### Risk Assessment Form for Outreach The Inflativerse: The University of Nottingham's Inflatable Planetarium

**Session Title: The Inflativerse** 

School/College/Community Group:

Main Contact: Jake Arthur, Rachel Asquith, Ross Hart, Tom Peterken

(planetarium@nottingham.ac.uk)

Session Date:			
Team Leader:			
Location:			

# Session Description: Planetarium show inside the dome

(Provides detailed information about what the visit will entail, as well as which buildings and rooms will be used as part of the session.)

ACTIVITY	POTENTIAL HAZARD	PREVENTATIVE MEASURES
General	Emergency procedure	In case of emergency the dome can be evacuated immediately by lifting up the edges/walls and escaping underneath. The air inside the dome will cause it to lift up above the audience and fold back on itself behind them, preventing anyone from being covered and trapped.
	Accessibility	The dome has full disabled access by lifting up the wall once inflated

	Overcrowding	Generally the dome capacity is ~20 members of the audience (~25 for younger children) plus three members of the planetarium team. However, for audiences of mixed ages the team leader will have the final say on when the dome is full or whether more people can be accommodated.
Outside the planetarium	Tripping over the planetarium, especially inflating and entrance tube	The planetarium will sit in a corner or beside one wall of the room to provide minimal access to the fan at the back. Power cables will be taped to the floor to avoid tripping
Inside the planetarium	As it will be mostly dark inside, people might trip and fall	We will havethe lights on, especially when people go in and out (which we will coordinate in between sessions). Also, handheld lights are available. We make sure that people know what to expect inside (e.g. boxes, projector) and will have a person sitting close to the entrance and especially preventing people from running into the projector. All power cables will be taped to the floor, and will be placed behind the projector to avoid tripping. People will be asked not to move about during the show, and to ask if they need to leave so lights can be provided.
	Claustrophobia or motion sickness	Due to the nature of the shows, where moving images may be projected on the inside of the dome, motion sickness may be an issue. The audience will be warned of this in advance and asked to say if they begin to feel unwell, in which case the red lights can be turned on to allow them to exit. In the case of an emergency see above. Similar measures can be taken for claustrophobia sufferers.
	People crawling down the tube to the fan	The presenter will stand in front of the fan tube and make sure no-one sits near it during the show. The fan is also contained within a cage to prevent injury
	People stepping on each others fingers	People will be asked to remove their shoes prior to entering the dome to reduce the risk of injury if they step on someone's fingers, and to reduce risk of damage to the floor of the entrance tunnel

	Sitting on the edge of the dome	People will be asked not to lean against the edges of the dome as they are thin and will not support their weight. Children will be asked to come in and sit in rows before each session
	Exiting the dome	At the end of the talk the lights will slowly be turned up to allow people to adjust their eyes to the light and to see their way out
Erection and dismantling of the dome	Setting up the dome	The dome will be set up by two or three people to avoid ripping it. The dome will be laid out on the floor first to make sure there is enough space and it will not block any doors or exits. Equipment will be placed under the dome after inflation, with someone holding up the wall to avoid tearing the material. Portable lights/torches will be used while setting up the electrical equipment and switching them on. The planetarium is only to be set up indoors
	Electronics	Portable lights/torches will be used while setting up and packing up the electrical equipment. Where possible the electronics will be connected to the mains behind the dome where no-one should trip over them. All electrical equipment has been safety tested and has a valid certificate on the plugs
	Space requirements	The dome is 5.5 x 6.4 m, and is 3.2 m tall. Minimum room size required is 6.5 x 6.5 m and 3.5 m in height with nothing hanging down from the ceiling. School halls are ideal locations to set up in. Ideally there should be plugs sockets on a far wall from the door to avoid the use of too many extension leads or people tripping over cables, and the dome will be aligned so that the entrance tunnel faces the door. The dome can hold approximately 25 people (including the presenter and volunteers), and the team leader has the final say on when the dome is at full capacity.

	Supervision	During the talks there will be at least one supervisor inside the dome at the projector and if possible another one in the entrance/exit tunnel. Both will have torches and access to the lights inside the dome. A third person will stand outside the entrance when people are going in and out to ensure order and prevent the dome deflating on the people inside.
	Dismantling the dome	The dome will be evacuated before deflation, and is collapsed by deflating the dome a bit then lifting up one side of it. It will then fall back onto the floor on the other side, from where is can be rolled up and returned to it's bag
Transporting equipment	Transporting equipment to schools etc	Equipment will be transported to location by car. All equipment is stored in boxes and a bag for the dome, each of which can be carried or wheeled by one person

Group Size: Maximum expected:	Minimum expected:

### Number of Inflativerse team members attending:

### Training/ Experience of leader(s):

- The teacher will be present at all times to control the behaviour of their class.
- All volunteers are aware of Child Protection Issues, Safety Issues and emergency procedures in the case of fires and accidents.
- Team Leaders all have experience of leading sessions like this one.

### Age/ fitness/ agility restrictions:

(Schools/Colleges/Community Groups are advised to inform The University of Nottingham of specific requirements any of the participants may have in advance of the session taking place.)

Would there be any additional risks for or restrictions imposed on participants with a disability that affects their mobility or access to this activity.

(As above, Schools/Colleges/Community Groups should make the session leader aware of any special requirements that individuals may have in order that arrangements can be made as necessary. In this way the Team will be able to ensure that all participants can take part in the activities on offer and that no additional risks are present.)

# What specific clothing/ safety/ emergency equipment requirements would you recommend for participants?

No special clothing required

#### Safety Instructions to be given to participants in advance:

Teachers/Community Group Leaders are advised that they must take ultimate responsibility for participants during visits to the University of Nottingham. This includes taking registers and/or head counts to ensure that all participants are present at each stage of the session.

Audience for the shows will be informed of what to expect in advance such as the darkness, moving images on the dome, the presence of the projector and several boxes etc. The audience will also be told of the emergency procedures in advance

### Verbal safety instructions to be given at start of the session: Groups will be told that:

- In the case of a fire, which will be signalled by a continuous fire alarm, the team leader and Inflativerse volunteers will direct the group out of the dome, and the teacher will direct everyone to the nearest fire exit. Participants should follow instructions given at this time. In such a scenario the emergency exit is through the side of the dome- the presenter will lift up the side of the dome while the audience stands in the middle, causing it to lift over their heads and fall behind them as the remaining air is expelled.
- In the case of an accident, the Session Leader, or Student Ambassadors with the group at the time should be made aware of the situation. If First Aid is necessary, the Team Leader will then contact the relevant First Aider. The lights in the dome can be switched on in this case by the presenter.
- Participants should sit still in the dome and avoid moving around in the dark. If someone needs to leave or falls ill they should inform the presenter, who will turn the lights on again and show them to the exit.

#### **Emergency arrangements in place:**

In the case of a fire, Session Leaders and Student Ambassadors will lead the group out of the dome, and the teacher will lead the group to the school assembly point.

In the case of First Aid being necessary, the appropriate person to contact would be the class teacher

#### **Any Further Comments:**

The Session Leaders at The University of Nottingham take every possible step to ensure that participants have a safe and enjoyable visit to the planetarium.

On rare occasions, there may be accidents or problems that arise. However, steps have been taken to ensure that procedures are in place to deal with potential problems.

Date of Assessment:	
Signature of leader:	
Contact Details:	