ARTICLE DETAILS

TITLE (PROVISIONAL)	"This bloody rona!": Using the digital story completion method and thematic analysis to explore mental health impacts of COVID-19 in Australia
AUTHORS	Vaughan, Priya; Lenette, Caroline; Boydell, Katherine

VERSION 1 – REVIEW

REVIEWER	Dalton-Locke, Christian UCL, Division of Psychiatry
REVIEW RETURNED	21-Sep-2021

GENERAL COMMENTS	Thank you for the opportunity to review this manuscript. It is a very interesting study using an underutilised qualitative method: story completion, which will hopefully demonstrate to other qualitative researchers the potential value of using this method in their own work. I have added below a number of suggested changes. - Please add a 'Methods' title for the section 'Design' and 'Analysis' to fall under. - The Design section could be broken down into several smaller sections to improve clarity, for example: Design, Participants, Data collection/ Online survey. - On page 6, it is unclear what the sentence is referring to 'The length of stories submitted varied from one sentence to a lengthy paragraph. The former identified the next step or action the protagonist would take, while the latter was either reflective or followed a narrative arc with a beginning, middle and end (orientation, complication, resolution).' If this text is describing the responses provided by participants, then it should be moved from the Methods to Results section. - Please provide a bit more detail about what demographic information was asked for. Ideally, please include a copy of the online survey as a supplementary material and refer to it in the Methods. - It is explained that invitations to the survey were sent out in May 2020. Please can you add for international readers some context as to the COVID19 situation in Australia at that time. Especially details on any government restrictions that were in place and whether these were national or not. - Also, how were the invitations framed – was it an open invitation to any Australian over 18, was participation incentivised? - Under Design, towards the end of page 5, it is explained that the authors 'outlined consent and ethics information' for participants but it is unclear exactly what ethics approval, if any, was required for this study. Please add details to clarify this including whether any ethics body were approached. - In Analysis, please provide brief details as to the relative experience/background of the researchers carrying out the analysis

	(Author1-3)
	- Please add an example or citation at the end of this text on page 'We used reflexive thematic analysis,15 an approach widely utilised in psychology and story completion analysis'
	- Please consider whether the following text better fits at the start of Results rather than under Analysis: 'We identified four meta-themes across the stories: 1. Expressions of Mental Distress linked to COVID-19; 2. Various Coping Strategies offered by Ali and other characters in stories; 3. Narratives outlining Social Supports offered to alleviate distress; and 4. Specialised COVID-19 Vocabulary.'
	- It is not clear what the superscripted Roman numerals are used for in the Results section.
	- Could the demographics results be better presented in a table (or are the authors avoiding small cell counts?) and before the themes are presented?
	- At the end of the Results, on page 14 and 15, the authors reflect that 'The lack of significant ethnic and cultural diversity in our cohort signalled that we had not utilised story completion in appropriate ways for diverse cultural groups. This led us to develop recommendations to decolonise story completion.37' Please can you expand on this and add further reflection on how the chosen story stem may have influenced participant responses. I think there are potentially many other explanations for the lack of ethnic and cultural diversity in your sample. For example, the population invitations were sent to may not have been a diverse population to start with? This study may provide a useful reference on this topic: https://www.researchgate.net/profile/Chris-Graham-3/publication/255650786_Increasing_response_rates_amongst_black_and_minority_ethnic_and_seldom_heard_groups/links/55701f2c08aefcb861ddbdff/Increasing-response-rates-amongst-black-and-minority-ethnic-and-seldom-heard-groups.pdf
	- Some limitations are discussed but a Limitations (and strengths) section would make it clearer exactly what the authors understand to be the limitations of this study which will in turn help the reader to more accurately interpret the results for themselves. It may also facilitate other qualitative researchers using story completion to improve their own methods.

REVIEWER	Liu, Weizhi Naval Medical Research Institute
REVIEW RETURNED	26-Oct-2021

GENERAL COMMENTS	This study reported on data generated from story completion with a COVID-19 scenario. Although this paper has some innovations, there are still some limitations which will be described below: 1. Introduction was inadequate. The context related to mental health should be mentioned in this part. 2. The process of data analysis is not clearly described. Methods and procedures of classification within each theme need to be described. 3. The description of conclusion was unclear. The conclusion author made did not cover the results well. Nor is it closely related to mental health in the title. 4. A figure about demographic data is needed.

VERSION 1 – AUTHOR RESPONSE

Reviewer: 1. Dr. Christian Dalton-Locke, UCL

1. Thank you for the opportunity to review this manuscript. It is a very interesting study using an underutilised qualitative method: story completion, which will hopefully demonstrate to other qualitative researchers the potential value of using this method in their own work. I have added below a number of suggested changes.
Thank you for your detailed and helpful feedback, we appreciate your close consideration of the text and believe your guidance has helped us improve the paper.

2. Please add a 'Methods' title for the section 'Design' and 'Analysis' to fall under.
We have included a Methods heading as directed.

3. The Design section could be broken down into several smaller sections to improve clarity, for example: Design, Participants, Data collection/ Online survey.
We have restructured the Design section as directed for greater clarity.

4. On page 6, it is unclear what the sentence is referring to 'The length of stories submitted varied from one sentence to a lengthy paragraph. The former identified the next step or action the protagonist would take, while the latter was either reflective or followed a narrative arc with a beginning, middle and end (orientation, complication, resolution).' If this text is describing the responses provided by participants, then it should be moved from the Methods to Results section.
We have rewritten the sentence identified and moved this discussion to the Results section. The sentence now reads: Participants produced 52 stories. The length of each story varied from one sentence to a lengthy paragraph. Typically, short stories covered the next step or action the protagonist would take in immediate response to the situation outlined in the stem. Longer stories outlined a narrative arc with a beginning, middle and end (orientation, complication, resolution), or contained reflections on the situation the protagonist faced.

5. Please provide a bit more detail about what demographic information was asked for. Ideally, please include a copy of the online survey as a supplementary material and refer to it in the Methods.
Detailed demographic results have now been included in the form of a table. Given the level of detail in the table we have not included a copy of the demographic survey as a supplementary document. However, please let us know if this supplementary material should also be included.

6. It is explained that invitations to the survey were sent out in May 2020. Please can you add for international readers some context as to the COVID-19 situation in Australia at that time. Especially details on any government restrictions that were in place and whether these were national or not.
We have included this background information under the Data Collection heading. The text now includes the following statement: We began participant recruitment in May 2020. At the time, various COVID-19 related restrictions in place across all states and territories were beginning to ease slightly. For example, in Australia's most populous state, New South Wales, strict restrictions aimed at limiting the spread of COVID-19 began to relax in May 2020. For instance, a household was allowed up to five visitors at one time, up to ten people could gather outdoors, and cafes and restaurants could seat a maximum of 10 people. However, various restrictions on physical distancing, travel across state and territory borders, and international travel remained in place.

7. Also, how were the invitations framed – was it an open invitation to any Australian over 18, was participation incentivised?
This is correct, invitations were opened to people living in Australia who were aged over 18 years. We have added information about incentivisation under the Data Collection heading.

8. Under Design, towards the end of page 5, it is explained that the authors 'outlined consent and ethics information' for participants but it is unclear exactly what ethics approval, if any, was required for this study. Please add details to clarify this including whether any ethics body were approached.
We have added the following under the Design heading: Ethics approval was sought from the [removed for review] Human Research Ethics Committee and approval was gained in May 2020 (Approval Number: [removed for review]). We have also included an Ethics Statement as outlined in our response to the Editor comments.

9. In Analysis, please provide brief details as to the relative experience/background of the researchers carrying out the analysis (Author 1-3)
We have added the following: Author 2 and Author 3 are senior researchers and have extensive experience using arts-based qualitative methods in the context of participatory sociological and psychological research on mental health and social inclusion. Author 1 is an early-career, postdoctoral researcher who trained as a social anthropologist and has also used arts-based research methods to collect data on mental health. This was the first time members of the research team had used story completion as a research method. We have used thematic analysis extensively in previous work.

10. Please add an example or citation at the end of this text on page 'We used reflexive thematic analysis, an approach widely utilised in psychology and story completion analysis'
We have added citations as directed and amended the sentence slightly for clarity.

11. Please consider whether the following text better fits at the start of Results rather than under Analysis: 'We identified four meta-themes across the stories: 1. Expressions of Mental Distress linked to COVID-19; 2. Various Coping Strategies offered by Ali and other characters in stories; 3. Narratives outlining Social Supports offered to alleviate distress; and 4. Specialised COVID-19 Vocabulary.'
We have moved this text to the Results section as suggested.

12. It is not clear what the superscripted Roman numerals are used for in the Results section.
The superscripted Roman numerals refer to endnotes. We apologise for the confusion. Please advise if these endnotes need to be removed or integrated into the body of the text.

13. Could the demographics results be better presented in a table (or are the authors avoiding small cell counts?) and before the themes are presented?
Detailed demographic information is now presented in a table. The table and discussion regarding demographics have been moved to the start of the Results section.

14. At the end of the Results, on page 14 and 15, the authors reflect that 'The lack of significant ethnic and cultural diversity in our cohort signalled that we had not utilised story completion in appropriate ways for diverse cultural groups. This led us to develop recommendations to decolonise story completion.37' Please can you expand on this and add further reflection on how the chosen story stem may have influenced participant responses. I think there are potentially many other explanations for the lack of ethnic and cultural diversity in your sample. For example, the population invitations were sent to may not have been a diverse population to start with? This study may provide a useful reference on this topic: https://www.researchgate.net/profile/Chris-Graham3/publication/255650786_Increasing_response_rates_amongst_black_and_minority_ethnic_and_seldom_heard_groups/links/55701f2c08aefcb861ddbdff/Increasing-response-rates-amongst-black-and-minority-ethnic-and-seldom-heard-groups.pdf
Thank you for your suggestion. We have rewritten this section of the text to acknowledge this issue and have included a citation to the suggested paper as it is relevant. This discussion has been moved

to the Strengths and Limitations section at the end of the paper. The text now reads: Another limitation of this study was the lack of significant ethnic and cultural diversity in our cohort. This perhaps signals that we did not utilise story completion in culturally appropriate ways nor paid enough attention to the recruitment strategy to engage more diverse respondents. For example, our stem (which we developed in line with the accepted story completion approach) privileged western modes of story construction, with participants being asked to complete a story by providing a middle and end to the beginning offered by the stem. This approach may not have appealed to those familiar with other storytelling approaches grounded in distinct sociocultural contexts. A lack of diversity in our sample may also have been the result of our recruitment strategy via social media. In the future, these shortcomings could be addressed through the collaborative co-creation of a stem with a diverse participant advisory group, and via deliberative recruitment to ensure cultural diversity. These considerations have led us to develop recommendations to decolonise story completion.

15. Some limitations are discussed but a Limitations (and strengths) section would make it clearer exactly what the authors understand to be the limitations of this study which will in turn help the reader to more accurately interpret the results for themselves. It may also facilitate other qualitative researchers using story completion to improve their own methods.
We have included a section dedicated to strengths and limitations at the end of the paper. We also note the presence of an overview of strengths and limitations at the opening of the paper.

Reviewer: 2 Dr. Weizhi Liu, Naval Medical Research Institute

1. Comments to the Author: This study reported on data generated from story completion with a COVID-19 scenario. Although this paper has some innovations, there are still some limitations which will be described below.
Thank you for your feedback on the paper, and points regarding limitations. We have sought to address these as directed.
2. Introduction was inadequate. The context related to mental health should be mentioned in this part.
We have added additional information regarding our interest in the mental health impact of the pandemic in the first part of the paper. We have added the following text at the beginning of the Design section: We used digital story completion to gather narratives from Australians coping with physical distancing and social restriction measures in place from March 2020. We were particularly interested in the pandemic's impact on mental health and wellbeing as, at the time, government and media discourse often focused on mental health concerns resulting from the management of COVID-19. For example, in April 2020 the New South Wales Government announced a $73 million dollars support package intended to support mental wellbeing during the pandemic.
3. The process of data analysis is not clearly described. Methods and procedures of classification within each theme need to be described.
Thank you for pointing this out. We have included an overview of the analysis process. We have also included a citation to another paper we have authored that specifically focuses on the analysis process we undertook for this project if readers wish to read more. The following has been included under the Analysis heading:
The data analysis process involved the following phases. A detailed overview of this process is described elsewhere.
1.   Familiarisation: All researchers reviewed all stories to get a sense of the data set as a whole.
2.   Initial Coding: Author1 read all the stories and Author2 and Author3 read half each, so that each story was read at least twice. We recorded our initial thoughts using two headings: (i) "Are there particular storylines? What are the 'turning points' or what Fels calls 'tug on the sleeve' moments? Are there repeated patterns of meaning?" and (ii) "Key themes".
3.   Identification of Themes: We identified the most prominent or important elements in the stories, before engaging in collaborative analysis to produce an initial set of themes (or codes).

4.   Refining Themes: We collaboratively reviewed themes and iteratively refined our coding structure to identify the overarching themes which characterised the data set. This led to the identification of four meta-themes described below.

4. The description of conclusion was unclear. The conclusion author made did not cover the results well. Nor is it closely related to mental health in the title.
We have included more explicit connections to mental health in this conclusion. We note that the Discussion section provides specific engagement with data results as they relate to mental health and wellbeing (and attendant coping strategies and social supports). We sought to use the Conclusion and Strengths and Limitations Sections to reflect on the potential and shortcomings of the story completion method and to consider direction for further research. Finally, we are hopeful that the changes made to the manuscript in response to Review 1 will address general concerns articulated here.

5. A figure about demographic data is needed.
A table outlining demographic data has been included as directed.

VERSION 2 – REVIEW

REVIEWER	Dalton-Locke, Christian UCL, Division of Psychiatry
REVIEW RETURNED	06-Dec-2021

GENERAL COMMENTS	Thank you for addressing the comments. Some of the cell sizes in the demographics table are quite small and the variable categories could be made broader to address this.

REVIEWER	Liu, Weizhi Naval Medical Research Institute
REVIEW RETURNED	08-Dec-2021

GENERAL COMMENTS	This study reported on data generated from story completion with a COVID-19 scenario. Although this paper has some innovations, there are still some limitations which will be described below: 1. Introduction was inadequate. The context related to mental health should be mentioned in this part, e.g., you can cite: Zhou, Y. G. , Shang, Z. L. , Zhang, F. , Wu, L. L. , & Liu, W. Z. . (2021). Ptsd: past, present and future implications for china. Chinese Journal of Traumatology (English Edition)(Suppl 5). Wu, L. , Guo, X. , Shang, Z. , Sun, Z. , & Liu, W. . (2020). China experience from covid-19: mental health in mandatory quarantine zones urgently requires intervention. Psychological Trauma Theory Research Practice and Policy, 12(S1). I believe it will be of great help. 2. The description of conclusion in abstract was unclear. It was not closely related to mental health in the title.

VERSION 2 – AUTHOR RESPONSE

Reviewer: 1. Dr. Christian Dalton-Locke, UCL

1) Thank you for addressing the comments. Some of the cell sizes in the demographics table are quite small and the variable categories could be made broader to address this.
We have amended the demographics table to limit small cell sizes. However, we have retained some small cells where broader categories do not capture cohort diversity (e.g. self-reported ethnicity and gender).

Reviewer 2. Dr. Weizhi Liu, Naval Medical Research Institute

1) Introduction was inadequate. The context related to mental health should be mentioned in this part, e.g., you can cite: Zhou, Y. G. , Shang, Z. L. , Zhang, F. , Wu, L. L. , & Liu, W. Z. . (2021). Ptsd: past, present and future implications for china. Chinese Journal of Traumatology (English Edition)(Suppl 5). Wu, L. , Guo, X. , Shang, Z. , Sun, Z. , & Liu, W. . (2020). China experience from covid-19: mental health in mandatory quarantine zones urgently requires intervention. Psychological Trauma Theory Research Practice and Policy, 12(S1). I believe it will be of great help.
Thank you for this observation and for the suggested scholarship. We have expanded the introduction to provide an overview of context relating to mental health and cited work suggested by the reviewer that informed our redrafting of the introduction.

2) The description of conclusion in abstract was unclear. It was not closely related to mental health in the title.
We have rewritten the conclusion in the abstract to enhance clarity and explicitly connect to the mental health/wellbeing implications of COVID as captured in stories: "We cautiously propose that points of convergence across stories indicate a level of shared experience among participants relating to COVID-19 in Australia. We suggest this is due to intensive media coverage of the pandemic, persistent public-health messaging, engagement with social media and instant messaging technologies, and extended lockdowns that impacted the mental health of vast numbers of Australians".