

# RESEARCH ETHICS BOARDS

# APPLICATION FORM

**Prospective Research**

This form should only be used if new data will be collected. For research involving only secondary use of existing information (such as health records, student records, survey data or biological materials), use the *REB Application Form – Secondary Use of Information for Research.*

This form should be completed using the [*Guidance for Submitting an Application for Research Ethics Review*](https://cdn.dal.ca/content/dam/dalhousie/pdf/research-services/REB/Dal%20REB%20Application%20Instructions%20-%20Prospective%20Research%20%20v2019-11.pdf).

## SECTION 1. ADMINISTRATIVE INFORMATION [File No: office only]

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| Indicate the preferred Research Ethics Board to review this research:  [ ] Health Sciences OR [X] Social Sciences and Humanities |

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| **Project Title:**  Improving the Usability of Password Managers |

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| **1.1** **Research team information** | | | | | | | |
| Lead researcher  (at Dalhousie) | Name | Ms Shehzeen | | | | | |
| Email (@dal) | shehzeen@dal.ca | | Phone | | | Please use email |
| Banner # | B00812551 | | Academic Unit | | | Computer Science |
| Co-investigator names, affiliations, and email addresses | Caleidgh Bayer, Dalhousie University, Computer Science  André Gagné, Dalhousie University, Computer Science  Sunny Jagasia, Dalhousie University, Computer Science  Sithara Jayachandran, Dalhousie University, Computer Science  Zachary Wilkins, Dalhousie University, Computer Science | | | | | | |
| Contact person for this submission (if not lead researcher) | Name | N/A | | | | | |
| Email |  | | | Phone |  | |
| Study start date | March 1, 2020 | | Study end date | | April 30, 2020 | | |

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| **1.2** **For student submissions** (including medical residents and postdoctoral fellows) | | | |
| Degree program |  | | |
| Supervisor name and department |  | | |
| Supervisor Email (@dal) |  | Phone |  |
| Department/unit ethics review (if applicable). **Undergraduate minimal risk research only**. | | | |
| Attestation: [ ] I am responsible for the unit-level research ethics review of this project and it has been approved.  Authorizing name:  Date: | | | |

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| **1.3** **Other reviews** | | | | |
| Other ethics review (if any) for this research | | Where? | N/A | |
| Status? |  | |
| Scholarly/scientific peer review (if any) | N/A | | | |
| Is this a variation on, or extension of, a previously approved Dal REB submission? | | | | [X] No  [ ] Yes Dal REB file #\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
| **If yes**, describe which components of the current submission are the same as the previously approved submission (list section numbers), and which components are different from the previously approved submission (list section numbers). You may also use highlighting to clearly indicate revised text. | | | | |

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| **1.4** **Funding**  [X] Not Applicable | | |
| Funding (list on consent form) | Agency |  |
| Award Number |  |
| Institution where funds are/will be held | [ ] Dalhousie University  [ ] Other: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |

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| **1.5 Attestation(s).** The appropriate boxes *must* be checked for the submission to be accepted by the REB |
| **[X]** I am the **lead researcher** (at Dalhousie) named in section 1.1. I agree to conduct this research following the principles of the Tri-Council Policy Statement *Ethical Conduct for Research Involving Humans* ([TCPS](http://www.pre.ethics.gc.ca/eng/policy-politique_tcps2-eptc2_2018.html)) and consistent with the University [*Policy on the Ethical Conduct of Research Involving Humans*](http://www.dal.ca/dept/university_secretariat/policies/human-rights---equity/ethical-conduct-of-research-involving-humans-policy.html).  I have completed the TCPS Course on Research Ethics ([CORE](http://tcps2core.ca/welcome)) online tutorial.  [X] Yes [ ] No  For Supervisors (of student / learner research projects):  **[ ]** I am the **supervisor** named in section 1.2. I have reviewed this submission, including the scholarly merit of the research, and believe it is sound and appropriate. I take responsibility for ensuring this research is conducted following the principles of the [TCPS](http://www.pre.ethics.gc.ca/eng/policy-politique_tcps2-eptc2_2018.html) and University [Policy](http://www.dal.ca/dept/university_secretariat/policies/human-rights---equity/ethical-conduct-of-research-involving-humans-policy.html).  I have completed the TCPS Course on Research Ethics ([CORE](http://tcps2core.ca/welcome)) online tutorial.  [ ] Yes [ ] No |

## SECTION 2. PROJECT DESCRIPTION

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| **2.1 Lay summary** |
| 2.1.1 In **plain language**, describe the rationale, purpose, study population and methods to be used. Include a summary of background information or literature to contextualize the study. What new knowledge, or public or scientific benefit is anticipated? [maximum 500 words]  Passwords, despite their established weaknesses, are the overwhelmingly popular choice for protecting digital resources. As users need to curate a growing number of these password-protected accounts, password managers have been created to ease the burden. Not all of these managers are created equally, however, and they offer varying levels of security and convenience. This is contradictory to their goal of ensuring that users can easily and securely access their various passwords. We have conducted a literature survey, and established a set of criteria for a proposed password manager.  In this study, we seek to understand how and why participants use password managers. Furthermore, we will gather feedback on our proposed password manager. We are particularly interested in programmatic password generation, as randomized passwords tend to be much more secure than meaningful words or phrases. We would like our proposed password manager to encourage users to generate passwords, rather than recycle previously used passwords.  Our study population has the potential to be very broad. Our only essential requirement is that the participants have Internet access and a device to complete the questionnaire on. We want to encourage a diversity of opinions, so we will ensure that we have adequate representation from each populated continent.  The participants will fill out an online questionnaire, lasting no more than 10 minutes. In this time, the users will identify their experience and preference for password managers, before being led through the operation of our proposed password manager. Participants will then answer preference-based questions on the proposal. Finally, the questionnaire will collect basic and broad demographic information.  The public benefit of this study will be twofold. We will present our research and recommendations, and create a prototype browser-based password manager. While we recognize that our prototype is unlikely to dethrone the leading password managers, we hope that our recommendations and prototype spur others to enhance their own solutions. In this way, the digital public will be more securely protected against account breaches.  [X] This is a pilot study.  [ ] This is a fully developed study. |
| 2.1.2 Phased review. If a phased review is being requested, describe why this is appropriate for this study, and which phase(s) are included for approval in this application. Refer to the [guidance document](https://cdn.dal.ca/content/dam/dalhousie/pdf/research-services/REB/Dal%20REB%20Application%20Instructions%20-%20Prospective%20Research%20%20v2019-11.pdf) before requesting a phased review.  [X] Not applicable |

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| **2.2** **Research question** |
| State the research question(s) or research objective(s).  There are two objectives for our research:   1. Understand the rationale and preferences of users who employ password managers 2. Ascertain the usability of our wireframe prototype by comparing responses to UI designs which use opt in/opt out password generation |

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| **2.3** **Recruitment** |
| 2.3.1 Identify the study population. Describe and justify any inclusion / exclusion criteria. Also describe how many participants are needed and how this was determined.  Given the broad distribution of computers, the only basic requirement of our study population is access to the Internet and a device upon which to complete the questionnaire. We assume that users without Internet access have little knowledge or interest in a password manager for online accounts. The only people excluded from participating in the study are the researchers and their immediate relations. This will avoid “primed” participants. To ensure that individuals with diverse views are represented, we would ideally like to recruit at least 20 participants each hailing from Asia, Europe, and North America. Recognizing that this is a difficult task, we aim to draw upon the vibrant international student population at Dalhousie and Saint Mary’s. We believe these numbers are feasible, while still allowing for nuance between answers. Accordingly, we will require at least 60 participants. Fortunately, there is no upper bound on the allowable number of participants. |
| 2.3.2 Describe recruitment plans and append recruitment instruments. Describe who will be doing the recruitment and what actions they will take, including any screening procedures.  Recruitment will be a team effort, but the leaders in this endeavour will be Sunny, Sithara and Shehzeen. Their multilingual capabilities will be an asset, as it will allow for our study to be localized for non-English speakers. André will also assist with French translations and recruitment.  The recruitment process will occur primarily through digital communications, ensuring that the potential participants have Internet access. We will send an email message to the Dalhousie community, as well as post on public forums, such as Reddit and Facebook groups. We will also encourage our classmates to share the survey link with their online peers. |
| 2.3.3 If you require permission, cooperation, or participation from a community, organization or company to recruit your participants, describe the agreement obtained from the relevant group(s). Attach correspondence indicating their cooperation and/or support (required). Describe any other community consent or support needed to conduct this research. (If the research involves Indigenous communities complete section 2.11).  [X] Not applicable |

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| **2.4** **Informed consent process** |
| 2.4.1 Describe the informed consent process:  A) How, when and by whom will the study information be conveyed to prospective participants? How will the researcher ensure prospective participants are fully informed?  The study information will be conveyed to the participants through a consent form that is immediately displayed upon opening the questionnaire. These words will be the united voice of the research group, and our names will be listed accordingly. The participant will have to read this form and indicate their fully informed consent through a question at the bottom of the consent form. They will be unable to proceed without having done so.  B) Describe how consent will be documented (e.g. written signature, audio-recorded, etc).  As a signature would work against an anonymous survey, an affirmative response to the question posed at the end of the consent form will be sufficient to document participant consent.  [X] Append copies of all consent information that will be used (e.g. written consent document, oral consent script, assent document/script, etc).  *Note: If the research will involve third party consent (with or without participant assent), and/or ongoing consent, ensure these are described above.* |
| 2.4.2 Discuss how participants will be given the opportunity to withdraw their participation (and/or their data) and any time (or content) limitations on this. If participants will not have the opportunity to withdraw their participation and/or their data explain why.  The participants will be able to withdraw their participation at any time during the questionnaire by simply closing their browser. Any incomplete questionnaires will not be used for analysis, and promptly deleted. After a user has submitted their response, they will be unable to withdraw their participation. The reasoning behind this is that since all responses are anonymous, it is impossible for the researchers to know which response to delete. |
| 2.4.3 If an alteration/exception to the requirement to seek prior informed consent is sought, address the criteria in TCPS article [3.7A](http://www.pre.ethics.gc.ca/eng/tcps2-eptc2_2018_chapter3-chapitre3.html#b). If the alteration involves deception or nondisclosure, also complete section 2.4.4.  [X] Not applicable |
| 2.4.4 Describe and justify any use of deception or nondisclosure and explain how participants will be debriefed.  [X] Not applicable |

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| **2.5** **Methods, data collection and analysis** |
| 2.5.1  A) Where will the research will be conducted?  The research will be conducted in the Faculty of Computer Science at Dalhousie University. The questionnaire will be administered in the web browsers of the participants. All analysis will be done within the confines of the Dalhousie University.  B) What will participants be asked to do?  Participants will be asked to answer approximately 21 questions in an anonymous, online survey on browser-based password managers, as well as give feedback on a proposed implementation.  C) What data will be collected using what research instruments? *(Note that privacy and confidentiality of data will be covered in section 2.6)*  All data will be collected using Google Forms. Participants will answer questions by selecting from a predefined list (multiple choice), as well as through free-form text boxes where appropriate.  There will be two types of data collected: experience/preference for password managers and demographic. The former will consist of the user’s preferences in regard to password managers, and their feedback on the proposed solution. The latter will consist of broad, non-identifying demographic information, such as ethnicity, age, education, and residency.  D) How much of the participant’s time will participation in the study require?  We anticipate that the questionnaire will take no more than 10 minutes for participants to complete.  [X] Append copies of all research instruments (questionnaires, focus group questions, standardized measures, etc)  [ ] This is a clinical trial (physical or mental health intervention) – ensure section 2.12 is completed |
| 2.5.2 Briefly describe the data analysis plan. Indicate how the proposed data analyses address the study’s primary objectives or research questions.  The preference and habit related questions will be analyzed to confirm our hypotheses regarding the reasons for using a password manager. As well, we will tailor our prototype according to the priorities expressed by the user. As these questions are primarily boolean in nature, the analysis will be more focused on trends that occur within demographic groups. This will allow us to consider how other communities outside of our own may be affected by recommendations we deliver.  For the wireframe prototype preference questions, we have a broader range of responses, but they are still quantitative in nature. Again, we will consider prominent and/or vulnerable demographic groups in our analysis. We can then design our prototype such that it can appeal to the broadest possible group, or even be customized according to user preference. |
| 2.5.3 Describe any compensation that will be given to participants and how this will be handled for participants who do not complete the study. Discuss any expenses participants are likely to incur and whether/how these will be reimbursed.  There will be no compensation given to participants for this study. The study can be conducted with devices already owned by the user. This is ensured by requiring all participants have an active Internet connection. |

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| **2.6** **Privacy and confidentiality** |
| 2.6.1  A) Describe who will have knowledge of participants’ identities.  None of the researchers will have knowledge of the participants or their identities.  B) Describe the level of identifiability of the study data (anonymous, anonymized, de-identified/coded, identifying) (see [TCPS Chapter 5A – types of information](http://www.pre.ethics.gc.ca/eng/tcps2-eptc2_2018_chapter5-chapitre5.html#a) for definitions).  The questionnaire will collect anonymous data only. The demographic section could potentially contain indirectly identifying information, but this will be mitigated by broad bucketting of information. For example, the age range (e.g.: 25-35 years old) of an individual can be asked, rather than the specific year of birth.  C) Specify which members of the research team (or others) will have access to participants’ data and for what purpose.  Only the researchers will have access to the raw data collected. Given the small and collaborative nature of the team, the data will be accessible to any of us for the purpose of improving the prototype, as well as data analysis.  D) Describe measures to ensure the privacy and confidentiality of study documents and participant data during the data collection and analysis phase. *[Note that plans for long term storage will be covered in 2.6.2*]   * Address: handling of documents/data during data collection; transportation or transfer of documents/data; storage of documents/data (during the study). * ~~If a key-code will be maintained, describe how it will be kept secure.~~ * For electronic data, describe electronic data security measures, including file encryption and/or password protection [as applicable](https://cdn.dal.ca/content/dam/dalhousie/pdf/research-services/REB/Protecting%20Electronically%20Stored%20Personally%20Identifiable%20Research%20Data.pdf). * ~~For hard copy documents, describe physical security measures (specify location).~~   Data will be collected through the online questionnaire, administered by Google Forms and stored in Google Drive. As Google enforces SSL/TLS encryption in these applications, all correspondence will be encrypted as it travels across the internet. This will also be the case as the data is accessed by the researchers. Researchers must provide their own personal account information (email and password) to access Google Drive, which positively contributes to the secure measures that will be taken. Two-factor authentication is available and encouraged, further protecting access to the data.  [ ] This research involves personal health records (ensure section 2.13 is completed) |
| 2.6.2 Describe plans for data retention and long-term storage (i.e. how long data will be retained, in what form and where). Will the data eventually be destroyed or irreversibly anonymized? If so, what procedures will be used for this? Discuss any plans for future use of the data or materials beyond the study currently being reviewed.  The data from the study will be retained for no more than 12 months after the conclusion of the study and report of the results. The data will be retained in Google Drive during this time. At an appropriate time after the results are published, the data will be removed from Google Drive, and any local copies will be erased. The study data will be preserved in aggregate form through the published paper, ensuring that it can continue to inform future work.  [ ] This research will be deposited in a data repository (ensure section 2.14 is completed) |
| 2.6.3  Describe if/how participant confidentiality will be protected when research results are reported:  A) For quantitative results - In what form will study data be disseminated?  [ ] Only aggregate data will be presented  [X] Individual de-identified, anonymized or anonymous data will be presented  [ ] Other. If “other”, briefly describe dissemination plans with regard to identifiability of data.  [ ] Not applicable, only qualitative data will be presented  B) For qualitative results - Will identifiable data be used in research presentations/publications? If participants will be quoted, address consent for this and indicate whether quotes will be identifiable or attributed.  [ ] Not applicable, only quantitative data will be presented  No identifying information will be collected. Demographic information will only be presented in aggregate form. Direct quotations from participants are possible. Any selected quotations will contain no identifying information. The participants are explicitly informed in the consent form that by submitting responses to short-form answer questions they are consenting to being quoted in the final paper. |
| 2.6.4 Address any limits on confidentiality, such as a legal duty to report abuse or neglect of a [child](https://novascotia.ca/coms/families/changestoCFSA/Duty-to-Report.pdf) or [adult in need of protection](https://nslegislature.ca/sites/default/files/legc/statutes/adult%20protection.pdf), and how these will be handled. Ensure these are clear in the consent documents. (See the [guidance document](https://cdn.dal.ca/content/dam/dalhousie/pdf/research-services/REB/Dal%20REB%20Application%20Instructions%20-%20Prospective%20Research%20%20v2019-11.pdf) for more information on legal duties and professional codes of ethics).  [X] Not applicable |
| 2.6.5 Will any information that may reasonably be expected to identify an individual (alone or in combination with other available information) be accessible outside Canada? And/or, will you be using any electronic tool (e.g. survey company, software, data repository) to help you collect, manage, store, share, or analyze personally identifiable data that makes the data accessible from outside Canada?  [X] No  [ ] Yes. If yes, refer to the University [*Policy for the Protection of Personal Information from Access Outside Canada*](http://www.dal.ca/dept/university_secretariat/policies/governance/protection-of-personal-information-policy-.html), and describe how you comply with the policy (such as securing participant consent and/or securing approval from the Vice President Research and Innovation). |

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| **2.7 Risk and benefit analysis** |
| 2.7.1 Discuss what risks or discomforts are anticipated for participants, how likely risks are and how risks will be mitigated. Address any particular ethical vulnerability of your study population. Risks to privacy from use of identifying information should be addressed. If applicable, address third party or community risk.  The risks and discomforts for participants are minimal. As no personally identifiable information is collected, linking an individual with a survey response is extremely difficult, even in the unlikely event of a data breach. We are storing our collected data in Google Drive, where the data is securely stored and only accessible to the research group. These accounts can be secured with two-factor authentication, further restricting access. |
| 2.7.2 Identify any direct benefits of participation to participants (other than compensation), and any indirect benefits of the study (e.g. contribution to new knowledge).  We plan to produce an open-source, prototype, browser-based password manager as part of our work. Accordingly, we would aim to offer this manager for general use at no cost to participants. This could be a direct benefit for those that choose to utilize the prototype.  Otherwise, their contributions will bring them indirect benefit through the advancement of usability and security in password managers. If we are successful, recommendations from our study may be applied to popular password managers. |

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| **2.8 Provision of results to participants and dissemination plans.** |
| 2.8.1 The TCPS encourages researchers to share study results with participants in appropriate formats. Describe your plans to share study results with participants and discuss the process and format.  As we are not collecting email addresses, we are not able to directly share study results with participants. That said, we have indicated in the consent form a URL that will contain links to the study results, and a date when the URL will be valid. Participants are encouraged to visit this URL after the study has been completed. The paper planned to be published in SOUPS 2021 will be available for review (elaborated on in 2.8.3). |
| 2.8.2 If applicable, describe how participants will be informed of any material incidental findings – a discovery about a participant made in the course of research (screening or data collection) that is outside the objectives of the study, that has implications for participant welfare (health, psychological or social). See [TCPS Article 3.4](http://www.pre.ethics.gc.ca/eng/tcps2-eptc2_2018_chapter3-chapitre3.html) for more information.  [X] Not applicable |
| 2.8.3 Describe plans for dissemination of the research findings (e.g. conference presentations, journal articles, public lectures etc.).  We plan to submit a paper to the Seventeenth Symposium on Usable Privacy and Security (SOUPS 2021), including a probable presentation at the conference. In anticipation of our successful submission, we would also like to present our work at the Dalhousie Computer Science In-house Conference (DCSI 2021). This will likely consist of a public presentation describing the results at a high-level for a general computer science audience. |

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| * 1. **Research Team** |
| 2.9.1 Describe the role and duties of all research team members (including students, RA’s and supervisors) in relation to the overall study.  Caleidgh Bayer: Front-end designer of prototype password manager  André Gagné: Back-end designer of prototype password manager  Sunny Jagasia: Study design and recruitment  Sithara Jayachandran: Concept artist and recruitment  Ms Shehzeen: Research ethics board application lead and recruitment  Zachary Wilkins: Study design, wireframe artist, research ethics board application lead |
| 2.9.2 Briefly identify any previous experience or special qualifications represented on the team relevant to the proposed study (e.g. professional or clinical expertise, research methods, experience with the study population, statistics expertise, etc.).  Our prototype designers have experience in software design through co-op terms and their studies at Dalhousie’s Faculty of Computer Science.  Our artists have experience designing and wireframing prototypes as part of their studies, as well as through industry experience.  One of our study designers (Sunny Jagasia) has taken a grad course in research methods. This course taught the principles of research design and methodological issues and methods, including experimental and quasi-experimental designs, survey research and sampling, measurement, and qualitative methods. |

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| **2.10 Conflict of interest** |
| Describe whether any dual role or conflict of interest exists for any member of the research team in relation to potential study participants (e.g. TA, fellow student, teaching or clinical relationship), and/or study sponsors, and how this will be handled.  [X] Not applicable |

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| **2.11** **Research involving Indigenous peoples**  Consult TCPS [Articles 9.1 and 9.2](http://www.pre.ethics.gc.ca/eng/tcps2-eptc2_2018_chapter9-chapitre9.html) in determining whether this section is applicable to your research.  [X] Not applicable – go to 2.12 |
| 2.11.1 If the proposed research is expected to involve people who are Indigenous, describe the plan for community engagement (per TCPS Articles [9.1 and 9.2](http://www.pre.ethics.gc.ca/eng/tcps2-eptc2_2018_chapter9-chapitre9.html#c)). Attach supporting letters, research agreements and other relevant documents, if available. If community engagement is not sought, explain why the research does not require it, referencing TCPS article 9.2. |
| 2.11.2 State whether ethical approval has been or will be sought from [Mi’kmaw Ethics Watch](https://www.cbu.ca/indigenous-affairs/unamaki-college/mikmaq-ethics-watch/) and if not, why the research does not fall under their purview. If the research falls under the purview of other Indigenous ethics groups, state whether ethical approval has been or will be sought. |
| 2.11.3 Describe any plans for returning results to the community and any intellectual property rights agreements negotiated with the community with regard to data ownership (see also 2.11.4 if applicable). If there are specific risks to the community involved, ensure these have been addressed in section 2.8.1. |
| 2.11.4 Does this research incorporate OCAP (Ownership, Control, Access, and Possession) principles as described in TCPS [Article 9.8](about:blank)?  [ ] Yes. Explain how.  [ ] No. Explain why not. |

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| **2.12** **Clinical trials**  [X] Not applicable – go to 2.13 |
| 2.12.1 Will the proposed clinical trial be registered?  [ ] No. Explain why not.  [ ] Yes. Indicate where it was/will be registered and provide the registration number. |
| 2.12.2 If a novel intervention or treatment is being examined, describe standard treatment or intervention, to indicate a situation of clinical equipoise exists (TCPS [Chapter 11](http://www.pre.ethics.gc.ca/eng/tcps2-eptc2_2018_chapter11-chapitre11.html)). If placebo is used with a control group rather than standard treatment, please justify. |
| 2.12.3 Clearly identify the known effects of any product or device under investigation, approved uses, safety information and possible contraindications. Indicate how the proposed study use differs from approved uses.  [ ] Not applicable |
| 2.12.4 Discuss any plans for blinding/randomization. |
| 2.12.5 What plans are in place for safety monitoring and reporting of new information to participants, the REB, other team members, sponsors, and the clinical trial registry (refer to TCPS [Articles 11.6, 11.7, 11.8](http://www.pre.ethics.gc.ca/eng/tcps2-eptc2_2018_chapter11-chapitre11.html))? These should address plans for removing participants for safety reasons, and early stopping/unblinding/amendment of the trial. What risks may arise for participants through early trial closure, and how will these be addressed? Are there any options for continued access to interventions shown to be beneficial? |

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| **2.13** **Use of personal health information**  [X] Not applicable |
| 2.13.1 Research using health information may be subject to Nova Scotia’s [*Personal Health Information Act*](http://novascotia.ca/dhw/phia/). Describe the personal health information ([definition explained in the guidance document](https://cdn.dal.ca/content/dam/dalhousie/pdf/research-services/REB/Dal%20REB%20Application%20Instructions%20-%20Prospective%20Research%20%20v2019-11.pdf)) required and the information sources, and explain why the research cannot reasonably be accomplished without the use of that information. Describe how the personal health information will be used, and in the most de-identified form possible. |
| 2.13.2 Will there be any linking of separate health data sets as part of this research?  [ ] No  [ ] Yes  If yes:  A) Why is the linkage necessary?  B) Describe how the linkage will be conducted (it is helpful to append a flow diagram)  C) Does that linkage increase the identifiability of the participants? |
| 2.13.3 Describe reasonably foreseeable risks to privacy due to the use of personal health information and how these will be mitigated. |

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| **2.14** **Data Repositories**  [X] Not applicable |
| 2.14.1 Identify and describe the data repository in which the research data will be deposited. What is its focus, who are its target users, who can access deposited data and under what circumstances? For how long will the data be kept in the repository? |
| 2.14.2 Describe the data set to be released to the repository. If there is personal and/or sensitive information in the data, describe how you will prepare the data for submission to the repository and mitigate risks to privacy. Identify all fields that will be included in the final data set (include as an appendix). |
| 2.14.3 Is agreeing to have one’s data deposited a requirement for participation in the study? If yes, provide a justification. If no, indicate how participants can opt in or out. |

## SECTION 3. APPENDICES

**Appendices Checklist.** Append all relevant material to this application in the order they will be used. This may include:

[X] Recruitment documents (email recruitment notice)

[X] Consent/assent documents or scripts (consent form)

[X] Research instruments (questionnaire)