**National College of Ireland**

**DECLARATION OF ETHICS CONSIDERATION**

**School of Computing**

|  |  |  |  |
| --- | --- | --- | --- |
| **Student Name:** | … Manoj Santhoju | | |
| **Student ID:** | 23394544 | | |
| **Programme** | ……… Research in Computing CA1 | **Year:** | ……………………….. |
| **Module:** | ………………………………………………………………………………………………………….……… | | |
| **Project Title:** | Memory Forensics in Modern Operating Systems: Techniques and Tool Comparison | | |

**Please circle (or highlight) as appropriate**

|  |  |
| --- | --- |
| This project involves human participants | Yes / No ✓ |

# **Introduction**

Secondary data refers to data that is collected by someone other than the current researcher. Common sources of secondary data for social science include censuses, information collected by government departments, organizational records and data originally collected for other research purposes. Primary data, by contrast, is collected by the investigator conducting the research.

A project that does not involve human participants requires ONLY completion of Declaration of Ethics Consideration Form and submission of the form on module’s Moodle page

A project that involves human participants requires ethical clearance and an Ethics Application Form must be submitted through the module’s Moodle page. Please refer to and ensure compliance with the ethical principles stated in NCI Ethics Form available on the Moodle page.

The following decision table will assist you in deciding if you have to complete the Declaration of Ethics Consideration Form or/and the Ethics Application Form.

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Public Data | Y | Y | Y | Y | N | N | N | N |
| Private Data | Y | Y | N | N | Y | Y | N | N |
| Human Participants | Y | N | Y | N | Y | N | Y | N |
|  |  |  |  |  |  |  |  |  |
| Declaration of Ethics Consideration Form | x | X | x | X | X | X | x |  |
| Ethics Application Form | X |  | X |  | X |  | X |  |

**Please circle (or highlight) as appropriate**

|  |  |
| --- | --- |
| The project makes use of secondary dataset(s) created by the researcher | ✓Yes / No |
| The project makes use of public secondary dataset(s) | ✓Yes / No |
| The project makes use of non-public secondary dataset(s)  Approval letter from non-public secondary dataset(s) owner received | Yes / No ✓  Yes / No✓ |

# **Sources of Data**:

***It is students’ responsibility to ensure that they have the correct permissions/authorizations to use any data in a study. Projects that make use of data that does not have authorization to be used, will not be graded for that portion of the study that makes use of such data.***

***Public Data***

*A project that makes use of public secondary dataset(s)* ***does not need ethics permission****, but* ***needs a letter/email from the copyright holder*** *regarding potential use.*

*Some websites and data sources allow their data sets to be used under certain conditions. In these cases, a letter/email from the copyright holder is NOT necessary, but the researcher should cite the source of this permission and indicate under what conditions the data are allowed to be used. See Appendix I for examples of permissions granted by Fingal Open Data, and Eurostat website.*

*Where websites or data sources indicate that they do not grant permission for data to be used, you will still need a letter/email from the copyright holder. For example, see Appendix II for an example from the Journal of Statistics Education.*

***Private Data***

*A project that makes use of non-public (private) secondary dataset(s) must receive data usage permission from School of Computing.*

***An approval letter/email from the owner*** *(e.g. institution, company, etc.)* ***of the non-public secondary dataset must be attached to the Declaration of Ethics Consideration****. The letter/email must confirm that the dataset is anonymised and permission for data processing, analysis and public dissemination is granted.*

**Evidence for use of secondary dataset(s)**

Include dataset(s)owner letter/email or cite the source for usage permission

1. **Name of the dataset, a brief description of its nature**

* [**Volatility foundation samples**](https://github.com/volatilityfoundation/volatility/wiki/Memory-Samples): A collection of publicly available memory dump files from the different operating systems such as Windows, Linux, macOS used for testing memory forensic tools and training.

1. **[citation of the paper if applicable]**

**Prada, A.** (2022) Memory Forensics Challenges. GitHub. Available at: <https://github.com/aleprada/memory-forensics-challenges>

1. **URL of the location of the dataset**

<https://github.com/volatilityfoundation/volatility/wiki/Memory-Samples>

1. **License of usage**

No formal license has been provided; this page mainly shares these datasets for **testing and research** purposes.

# **CHECKLIST**

|  |  |
| --- | --- |
| Non-public/private secondary dataset(s) -Owner letter/email is attached to this form  ***OR***  Citation and link to the web site where permission is granted – provided in this form | Yes / No ✓  ✓Yes / No |

## **ETHICS CLEARANCE GUIDELINES WHEN HUMAN PARTICIPANTS ARE INVOLVED**

**The Ethics Application Form must be submitted on Moodle for approval prior to conducting the work.**

Considerations in data collection

* Participants will not be identified, directly or through identifiers linked to the subjects in any reports produced by the study
* Responses will not place the participants at risk of professional liability or be damaging to the participants’ financial standing, employability or reputation
* No confidential data will be used for personal advantage or that of a third party

Informed consent

* Consent to participate in the study has been given freely by the participants
* participantshave the capacity to understand the project goals.
* Participantshave been given information sheets that are understandable
* Likely benefits of the project itself have been explained to potential participants
* Risks and benefits of the project have been explained to potential participants
* Participants have been assured they will not suffer physical stress or discomfort or psychological or mental stress
* The participanthas been assured s/he may withdraw at any time from the study without loss of benefit or penalty
* Special care has been taken where participantsare unable to consent for themselves (e.g children under the age of 18, elders with age 85+, people with intellectual or learning disability, individuals or groups receiving help through the voluntary sector, those in a subordinate position to the researcher, groups who do not understand the consent and research process)
* Participants have been informed of potential conflict of interest issues
* The onus is on the researcher to inform participants if deception methods have to be used in a line of research

**I have read, understood, and will adhere to the ethical principlesdescribed above in the conduct of the project work.**

|  |  |
| --- | --- |
| **Signature:** | Manoj Santhoju |
| **Date:** | ……………………………………………………………………………………………………………… |

# **Appendix I**

1. ***Fingal Open Data: http://data.fingal.ie/About***

Licence

Citizens are free to access and use this data as they wish, free of charge, in accordance with the Creative Commons Attribution 4.0 International License (CC-BY).

Note: From November 2010 to July 2015, data on Fingal Open Data was published in accordance with the PSI general licence.

Use of any published data is subject to Data Protection legislation.

Licence Statement

Under the CC-BY Licence, users must acknowledge the source of the Information in their product or application by including or linking to this attribution statement: “Contains Fingal County Council Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence”.

Multiple Attributions

If using data from several Information Providers and listing multiple attributions is not practical in a product or application, users may include a URI or hyperlink to a resource that contains the required attribution statements.

1. ***Eurostat: https://ec.europa.eu/eurostat/about/policies/copyright***

COPYRIGHT NOTICE AND FREE RE-USE OF DATA

Eurostat has a policy of encouraging free re-use of its data, both for non-commercial and commercial purposes. All statistical data, metadata, content of web pages or other dissemination tools, official publications and other documents published on its website, with the exceptions listed below, can be reused without any payment or written licence provided that:

* the source is indicated as Eurostat
* when re-use involves modifications to the data or text, this must be stated clearly to the end user of the information

# **Appendix II**

**Journal of Statistics Education: http://jse.amstat.org/jse\_users.htm**

JSE Copyright and Usage Policy

Unlike other American Statistical Association journals, the Journal of Statistics Education (JSE) does not require authors to transfer copyright for the published material to JSE. Authors maintain copyright of published material. Because copyright is not transferred from the author, permission to use materials published by JSE remains with the author. Therefore, to use published material from a JSE article the requesting person must get approval from the author.