Helium Compressed

1. IDENTIFICATION OF THE SUBSTANCE/ MIXTURE AND OF THE COMPANY/ UNDERTAKING.

Trade/ Commercial Name	Helium
Chemical Descriptions	Helium
Chemical Formula	He
Use	Industrial & Professional. Perform risk assessment prior to use.
Company Name	AIRLIFE GASES PVT LTD Plot No.2, Gat no: - 51/1+51/2+51/3+52(P)+53(P)+54+55+56+57+58+59(P), Bhamboli, Khed, Pune, Maharashtra, 410507
Emergency Contact No.	+91 20 67611711

2. HAZARDS IDENTIFICATION

Physical Hazards	Gases under pressure – Compressed gas – Warning (H280)
Label Elements	Nonflammable and Nontoxic gas (2.2)

Hazard Pictograms Code	GHS04
Hazard Statement	H280: Contains gas under pressure; may explode if heated.
Storage	P403: Store in a well-ventilated place.
Other Hazards	Asphyxiant in high concentrations.
Symbol(s)	None

3. COMPOSITION/ INFORMATION ON INGREDIENTS

Chemical Name	CAS (Product Identifier)	%
Helium	7440-59-7	**99.5-100%**

4. FIRST AID MEASURES

Inhalation	In high concentrations may cause asphyxiation. Symptoms may include loss of mobility/ consciousness. Victim may not be aware of asphyxiation. Remove victim to uncontaminated area wearing self-contained breathing apparatus. Keep victim warm and rested. Call a doctor. Apply artificial respiration if breathing stopped.
Skin/ Eye Contact	Immediately wash eyes with copious amount of water for at least 15 minutes. In case of frostbite, spray with water for at least 15 minutes. Apply a sterile dressing. Obtain medical assistance.
Ingestion	Ingestion is not considered a potential route of exposure.

5. FIRE FIGHTING MEASURES

Specific Hazard	Exposure to fire may cause containers to rupture/ explode.
Hazardous Combustion	None
Suitable Extinguishing Media	All known extinguishants can be used.
Products Specific Methods	If possible, stop the flow of product. Move away from the container and cool with water from a protected position.
Special Protective Equipment for Fire Fighters	In a confined space use self-contained breathing apparatus.

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions	Evacuate area. Use self-contained breathing apparatus when entering the area unless atmosphere is proved to be safe. Ensure adequate air ventilation.
Environmental Precautions	Prevent from entering sewers, basements and work pits, or any place where its accumulation can be.
Clean up Methods	Ventilate the area and keep evacuated.

7. HANDLING & STORAGE

Handling	Suck back of water into the container must be prevented. Do not allow back feed into the container. Use only properly specified equipment which is suitable for this product, its supply pressure and temperature. Contact your gas supplier if in doubt. Refer to supplier's container handling instructions.
Storage	Keep container below 50°C in a well-ventilated place.

8. EXPOSURE CONTROLS/ PERSONAL PROTECTION

Personal Protection	Do not smoke while handling the product. Ensure adequate ventilation. Protect eyes, face and skin from liquid splashes. Use proper PPEs, avoid oxygen deficiency (21%) atmospheres.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical State at 20°C	Gas.
Color	Colorless.
Odor	No odor warning properties.
Molecular Weight	4 g/mole.
Molecular Formula	He.
Boiling/ Condensation Point	-269°C
Melting/ freezing point	Not applicable.
Critical temperature	-268°C
Relative Density, Gas (air=1)	0.14
Relative Density, Liquid (water=1)	Not applicable.
Flammability Range (vol. % in air)	Nonflammable.
Auto-Ignition Temperature	Not Applicable.

10. STABILITY AND REACTIVITY

Hazardous Decomposition Product	None.
Chemical Stability	Stable under normal condition.

11. TOXICOLOGICAL INFORMATION

Toxicity Information	No known toxicological effect from this product.

12. ECOLOGICAL INFORMATION

Ecological Effect Information	No known ecological damage caused by product.

13. DISPOSAL CONSIDERATIONS

General	Do not discharge into any place where its accumulation could be dangerous. To atmosphere in well ventilated place. Contact supplier if guidance is required.

14. TRANSPORT INFORMATION

UN Number 1046

Labeling ADR, IMDG ,IATA Non flammable and Non toxic gas (2.2)

Land Transport;

UN Proper Shipping Name Helium, Compressed.

Transport Hazard Class 2.2

Hazchem Code 2RE

Tunnel/ Underpass Restriction Passage forbidden through long tunnels and underpasses.

Avoid transport on vehicles where the load space is not separated from the driver's compartment.

Ensure vehicle drivers are aware of the potential hazards of the load and know what to do in the event of an accident or an emergency. Before transporting product containers ensure:

- That container is firmly secured.
- Cylinder valve is closed and not passing/ leaking.
- Valve outlet cap nut or plug (where provided) is correctly fitted and
- Valve protection device (where provided) is correctly fitted and
- Product transport container/ tank should keep or stand in well-ventilated area

15. REGULATORY INFORMATION

Workplace Hazardous Materials Information System (WHMIS)

1. Class A: Compressed gas.
2. Non flammable and Non toxic gas (2.2)
3. Ensure all national/ local regulations are observed.

16. OTHER INFORMATION

- Asphyxiate in high concentrations.
- Keep container in a well-ventilated place.
- Do not breathe the gas.
- The hazard and asphyxiation are often overlooked and must be stressed during operator training.

DISCLAIMER OF LIABILITY:

Details given in this document are believed to be correct at the time of going to press. Whilst proper care has been taken in the preparation of this document, no liability for injury or damage resulting from its use can be accepted. Before using this product in any new process or experiment, a thorough material compatibility and safety study should be carried out.