



Xtreme Vortex Risk Assessment for Inflatable Laser Tag – The Five Step Approach

Step 1	Step 2	Step 3	Step 4	Step 5		
Identify the hazards	Who might be harmed and how?	What are you doing already?	Risk Rating	Action required	Responsible person	Date completed
<u>Playing Area Risk Assessment</u>						
Material and Plastics.	Participant/Operator	Materials used Extinguish. PVC manufacturer to supply fire certificates for the materials	Low	Operator training	Operator/Xtreme Vortex	Ongoing
Cables and power supply.	Participant/Operator	All areas containing power cables to be condoned off with high visibility barriers.	Medium	Operator training, monitoring and supervision	Operator	Ongoing
Foreign Objects.	Participant/Operator	Regular inspections of the playing area to remove any objects that have been dropped by players.	Low	Operator training, monitoring and supervision	Operator	Ongoing
Problem Players.	Participant/Operator	Operators will monitor the games to deter anyone with intention to cause damage to the equipment or inflict harm on anyone. Problem players will be noted by the operators and refused future participation in the interest of	Low	Operator training, monitoring and supervision	Operator	Ongoing



		Health and Safety. Onsite security (if any) will be informed of the offending persons.				
Weather Conditions	Participant/Operator	The inflatable arena will be anchored at all times by pegs supplied.	Low	Operator training and monitoring	Operator	Ongoing
Operational Risk Assessment						
Tripping Hazards – Internal	Participant/Operator	Users of the equipment will be informed of raised areas inside the inflatable, and advised accordingly. Operators will brief players on safety before being allowed to play.	Low	Operator training, monitoring and supervision	Operator	Ongoing
Tripping hazards - External	Participant/Operator	All pegs used to secure the inflatable will be flush with the ground when possible and within the cordoned off area. Regular checks made by operators during operation of the equipment.	Low	Operator training, monitoring and supervision	Operator	Ongoing
Special effects	Participant/Operator	Fog added to enhance the game will be harmless to players. Manufacturer to supply Health and Safety data on the product.	None	Operator training, monitoring and supervision	Operator	Ongoing
Physical Contact	Participant/Operator	Because of the darkened	Low.	Operator	Operator	Ongoing



		playing area, players will be told not to run, hide the laser gun or lie down prior to the start of the game. Operators will brief players on safety issues before being allowed to play.		training, monitoring and supervision		
Infra Red Emissions	Participant/Operator	There are no regulations of low powered infra red emissions.	None.	Operator training, monitoring and supervision	Operator	Ongoing
Power failure (Generator)	Participant/Operator	All operators will know the evacuation procedure in case of power failure. Evacuation document can be supplied by the manufacturer on request. Generators will be serviced to the manufacturer's recommendation. Fuel levels to be checked hourly when generators are in use.	Medium	Operator training, monitoring and supervision	Operator	Ongoing
Entry and Exit	Participant/Operator	Sufficient space will be left outside the entrance/exit to allow the players to enter and exit unhindered at the start and at the end of the games. Operators will keep the area clear of	Low	Operator training, monitoring and supervision	Operator	Ongoing



		all unnecessary persons and equipment at all times during operation of the system.				
Lighting	Participant/Operator	All lighting used in the arena will be of no greater voltage than 24V DC. All transformers will be situated outside of the playing area and cordoned off. Xtreme Vortex supply low voltage lights or recommend types of lighting that is safe to use.	Low	Operator training, monitoring and supervision	Operator	Ongoing
Infants	Participant/Operator	The exit is to be made highly visible to anyone inside the inflatable. Operators will be aware that some people will not want to take part. Operators will allow people to inspect the playing area before the game to see if it is suitable.	Low	Operator training, monitoring and supervision	Operator	Ongoing
EMC Emissions (Electro Magnetic Force)	Participant/Operator	Laser gun electronics are completely housed in a steel chassis which has a	Low	Operator training, monitoring and supervision	Operator	Ongoing



		polarity of 0 volts. This attenuates all EMC emissions to the relevant specifications.				
Laser emissions	Participant/Operator	Laser modules will be class 2 and emit a laser beam <1mW in power and is acceptable for use by the public. Manufacturer of the equipment can supply data sheet on lasers used if required.	Low	Operator training, monitoring and supervision	Operator	Ongoing
Laser guns	Participant/Operator	To avoid collisions the laser guns use ultra bright LED's to promote high visibility. Any damaged guns will be taken out of use immediately. Regular inspections by operators to ensure good conditions of laser guns	Low	Operator training, monitoring and supervision	Operator	Ongoing