

SUBJECT INFORMATION SHEET FOR STUDY 2 (fMRI)

You are being invited to take part in a research study. Before you decide it is important for you to understand why the research is being done and what it will involve. Please take time to read the following information carefully and discuss it with friends, relatives and your doctors if you wish. Ask us if there is anything that is not clear or if you would like more information. Thank you for reading this.

1. What is the purpose of the study?

The purpose of this study is to understand the contribution of different brain areas during visual object recognition. The data collected from this experiment will give us insights into how objects are represented in the human brain.

2. Why have I been chosen?

You have been chosen at random to be part of this study. For this study we are only interested in recruiting normal individuals. By normal, we are assuming the absence of visual or motor deficits that would affect your performance in the task, and no cognitive deficits or a history of drug or alcohol abuse that may compromise this study.

3. Do I have to take part?

It is up to you to decide whether or not to take part. If you do decide to take part you will be given this information sheet to keep and be asked to sign a consent form. In addition you will be asked to fill out a questionnaire that will assess your suitability to undergo a functional Magnetic Resonance Imaging (fMRI) study. If you decide to take part, you are still free to withdraw at any time and without giving a reason. This will not affect your relations with IISc or your employer. Likewise the investigator also retains the right to terminate your participation at any time. The reason for termination may be recorded.

4. What will happen to me if I take part?

You will be asked to undergo an MRI scan. MRI is a common diagnostic tool used worldwide to study brain function as well as image other parts of the body. You will then be required to perform a simple visual task while lying inside the scanner. The task will consist of many hundreds of trials, with each trial lasting 2-3 seconds. On each trial, you will be asked to respond to the content of a visual image shown on the screen. The entire session will take typically 60-90 minutes. For taking part in this study you will be monetarily compensated. The compensation will comprise of a sum of 500 rupees per session, which includes transportation costs to and from the scanner.

5. What do I have to do?

If you volunteer for in this study, you will be asked to do the following: You will be required to direct your eyes to objects on the screen of a computer monitor, while you are lying in an MRI machine. The task will involve you looking at images on the screen and responding to the images using a key press.

6. What are the possible risks of taking part?

fMRI is a widely used technique to understand brain function and is used clinically to diagnose various brain disorders. The technique is completely safe and we are operating well within safety limits parameters recommended for such studies. There is no known transient or lasting effect of the scanning process on human physiology or function. The main risk in this study is that the MRI scanner contains a powerful magnet and will attract metallic objects placed on or in your body. We will take you through a screening questionnaire to minimize these risks. A very small fraction of subjects sometimes experience unpleasant sensations while inside the scanner, mainly because of movement while inside the magnet. These sensations can range from dizziness, nausea, headache, flashing lights, unusual tastes, numbness or tingling while in the magnet, or sometimes a momentary loss of balance after leaving the magnet. All these

sensations are known to stop shortly after the scan. Some subjects may additionally feel uncomfortable or claustrophobic in the closed space inside the scanner. **If you experience any of the above symptoms or feel at all uncomfortable while inside the scanner, you can signal to us and we will terminate the experiment immediately.**

In addition you may be uncomfortable with some of the questions asked. In this case, we will be happy to clarify/explain the questions to you in more detail. We will begin by asking you questions such as your age, occupation and issues of general health for the purpose of our records. We will ask you more specific questions relating to issues of mental health, neurological diseases and/or drug abuse that you or your family members might have had. All information provided by you will remain confidential.

7. What are the possible benefits of taking part?

By participating you will be contributing to our understanding of brain function. You will also be part of our database that in the long term can help us develop diagnostic tests of brain disorders which may help in improved care of people with these disorders.

8. What if something goes wrong?

Because fMRI is a standard technique we do not anticipate any significant risks. Nonetheless, the MRI scanner is located in a clinical centre and will be able to handle any medical emergency. In the event of any unanticipated or incidental medical findings from the MRI scan, we will refer you to the appropriate doctors at the clinical centre itself.

9. Will my taking part in this study be kept confidential?

Yes. All information which is collected about you during the course of the research will be kept strictly confidential. Any information about you which leaves the laboratory/hospital will have your name and address removed so that you cannot be identified/recognized from it.

10. What will happen to the results of the research study?

The results of this study will be published in a peer reviewed scientific journal. A copy of the published results can be obtained from the primary investigator.

11. Who is organising and funding the research?

This study is funded by the Wellcome-DBT India Alliance and the Department of Science and Technology, Government of India.

12. Who has reviewed the study?

This study has been reviewed and approved by the Institutional Human Ethics Committee at the Indian Institute of Science, Bangalore.

13. Who can I contact for further information?

If you have any questions about the study you may contact Dr. S. P. Arun at **Centre for Neuroscience IISc., Bangalore at 080-2293 3436.**

Thank you for taking part in the study!