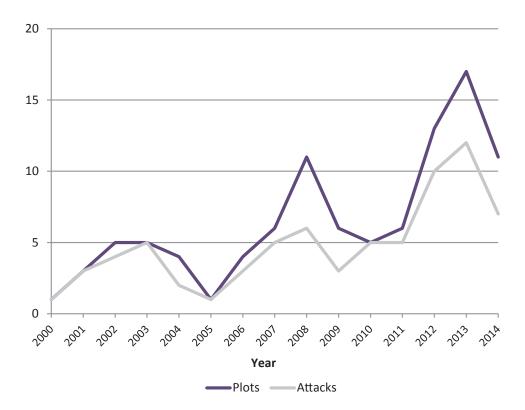
	Country	Total	Individual	Dyad	Triad
1	Great Britain	38	27	8	3
2	France	11	10	1	0
3	Germany	5	4	0	1
4	Sweden	5	3	1	1
5	Spain	4	4	0	0
6	The Netherlands	4	4	0	0
7	Belgium	4	4	0	0
8	Finland	4	3	1	0
9	Norway	4	3	0	1
10	Denmark	3	3	0	0
11	Italy	3	2	0	1
12	Poland	2	2	0	0
13	Slovakia	2	2	0	0
14	Switzerland	2	2	0	0
15	Northern Ireland	1	1	0	0
16	Czech Republic	1	1	0	0
17	Estonia	1	1	0	0
18	Romania	1	1	0	0
19	Bulgaria	1	1	0	0
20	Greece	1	1	0	0
21	Austria	1	0	1	0
22	Hungary	0	0	0	0
23	Slovenia	0	0	0	0
24	Lithuania	0	0	0	0
25	Croatia	0	0	0	0
26	Ireland	0	0	0	0
27	Latvia	0	0	0	0
28	Malta	0	0	0	0
29	Portugal	0	0	0	0
30	Cyprus	0	0	0	0
31	Luxembourg	0	0	0	0
	Total Plots	98	79	12	7
	Total Individuals Involved*	124	79	24	21

^{*} The data-set includes analysis of 120 individuals out of the 124 involved, given some technical issues (for example, insufficient information) or other sensitivities (for example, age).

Lone-actor terrorism in Europe is rare. In ten of the thirty countries studied, no lone-actor terrorist plot could be identified across fifteen years; only four countries had at least five plots; and only two had more than five.

Analysis suggests an overall increase in lone-actor terrorism across Europe during the past fifteen years.





It is important to note that information on recent plots is more detailed and more readily available thanks to the rise in digital archives of news reports; however, even acknowledging this potential bias in data collection, the overall trend appears clear.

Casualties

On average, lone-actor terrorist plots resulted in 1.99 fatalities and 4.58 injuries, with large standard deviations of 8.30 and 24.60, respectively; however, these figures are partly skewed by the attacks perpetrated by Anders Breivik on 22 July 2011.⁷ Seventy-seven people were killed and 242 injured on that day alone, illustrating the damage a single individual can cause. Therefore, excluding Breivik as

^{7.} Entries in the Countering Lone-Actor Terrorism (CLAT) database are made against perpetrators rather than attacks; as a result, the bombings of government buildings in the centre of Oslo and the shootings on the island of Utøya by Anders Breivik in 2011 are recorded in a single entry.

an outlier, lone-actor terrorist plots resulted in an average of 1.22 fatalities and 2.13 injuries, with standard deviations of 3.23 and 4.28, respectively.

Even once Breivik is excluded as an outlier, these standard deviations remain relatively high, illustrating the degree of variation across the data-set. Of the lone-actor plots, 76 per cent failed to cause any fatalities, while 58 per cent caused no injuries. These findings underline that while lone-actor terrorist attacks can be devastating, a high proportion of plots fail to manifest in this manner.

Casualty rates were also examined within ideological subgroups: including the attack by Breivik, it was found that right-wing attacks caused 260 injuries and ninety-four fatalities,⁸ while religiously inspired attacks killed sixteen and injured sixty-five people.

Table 2: Casualties from Lone-Actor Terrorism Plots.

Ideology	Plots	Attacks	Injured	Fatalities
Ethno-National and Separatist	2	2	1	0
Left Wing and Anarchist	3	3	29	8
Religiously Inspired	36	27	65	16
Right Wing	31	17	260	94
Single Issue	5	5	18	19
Other	21	18	76	58
Total	98	72	449	195

These results mirror findings across the West more broadly, where 80 per cent of deaths from lone-actor terrorism have been attributed to right-wing extremists, nationalists, anti-government elements or other forms of political extremism, rather than religiously inspired terrorism.⁹

Targets

Civilians are the most common target of plots in the data-set (35 per cent) – in particular, specific ethnic and religious minorities, asylum seekers and immigrants. A large majority of religious targets were Muslim. The plurality of lone actors who targeted civilians were religiously inspired (37 per cent), followed by right-wing perpetrators (25 per cent) and school shooters (20 per cent).

Weapons

The most frequent types of weapons used by perpetrators were firearms (31 per cent), multiple types of weapon (21 per cent), explosives (17 per cent) and bladed weapons (such as a knife, machete or axe - 12 per cent). While 92 per cent of bladed-weapons plots and 100 per cent of identified firearms plots led to launched attacks, this was the case for less than half of the explosives plots

^{8.} Right-wing plots resulted in eighteen injuries and seventeen fatalities if Breivik is excluded as an outlier.

^{9.} Institute for Economics and Peace, *Global Terrorism Index 2015* (Sydney, New York, NY and Mexico: Institute for Economics and Peace, 2015).

(45 per cent). These findings perhaps illustrate the challenges in acquiring and producing explosives without detection; plots using only firearms or bladed weapons require less planning and present fewer opportunities for law enforcement to intervene.

Moreover, even where explosives plots reach the point of attack, their lethality is low, perhaps due in part to the difficulties in successfully producing an effective explosive. The lethality of explosives was found to be 0.57 fatalities per attack, in contrast to 6.65 for firearms attacks. Across the database, explosives account for only 4 per cent of fatalities, in stark contrast to the 89 per cent caused by firearms. Interestingly, bladed weapons also had a low lethality at 0.36, accounting for only 2 per cent of deaths, illustrating that although such lone-actor terrorist attacks may be difficult to detect and disrupt, they do not often result in mass casualties.

An analysis of weapons used across ideologies found that there were no substantial differences; however, there were clear differences between countries. While lone-actor terrorist plots in Great Britain led to two fatalities and seventeen injuries, none of these were caused by firearms. In contrast, four attacks using firearms in France caused nineteen fatalities and thirty-two injured, accounting for 95 per cent of fatalities and 53 per cent of injuries in that country. In Germany, all five lone-actor terrorist attacks were carried out with firearms. It is interesting to note that firearms attacks were more prominent in countries with higher rates of legal gun ownership; the UK (Great Britain and Northern Ireland) has only 6.5 legally held firearms per 100,000 inhabitants, compared with approximately thirty per 100,000 in France and Germany.¹¹

Overall, these findings suggest that lone-actor terrorist attacks using firearms are more likely to occur in countries with higher rates of legal gun ownership and cause more fatalities than attacks using explosives or bladed weapons. Interestingly, across the data-set, 38 per cent of the firearms used in attacks were legally owned.

Military Training

The CLAT literature review highlighted findings from previous research that the level of military experience among lone-actor terrorists is higher than might be expected within the general population.¹² It is further hypothesised that individuals with military training or combat experience may be more 'effective' in conducting their attack, causing greater numbers of fatalities, a theory supported by studies of terrorism more broadly.¹³ Within the CLAT database, the lethality of perpetrators with military training was 2.29 fatalities per individual, markedly higher than their

- 10. To be as comprehensive as possible, in calculating lethality rates the fatalities from 'multipleweapon' attacks have been included where it is possible to definitively attribute casualties.
- 11. European Commission, 'Communication from the Commission to the Council and the European Parliament: Firearms and the Internal Security of the EU: Protecting Citizens and Disrupting Illegal Trafficking', COM(2013) 716, 21 October 2013.
- 12. Pantucci, Ellis and Chaplais, 'Lone-Actor Terrorism: Literature Review'.
- 13. See Brian Michael Jenkins, 'When Jihadis Come Marching Home', Perspectives, RAND Corporation, 2014; Brian A Jackson et al., Aptitude for Destruction: Volume 1: Organizational Learning in Terrorist Groups and its Implications for Combating Terrorism (Santa Monica, CA: RAND Corporation, 2005); Thomas Hegghammer, 'Should I Stay or Should I Go? Explaining Variation in

counterparts without such experience at 1.47; if Breivik is removed as an outlier, the lethality of non-military perpetrators drops further to just 0.68.

This raises an important issue: the most lethal lone-actor terrorist in the database, Breivik, had no military training; the absence of such experience cannot therefore be considered a conclusive indicator that a perpetrator is less dangerous. Therefore, while these findings do offer some support for the hypothesis that, on average, military training or experience increases the lethality of lone-actor terrorists, they also suggest that other factors must be taken into account.

It was also found that attacks planned by those with military training or experience were prevented in only 18 per cent of cases, a substantially lower proportion than the 36 per cent of perpetrators who had no comparable training or experience. While it is not possible to establish causality, one plausible interpretation could be that such experience may also have increased their ability to avoid detection during the planning and development stages.

Without further research on the role of military training it is not possible to draw firm conclusions and the data certainly do not show a correlation with a propensity to commit acts of lone-actor terrorism. These findings do suggest that it may be a useful factor to consider in assessing the level of risk posed by a potential lone-actor terrosist. However, as the case of Breivik illustrates, only alongside other factors.

Process Variables: Political Engagement and Online Activity

Box 2: Key Findings.

- Religiously inspired and right-wing perpetrators account for three out of four lone-actor terrorists in Europe over the past fifteen years (religiously inspired 38 per cent; right wing 33 per cent)
- The majority of lone-actor terrorists communicate their motivations orally or through internet postings; very few write detailed manifestos (only 13 per cent)
- The majority of lone-actor terrorists (58 per cent) did not exhibit signs of political engagement. However, of those that did, right-wing lone actors were more likely to be active in political movements than those motivated by religion
- Approximately two-thirds of lone actors had never been active within an extremist group; however, where links were found, 65 per cent were with groups known to advocate or at least condone violence
- For lone actors who were active online, mainstream social media was the most popular medium for communication. More broadly, the Internet was used for downloading training material and conducting basic reconnaissance.

Ideology

The suspected ideology of the perpetrators was determined through either media reportage or information that emerged during legal proceedings. As illustrated by Table 3, 86 out of the 120 perpetrators in the database were either religiously inspired (38 per cent) or right-wing extremists (33 per cent), accounting for approximately three out of four lone-actor terrorists during this time period. Given the intense public focus on religiously inspired terrorism, the finding that right-wing extremists account for a similar proportion of perpetrators within the database is particularly significant. Moreover, the number of far-right attacks is likely to be even higher due to under-reporting by the media (see Limitations section above).

Table 3: Ideological Commitment of Lone-Actor Terrorists within the Database.

Ideological Commitment	Percentage
Religiously Inspired	46
Right Wing	40
Other	23
Single Issue	6
Left Wing and Anarchism	3
Ethno-Nationalist and Separatist	2

Justifications and Manifestos

In 73 per cent of cases, perpetrators had offered oral or written justification for their actions;¹⁴ however, the format of these expressions differed substantially. Only sixteen perpetrators (13 per cent) wrote and published a detailed manifesto, either online or as a physical copy. While such documents can offer detailed insights into the perpetrator's radicalisation, the development of attack plans and preparation techniques, they are comparatively rare. The publication of a manifesto is therefore likely to offer opportunities for intervention in only a limited number of lone-actor plots. In other cases, perpetrators either harnessed the immediacy and reach of social media to publish media files or text documents just a few hours prior to their attacks, or alternatively made significant oral statements just before the attack or during arrest.

Motivations

Unsurprisingly, the motivations expressed range drastically across the ideologies represented in the data-set. Perpetrators appeared to harbour broad disgruntlements with populations, governments or social movements, or anger over specific events (either personal or political) for which they were seeking retribution.

^{14.} In the 28 per cent of cases where such explicit justification was not present, motivations were often brought to light during trials with the discovery of evidence or material possessions – hence these cases still warranted inclusion in the data-set.

Among the right-wing perpetrators in the data-set, there is a strong emphasis on immigration policy, a wish to inspire patriotism and to defend their country from what they term 'Islamisation'. This reflects a shift within broader right-wing extremism, with many groups and individuals – including Breivik – denouncing Nazism, fascism and anti-Semitism, and instead defining their cause as defence against a perceived threat from Islam. However, there remains a significant portion of lone-actor terrorists in the database who appear to have been preoccupied solely with neo-Nazi symbolism and the idolisation of far-right figureheads. Examining the influence of specific events, in Great Britain there are indications that following the murder of Lee Rigby, 47 per cent of right-wing perpetrators were in part motivated by that attack. These cases include arson attacks and the bombing of Islamic centres.

Within the religiously inspired cohort, there are numerous references to taking revenge for political action, such as Western Europe's foreign policy in the Middle East in the aftermath of 9/11, the national government's support for Israel, the treatment of terror suspects imprisoned in Abu Ghraib or retribution for cartoons that depicted the Prophet Muhammad. These references are complemented by attempts to justify their intentions or actions by citing religious extremist principles like the waging of violent *jihad*.

Political Engagement

The majority of lone-actor terrorists in the data-set (58 per cent) did not appear to be politically active. ¹⁶ Of those that were politically engaged, 43 per cent had attended meetings and rallies, while 47 per cent had conducted their relationship with the group solely through material or literature. However, it should be noted that this latter form of engagement is likely to have grown over recent years in positive correlation with the rise of social media and the availability of extremist material in downloadable multimedia format. Indeed, 50 per cent of perpetrators conducted at least part of their engagement in a virtual setting. Some of these cases involve the downloading of videos, images and literature as well as interaction on official forums and pages.

Within ideological categories, right-wing lone-actor terrorists were more likely to be politically active (62.5 per cent) than their religiously inspired counterparts (44.3 per cent).

Links to Extreme Groups

Approximately two-thirds of the perpetrators (67 per cent) had never been active in an extremist group. Where connections had been established, 65 per cent of links (or 22 per cent of the overall database) were with extremist groups known to advocate or at least condone violence in the name of their cause. These would typically be groups that are known to have a

^{15.} Toby Archer, 'Breivik's Mindset: The Counterjihad and the New Transatlantic Anti-Muslim Right', in Max Taylor, P M Currie and Donald Holbrook (eds), *Extreme Right-Wing Political Violence and Terrorism* (London: Bloomsbury, 2013), pp. 169–86.

^{16.} The variable of political engagement takes into account the perpetrator's involvement in, or membership of, both mainstream political parties and informal political movements. This can also include extremist groups.

history of involvement in violent attacks, and which are deemed politically illegitimate by the state in which they operate. Moreover, 69 per cent of these links to violent groups (or 15 per cent of the overall database) were current at the time of the attack. While the overall level of engagement with extremist groups is low, these findings suggest there is perhaps a need for greater surveillance of groups which advocate violence and those who interact with them. Although religiously inspired lone actors were more likely to have a link to an extremist group, the range of organisations linked to right-wing perpetrators was greater.

Digital Footprint

Within the database, examples of online activity included using the Internet to form relationships with others, to gain the inspiration for the attack or to acquire technical knowledge. The roles of the internet and social media have been particularly prominent in discourse around lone-actor terrorism in recent years.¹⁷ Chronological analysis of the CLAT database shows a steady increase in the use of mainstream social media platforms in plots from around 2004 onwards, as platforms became established, grew in popularity and diversified in capabilities.

Prior to the popularisation of mainstream social media, password-protected forums and themed blogs were the most prevalent form of communication for the perpetrators. Many of the small cells (dyads or triads) met on such platforms, some consequently creating their own space to discuss and solidify their attack plans.

Where perpetrators have primarily engaged through social media platforms, the information gathered overwhelmingly indicates a one-way relationship – reading and sharing relevant news, and expressing opinions, rather than utilising these platforms to form connections with other people.

The Internet was used for tactical research in just under a third of all cases (33 per cent), in the form of downloading manuals, watching training videos, or undertaking basic reconnaissance such as researching the floorplan of a building, finding addresses or searching lists of individuals in order to identify targets. Table 4 shows the distribution of these activities across the data-set, with twenty-one out of the thirty-nine perpetrators who used the Internet to aid their attack downloading training manuals (54 per cent). These manuals, which included *The Anarchist's Cookbook* (referenced in six cases), *The Jolly Roger Cookbook* and *The Complete Improvised Kitchen*, provide instructions for the construction and detonation of explosives. Of these twenty-one cases, only ten successfully launched attacks using explosives; the remainder were either thwarted by the authorities, or ultimately used an alternative weapon. Of these ten bombings, only one directly caused fatalities – Anders Breivik's. This finding underlines questions over the accuracy and effectiveness of training manuals.

^{17.} See Anne Aly, 'The Terrorists' Audience: A Model of Internet Radicalisation', *Journal of Australian Professional Intelligence Officers* (Vol. 171, 2009), pp. 3–19; Ines von Behr et al., 'Radicalisation in the Digital Era: The Use of the Internet in 15 Cases of Terrorism and Extremism', RAND Corporation, 2013.

Table 4: Online Sources for Tactical Knowledge.

Source	Percentage
Downloaded Training Manual	54
Watched Training Video	5
Other	31
Multiple	10

The proportion of perpetrators who watched training videos appears relatively small; however, this is likely to become more significant over time given the centrality of videos to propaganda strategy for many extremist organisations.

Personal Variables: Personal Characteristics

Box 3: Key Findings.

- Religiously inspired and right-wing ideologies present very different age profiles: the majority
 of religiously inspired perpetrators were younger than twenty-five years old, with the number
 of perpetrators declining as age increased; this is in direct contrast to right-wing lone-actor
 terrorists where the majority were at least forty years old
- The findings indicate a possible link between social isolation and mental-health disorders. This was particularly pronounced in the case of school shooters
- Religiously inspired perpetrators were seldom socially isolated
- Where legally owned firearms were the weapon chosen for attack, there was an indication of mental-health disorder in 53 per cent of perpetrators.

Age and Ideological Profiles

The average age of the 120 perpetrators was found to be 29.7 years old at the time of attack or arrest, with the youngest perpetrator being fifteen and the oldest seventy-four. The standard deviation was 9.9, indicating a large variance between the different perpetrators. Age was also contrasted with ideology, the results of which are shown in Table 5.

Table 5: Average Age of Lone-Actor Terrorists.

Ideology*	Average Age (Years)	
School Shooters	20.5	
Religiously Inspired	27.3	
Right Wing	32.3	
Single Issue	37.5	

^{*} For the ideology listed as 'other', only school shooters were examined here. The results in relation to both left-wing anarchist and ethno-nationalist and separatists are omitted due to the low numbers of perpetrators: 3 and 2 respectively.

Not surprisingly, school shooters were found to be younger than the overall average in the database. It is also notable that religiously inspired perpetrators are on average almost five years younger than those driven by a right-wing ideology. Moreover, there is less variation among this group, with a standard deviation of 7.69 in contrast to 11.88 for right-wing extremists.

These disparities were investigated further. Religiously inspired and right-wing perpetrators comprise more than 70 per cent of cases in the database; however, despite a comparable number of cases at forty-six and forty, respectively, these ideologies present very different age profiles. Among the youngest group aged less than twenty-five years old, it was found that almost half of the perpetrators were religiously inspired (47 per cent); in contrast, among the perpetrators aged forty years or older, only 21 per cent were religiously inspired and 47 per cent were right-wing extremists.

Table 6: Age Profiles of Selected Ideological Categories.

Age Groups	<25	25–39	40+	Total No. of
				Perpetrators
Religiously Inspired	47%	38%	21%	46
Right Wing	24%	36%	47%	40
Other	29%	13%	16%	23
Single Issue	0%	1%	10%	6

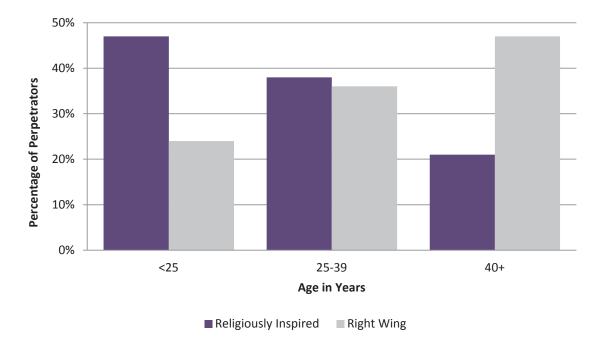


Figure 2: Age Profiles of Ideological Categories.

Variations between age groups were also evident in relation to social isolation and mental-health disorders. The youngest group (younger than twenty-five years old) showed the highest percentage of social isolation at 36 per cent; fewer perpetrators aged 25–39 years old exhibited similar signs (25 per cent); while those aged at least forty years old presented the lowest figure at 11 per cent. Similarly, it is the youngest age group (younger than twenty-five years old) where the highest percentage of suggested mental-health disorder is found (40 per cent).

Similarly, ideological categories presented strikingly different results in relation to social isolation. Across the database 29 per cent of perpetrators were in some way socially isolated; this rose slightly to 33 per cent for right-wing extremists, but dropped drastically to only 9 per cent for religiously inspired loneactor terrorists. As outlined above, the highest figure was in relation to school shooters at 75 per cent.

The prevalence of 'noteworthy life events' also varied substantially between different ideological groups. While such events were noted in 43 per cent of cases across the data-set, the figure was higher within the single-issue subset at 67 per cent, and among the school shooters at 88 per cent. Upon examining the latter group, it was established that in many cases the event related to bullying. In contrast to these elevated figures, only 37 per cent of religiously inspired perpetrators and 28 per cent of right-wing cases suggested the prior occurrence of a noteworthy life event. These findings suggest that a noteworthy life event should not be considered a consistent trigger leading to a process of radicalisation and mobilisation towards violence.

^{18.} A 'noteworthy life event' is defined as an event so significant – either positive or negative – that it was cited as altering the life of the perpetrator: for example, the loss of parents at a young age.

Mental-Health Disorders

In 35 per cent of cases there was an indication of a mental-health disorder within news reporting; however, in order to interpret the significance of this result it is crucial to have a benchmark. In examining the EU, Norway, Iceland and Switzerland, the World Health Organization (WHO) found that '27 per cent of the adult population (18–65) had experienced at least one of a series of mental disorders in the past year (this included problems arising from substance abuse, psychoses, depression, anxiety and eating disorders).' Although the WHO uses a broad definition, this offers an appropriate comparator given the low threshold used by the corresponding CLAT variable that records any 'indication of' mental disorder. The finding of a potential mental-health disorder in 35 per cent of lone-actor terrorists therefore does not suggest a substantial deviation from the broader population. Moreover, the WHO also states that '[about] two-thirds of people suffering mental disorders will never seek help because of discrimination and the stigma attached to such conditions', suggesting the population figure may also be higher than indicated.²⁰

Table 7: Indications of Mental-Health Disorders among Lone-Actor Terrorists.

	Religiously Inspired	Right Wing	Single Issue	School Shooters
Indication of a Mental-Health Disorder	24%	28%	33%	63%

Indications of mental-health disorders were also examined within ideological subgroups. The most striking finding is with regard to school shooters, where there was an indication of mental-health disorder in 63 per cent of cases. Interestingly, this figure was lowest among religiously inspired lone-actor terrorists at 24 per cent. Some caution may be required in interpreting these findings. Reporting bias may influence whether journalists investigate the possibility of mental-health disorders; for example, questions regarding psychological state are perhaps more prominent in the case of school shooters. Some communities are also reluctant to speak with journalists, and some cultures unwilling to openly discuss mental-health issues. Nevertheless, the finding that 63 per cent of school shooters exhibited some form of mental-health disorder has clear implications for policy-makers.

In cases where there was an indication of a mental-health disorder, 50 per cent of perpetrators were also socially isolated, in contrast to only 17 per cent where there were no suggestions of mental-health problems. Similarly, examination of socially isolated perpetrators found that in 62 per cent of cases there was an indication of mental-health disorder. These findings suggest a link between these two variables.

Finally, where legally owned firearms were the chosen weapon for attack (fifteen cases), there was an indication of mental-health disorder for 53 per cent of perpetrators.

^{19.} World Health Organization, Regional Office for Europe, 'Data and Statistics', 2016, http://www.euro.who.int/en/health-topics/noncommunicable-diseases/mental-health/data-and-statistics, accessed 22 February 2016.

^{20.} Ibid.

Process Variables: Leakage and Interactions with Authorities

Box 4: Key Findings.

- Of lone-actor terrorists recorded in the database, 34 per cent exhibited a change in behaviour.
 These changes were more prevalent within the religiously inspired category where 50 per cent of perpetrators exhibited this potential indicator, in contrast to only 15 per cent of right-wing terrorist plotters
- Of perpetrators, 46 per cent exhibited 'leakage' giving an indication of either their extreme views, intention to act or even some attack details in advance
- Of the religiously inspired perpetrators that exhibited leakage, 45 per cent 'leaked' to friends
 or family, in contrast to only 18 per cent of leakage by right-wing perpetrators. Right-wing loneactor terrorists were more likely to post telling indicators online, where 41 per cent of their
 leakage occurred
- Excluding cases where a perpetrator was identified during (or immediately following) an
 incident, 40 per cent of right-wing extremists were uncovered by an element of chance for
 example, as part of an investigation into other offences or because the perpetrator accidentally
 detonated a device.

Changes in Behaviour

Changes in behaviour can be crucial indicators that an individual is becoming more extreme in his or her views or even considering violent acts. The CLAT database was therefore designed to capture this information. Variables record whether public information indicates a change in the perpetrator's behaviour in the period leading up to the attack (or planned attack), along with any available details regarding both the nature of the behaviour and the context in which it was noted.

Overall, 34 per cent of lone-actor terrorists exhibited a change in behaviour. Moreover, these changes were more prevalent among religiously inspired lone-actor terrorists; 50 per cent of perpetrators in this category exhibited this potential indicator in contrast to only 15 per cent of right-wing terrorist plotters. Examples of such behaviour include becoming increasingly distant from family members, and adopting sudden and drastic changes in attitude, as well as more specific ones like changing social groups.

Leakage

The term 'leakage' is used to denote situations where the perpetrator has given any indication of extreme views or an intention to act to a third party; it may be intentional or done unwittingly. Leakage may be limited to behavioural changes but can also be much broader, in some extreme cases including outright declarations of an intention to commit a terrorist act.

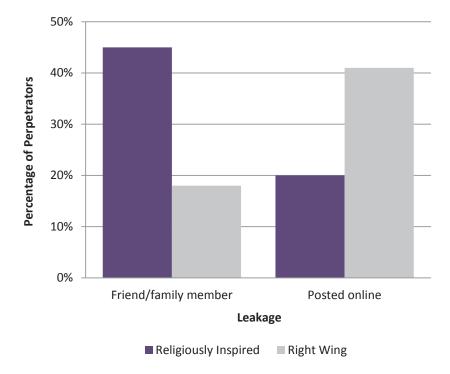
Variables captured whether leakage occurred, its nature and the audience. Overall, 46 per cent of perpetrators exhibited leakage; this was consistent across religiously inspired and right-wing actors, with no significant variation. This leakage took various forms: in 35 per cent of cases it gave an indication of the perpetrator's extremist ideology, but nothing further; for example, expressing extreme views to friends and family, or being seen to access extremist websites.

In 44 per cent of cases the perpetrator went further and 'leaked' some indication of an intention to act. In some examples this was deliberate, posting online that he or she planned to become a martyr, telling colleagues or sending information to the media. In other cases this was done unwittingly; those around one perpetrator realised he was experimenting with explosives when he was seen with suspicious injuries, while another failed to dispose of receipts for chemicals which were subsequently found by family members.

In 21 per cent of cases the perpetrator shared at least some details of the planned attack; one example told his ex-girlfriend and showed her the weapons in his bag, another told his parents, while a third example leaked attack details to a third party whom the individual was trying to recruit.

There were striking differences between ideological groups with regard to the audience of the leakage. Religiously inspired lone-actor terrorists were most likely to leak information to friends or family (45 per cent), expressing extreme views to those in their immediate vicinity; in contrast, only 18 per cent of leakage by right-wing extremists was to this audience.





Right-wing lone-actor terrorists were more likely to post telling indicators online, where 41 per cent of their leakage occurred. Examples include a perpetrator who left a message on the internet forum of a known far-right group, Combat 18: 'Watch TV on Sunday, I will be the star. Death to ZOG! 88!'²¹ Another example had joined a number of far-right groups on Facebook including Bloc Identitaire (formerly Unité Radicale), Maison Commune and Belle et Rebelle.

The research team had posited that younger perpetrators might be more careless in revealing their extremist beliefs or attack plans; however, analysis suggested no correlation between age and leakage. Similarly, there was no correlation with mental-health issues: where there was an indication of mental-health issues those perpetrators were no more likely to exhibit leakage.

The timeframe in which leakage occurred was also investigated, in order to ascertain any patterns and to determine whether leakage allowed sufficient time for detection and intervention; however, this information was either unavailable or unclear in too many cases. Nevertheless, the database provides useful insights into the prevalence of leakage, its nature and crucially the audiences that are most likely to encounter it.

^{21.} ZOG is an abbreviation for Zionist Occupation Government, while 88 is used to represent 'Heil Hitler', as 'H' is the eighth letter of the alphabet.

Interaction with Authorities

Variables were designed to capture whether the perpetrator had been known previously to public authorities such as mental-health practitioners, social-welfare services or law-enforcement bodies. Separate variables also recorded whether the engagement (or investigation) was current at the time of the attack or intervention.

Convictions offer clear evidence of interaction with law enforcement; moreover, the project's literature review highlighted findings from previous studies that there is an elevated rate of previous convictions among lone-actor terrorists.²² These findings are reinforced by the CLAT database, where there is evidence to suggest 33 per cent of perpetrators had a previous criminal sanction; among right-wing extremists this figure rises to 40 per cent. These figures are notably higher than for the general population; in the UK it is estimated that 20 per cent of adults have a criminal conviction.²³ Although certainly an interesting finding, without examining the nature of any previous convictions and whether they overlap with – or far predate – the perpetrator's terrorist activity, it is not possible to determine whether they indicate an opportunity to identify and disrupt plots. Unfortunately, more detailed information regarding interaction with authorities was often unavailable or inconclusive.

These data limitations also precluded extensive quantitative analysis across the database; however, some trends were still apparent. Overall, 75 per cent of religiously inspired plots led to an attack, in contrast to 55 per cent of right-wing plots. This disparity could indicate that religiously inspired perpetrators are perhaps more effective than their right-wing counterparts, or that law enforcement are more successful in identifying right-wing extremists; however, further examination appears to preclude the latter. Excluding cases where a perpetrator was identified during (or immediately following) an incident, it was established that 40 per cent of right-wing extremists were uncovered by an element of chance, as part of an investigation into other offences or because the perpetrator accidentally detonated a device, drawing attention to his or her activities.

One perpetrator sustained serious injuries while testing a device and was airlifted to hospital; the nature of his injuries roused suspicions and a search of his home revealed further explosive devices. The bomb-making activities of another perpetrator were discovered when his home was searched as part of an investigation into the possession of indecent images of children, while in a third example a perpetrator's terrorist activity was uncovered following his arrest for public-order offences after urinating on a train platform. These examples stand in stark contrast to religiously inspired cases. Although chance was also evident in some examples, with one perpetrator being identified following a routine traffic stop and another having accidentally detonated a device, overall 88 per cent of interventions were intelligence-led.²⁴ This disparity

^{22.} Pantucci, Ellis and Chaplais, 'Lone-Actor Terrorism: Literature Review'.

^{23.} Stephen Howard, "Ban the Box" Campaign Asks Employers to Give Ex-Offenders a Chance', *Guardian*, 17 October 2013.

^{24.} Excluding cases where a perpetrator was identified during (or immediately following) an incident.

suggests that intelligence machinery may be more finely attuned to detecting religiously inspired lone-actor terrorists by comparison to their right-wing counterparts.

Conclusion

Analysis of the CLAT database reaffirms a key assertion from the literature review: there is no consistent profile for a lone-actor terrorist. However, systematic analysis of cases from across Europe has provided valuable insights into the scale of the threat, the ways in which it is most likely to manifest, and the activities of lone-actor terrorists in the period leading up to the attack. The policy implications of these findings will be explored in detail within dedicated papers in the CLAT series:

- 'Lone-Actor Terrorism: Policy Paper One: Personal Characteristics of Lone-Actor Terrorists'
- 'Lone-Actor Terrorism: Policy Paper Two: Attack Methodology and Logistics'
- 'Lone-Actor Terrorism: Policy Paper Three: Motivations, Political Engagement and Online Activity'
- 'Lone-Actor Terrorism: Policy Paper Four: "Leakage" and Interaction with Authorities'.

About the Authors

Clare Ellis is a Research Analyst in the National Security and Resilience Studies Group at RUSI. Her research interests include counter-terrorism, organised crime and the role of policing in tackling national-security threats. Prior to joining RUSI she worked in the criminal-justice sector, first within criminal defence and later within the police. Clare holds an MSc with Distinction in Countering Organised Crime and Terrorism from University College London. She has also studied at the University of Newcastle and the Université Lumière Lyon 2, holding a Bachelor's degree in Law with French.

Raffaello Pantucci is Director of International Security Studies at RUSI. He has worked at think tanks in London, Washington and Shanghai, and his work on terrorism has been published in Studies in Conflict and Terrorism, Terrorism and Political Violence, Survival, the RUSI Journal, as well as media outlets including The Times, Guardian, Sunday Times, New York Times, Financial Times and Prospect. He is the author of We Love Death as You Love Life: Britain's Suburban Terrorists (Hurst/Oxford University Press, 2015).

Jeanine de Roy van Zuijdewijn is a Researcher at the Centre for Terrorism and Counterterrorism at Leiden University and Research Fellow of the International Centre for Counter-Terrorism in The Hague. Her research interests include lone-actor terrorism, foreign fighters and how threat assessments are made. She has assisted Edwin Bakker in developing the massive open online course on terrorism and also teaches this course to undergraduate students.

Professor Edwin Bakker is Director of the Centre for Terrorism and Counterterrorism at Leiden University and Fellow of the International Centre for Counter-Terrorism in The Hague. Dr Bakker has a research interest in home-grown jihadist terrorism, lone-actor terrorism and the impact of terrorism on societies. He teaches the massive open online course at Coursera.org 'Terrorism and Counterterrorism: Comparing Theory and Practice' that has attracted more than 100,000 participants.

Benoît Gomis is an international security analyst focusing on terrorism and organised crime. He is an associate fellow with Chatham House, an independent consultant and the author of *Counterterrorism: Reassessing the Policy Response* (CRC Press, 2015), which he wrote as a visiting scholar at the Canadian Network for Research on Terrorism, Security and Society. He is a frequent contributor to *World Politics Review*, IHS *Jane's Intelligence Review*, Oxford Analytica and the international media. He previously worked at Simon Fraser University, Royal Roads University, Chatham House, the NATO Parliamentary Assembly and the French Ministry of Defence. He was educated at Sciences Po in Aix-en-Provence, Loyola University Chicago, and the London School of Economics and Political Science.

Simon Palombi is a consultant for the International Security Department at the Royal Institute of International Affairs (Chatham House). Simon has cultivated his expertise in the area of security policy with various organisations, including the UN Counter-Terrorism Executive Directorate in 2011 and the Lowy Institute for International Policy in 2011/12 and 2012/13. Simon is also the Research and Development Lead for a strategic advisory firm. Simon has degrees in International Relations (First Class Honours) and Law, and is on the roll of legal practitioners for the Supreme Court of New South Wales, Australia.

Melanie Smith is a Researcher and Coordinator at the Institute for Strategic Dialogue. Her research investigates the involvement of women in violent extremist activity, as well as the role of social media in terrorist movements. Melanie is also a Research Fellow at the International Centre for the Study of Radicalisation and Political Violence at King's College London, where she cultivated the largest known database of Western women who have migrated to Daesh territory.