

## SUDBURY, ONTARIO, CANADA

## **Space Mission Part 2- Checklist for Spaceships**

Component	Description	Yes	Somewhat	No
Power source	Does your spacecraft have a source of power? Is this source reliable			
	and will it last a long time?			
Shielding	Is the spacecraft shielded from radiation in space?			
Viewports	You don't want to miss the view! Is there a way to look out of your			
	spacecraft?			
Heating and cooling	Is there a way to control the temperature onboard?			
Food	Can the astronauts grow or store food for the entire trip?			
Water	Is there a source of water?			
Exercise	Are the astronauts able to exercise?			
Entertainment	Space can be boring. Are there things to do for entertainment here?			
Waste	Do the astronauts have a place to go to the washroom and a place for			
	other waste disposal?			
Recycling	Resources are precious in space. You can't get more, and everything			
	you take with you will take up space and make the ship heavier. Is the			
	crew able to recycle on your spacecraft?			
Gravity	Our bodies are used to gravity and need it to stay healthy on a long			
	journey. Does your spacecraft have a component that simulates gravity?			
Health	Is there a place to go if you are sick?			
Sleep	Is there a place to sleep?			
Quarantine	A spacecraft is a confined space. Disease could spread fast! If someone			
	has an infectious disease can you separate that person from the rest of			
	the crew?			
Population Growth	If the trip lasts more than one lifetime the astronauts will have to	<u></u>		
	procreate. Is there room for population growth as children are born?			

Privacy	Everybody needs some time to himself or herself sometimes or they		
	will go crazy! Is there a place where astronauts can get away from it		
	all?		
Security	Some people just might not be able to handle space and go crazy or commit a criminal act. Is there a place to confine them?		
Crew	Does the crew have someone who can handle medical emergencies?		
Crew	Does the crew have someone who can handle technical failures?		
Crew	Does the crew have someone who specializes in food?		
Escape	Is there an escape capsule in case the spaceship becomes damaged?		
Food Redundancy	If the main food source fails, is there a backup?		
Bonus:			