EXPLANATION OF RESEARCH

Project Title:	Evaluating Explainable Artificial Intelligence
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1. WHAT IS THE PURPOSE OF THIS FORM?

This form contains information you will need to help you decide whether to be in this research study sponsored by Department of Defense or not. Please read the form carefully and ask the study team member(s) questions about anything that is not clear.

2. WHY IS THIS RESEARCH STUDY BEING DONE?

The primary research question is to train and evaluate a set of explainable AI computer programs thru user studies. The training and evaluations will be based on how closely the output of each program matches with the user's understanding and how much user effort is involved in training and evaluation of the program. The example domains we study are going to be based on classifying and responding to texts and other visual images of animals, natural scenes, places and video game scenes.

3. WHAT WILL HAPPEN IF I TAKE PART IN THIS RESEARCH STUDY?

If you agree to participate, your involvement will consist of one session, which will last up to two hours. At the beginning of the session, you will be asked to fill out a set of questions which determine your eligibility to participate in the study. If you are eligible, you will then be asked a few questions about some relevant demographic information and will be directed to work with the user interface. If you are determined not to be eligible, your data will be removed from the system and you will be free to go. In the user study the system iteratively shows a set of images

or text or videos to you and asks you to respond appropriately, e.g., type, click, move, cluster, organize or annotate. You might be asked follow-up questions aiming at clarifying and deepening our understanding of the situation described. The user interface will log your activity while you are working with the user interface.

4. WHO IS ELIGIBLE TO PARTICIPATE IN THE STUDY?

Anyone between 18-80 years of age, is fluent in English and can use computer keyboard and mouse, and do not have visual and hearing impairments are eligible to participate in the study.

5. WILL I BE PAID FOR BEING IN THIS STUDY?

Each participant in the user-study will be paid at the rate of $5 for each 30 minutes of time.

6. WHO WILL SEE THE INFORMATION I GIVE?

The de-identified information will be publicly available. The personal information provided during this study will be kept confidential to the extent permitted by law. However, the Oregon State University Institutional Review Board (a committee that reviews and approves research studies involving human subjects) may inspect and copy records pertaining to this research.

Further, authorized representatives from the Department of the Navy Human Research Protection Program may review and/or obtain identifiable information related to your participation in this research study as part of their responsibility to protect human research subject volunteers. Some of these records could contain information that personally identifies you.

Because it is not possible for us to know what studies may be a part of our future work, we ask that you give permission now for us (or other researchers) to use your personal information without being contacted about each future study. Future use of your information will be limited to studies about user interfaces for machine learning and artificial intelligence. We will remove information that identifies you before it is shared or used in a new study, but there is still a chance that someone could figure out that the information is about you.

7. WHAT OTHER CHOICES DO I HAVE IF I DO NOT TAKE PART IN THIS STUDY?

Participation in this study is voluntary. Your decision to take part or not take part will not affect your grades, your relationship with your instructors, your relationship with your research group, or your standing in the university. If you decide to participate, you are free to withdraw at any time. If you choose to withdraw from this project before it ends, the researchers may use your de-identified data in the study with your permission.

By participating in the user study, *you are consenting that your de-identified data may be used by the research study group or possibly other researchers to conduct research in Explainable AI.*

If you have any questions about this research project, please contact: Dr. Prasad Tadepalli, tadepall@engr.orst.edu. If you have questions about your rights as a participant, please contact the Oregon State University Institutional Review Board office (IRB), at (541) 737-8008 or by e-mail at IRB@oregonstate.edu.