***The* UNIVERSITY *of* NEWCASTLE**

**College of Engineering, Science and Environment**

**School of Electrical Engineering and Computing**

**COMP3330/6380 -- Machine Intelligence**

Semester 1, 2021

**Project part 1C: History and Philosophy (HiPhi) Assignment**

**(15 marks)**

This group project assessment contributes 15% of the total course mark. We recommend that you work in a team of 1-5 members.

There are two components:

1. **Abstract [4 marks]:** Due date for abstracts is **12 March 2021 (end of day)**
2. **Presentation or Report [11 marks]:** You can give a live presentation in class or in zoom or prepare presentation slides or a video or a report following the specifications given below. The deadline for submission for all teams is **5 May 2020 (end of day)**. Unless it is a live or zoom presentation the submission should be via Blackboard.

The content of this assignment can cover any interesting topic or project that is useful for us when learning Machine Intelligence. Examples are software systems or libraries for intelligent systems or learning algorithms, reports on industrial or business applications of AI or machine learning, movies about AI, the impact of AI on cyber security, the future of intelligent robots, games that use AI techniques, AI hardware, ML algorithms, mathematical aspects and computer art or music using AI. You can use the lecture of week one as well as associated recommended reading as inspiration to find possible topic ideas. Your presentation or report should also demonstrate an ability to project to future developments and discuss ethical implications of your presented topic or example.

**Organisation, Structure and Expectations**

**Abstract**

Please submit (using the attached HiPhi assignment marking sheet) the following information to blackboard before your presentation:

* Title of your presentation
* List of team members (name and student number)
* Please submit an abstract of about 100 words

The abstract should address, e.g., the following questions: What is your presentation/report about? How does it relate to or involve Machine Intelligence? Historical or philosophical key facts as appropriate, e.g.: When? Where? By whom? What are applications or special features?

**Presentation slides or video**

Teams can do a live presentation of about 15min in the lecture or in zoom. This is the default option and we will establish a schedule of presentations (This allows for live discussion with the attending class but lecture capture will not be released afterwards).

Alternatively, teams can prepare a ppt set or a video for a ~15 min presentation and submit this via Blackboard (note that these submissions will not be shared with the class).

**Report**

If you choose the report/paper alternative, please submit your written report to Blackboard. The report can include links to movies, images and background information as appropriate. Please use correct citations and make sure that you respect any relevant copyright and plagiarism regulations. (Expected length of the report: 6-8 pages.). The report should be formatted in Springer Verlag LNCS style format. The LNCS conference paper template is available e.g. at the following link:

<https://www.springer.com/gp/computer-science/lncs/conference-proceedings-guidelines>

**Learning Objectives**

This assignment should provide opportunity to develop communication skills. It addresses learning objectives 1, 2 and 5 of the course outline:

1. Critically reflect on ethics, opportunities and risks of current and future developments of Machine Learning and AI;

2. Explain central concepts of Machine Learning and AI;

5. Produce detailed reports and presentations suitable to support research or business decision-making.

**Teamwork**

This assignment should be conducted in teams of 1-5 students. Teams will be formed in week 2-3. Students can team up in the lecture breaks, in the labs or using our discussion board. It is expected that each student can contribute the equivalent of 3-5 mins of a 15 min presentation (video or ppt) and about two pages to the report. However, this is flexible and only a guide. A team can decide to distribute work differently within the group, e.g., by using roles such as presenter, writer, and researcher. If teams have similar topics we may merge or group them in our schedule consecutively. If you require assistance with team management, please let us know.

**Copyright**

A lot of the material available on the internet is copyrighted and its use for presentations and publication can be restricted. For each case please check the relevant agreement or license and follow the required regulations. In many cases you cannot directly include an image, but it may be possible to cite it or use a link to the material.

# HiPhi Presentation Marking Sheet, Sem. 1, 2021

Please fill in and use this form for submission of your abstract/proposal in Blackboard.

Then print this page and give a hardcopy to the lecturer before your presentation.

If you have to make any changes then update and resubmit this form.

**Date:**

**Title:**

**Format** (live in class, live-zoom, ppt, video, report):

**List of Group Members** (Name and student number, contribution/role):

2.)

3.)

4.)

5.)

**Abstract:**

[Above: To be filled in by the presenting team before presentation.]

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[Below: To be filled in by the lecturer/marker.]

**Marking Criteria**

The contribution should be interesting and of high quality**.**

1. **Abstract/Proposal mark (4 marks):**

*Formal correctness:* Title, team members, roles, ~100 words

*Clarity and expressiveness:* Can we understand what the contribution will be about and why it will be useful or interesting?

**2. Presentation (live, zoom, video, ppt) (11 marks)**:

* Innovation, originality and significance
* Structure and clearness of presentation
* What did we learn?
* Volume/depth of work (takes team size into account)
* Correctness of information
* Quality of presentation slides or video

or (!)

**Report (11 marks):**

Points that will be considered for marking a report include e.g.:

* Innovation, originality and significance
* Is there a motivating introduction?
* Is there a list and review of relevant background literature and context?
* Volume/depth of work (takes team size into account)
* Is the writing clear, concise and easy to follow?
* Are citations and the formatting correct (Springer LNCS)?
* Are relevant copyright regulations respected?
* Use of professional language and presentation.
* Length about 5-12 pages
* Is there a critical discussion or summary?