1. Identification:

Product Name	ALFA Bi-metal Bandsaw Blades
Material Uses	Metal, bricks, structural, wood, meat, frozen fish and many more. It's basically used in industries from aerospace, automobiles, steel sectors, infrastructure, small workshops.
Manufacturer	Alfa Precision Technologies Pvt. Ltd. (Formerly known as Swan Aluminiums Pvt. Ltd.) Survey No: 12/13, Village: Vasuri – Khurad, Taluka: Wada, Dist. : Palghar, Pin 421312, Maharashtra, INDIA.
Contact number	+91 70385 31621

2. Hazard Identification:

ALFA Bi-metal Bandsaw blades are manufactured from solid and stable metal and it is physically and chemically steady in the solid condition.

ALFA Bi-metal Band saw blade has neither physical and chemical Hazards nor Environmental Hazards.

Hazardous Chemicals may be release if the blades are welded, cut, grinded, melted or otherwise physically altered.

This Material data sheet was prepared to address the potential for exposure to dust or fumes generated from the saw blades during cutting operation. Beyond the scope of this MSDS, the material being cut may contain hazardous chemicals and therefore needs to be evaluated with effective controls instituted to prevent exposure.

2.1 Hazard Classification:

Physical Hazards	
Explosives	Not Applicable
Flammable Gases	Not Applicable
Flammable Aerosols	Not Applicable
Oxidizing Gases	Not Applicable
Gases under Pressure	Not Applicable
Flammable Liquids	Not Applicable
Flammable Solids	Not Classified
Self-reactive Substance	Not Applicable
Pyrophoric Solid	Not Classified
Self heating substance	Not Classified
Oxidizing Liquids	Not Applicable
Oxidizing Solids	Not Applicable
Organic Peroxides	Not Applicable
Corrosive Metals	Not Applicable

Health Hazards	
Eye Irritation	Category 2B
Skin Irritation	Category 1
Respiratory Sensitization	Category 1
Carcinogenicity	Category 2
Specific Target Organ toxicity	Category 1

Environmental Hazards	
Aquatic toxicity (acute)	Not Classified
Aquatic toxicity (chronic)	Category 4

2.2 Hazard Symbol:

2.3 Hazard Word: Danger

2.4 Hazard Statements:

- Cause of Eye irritation.
- May cause an allergic skin reaction.
- May cause an allergy or an asthma symptom or breathing difficulties if inhaled.
- Suspected of causing cancer.
- Causes damage to organs through prolonged or repeated exposure.

2.5 Precautionary Statement safety Measure:

- Obtain special instruction before use.
- Do not handle until all safety precaution have been read and understood.
- Use personnel protective equipment as required e.g. Wear Hand gloves, safety glass.
- In case of inadequate ventilation wear respiratory protection.
- Do not breath dust.
- Do not eat, drink or smoke when using this product.
- Wash hand thoroughly after handling.
- Contaminated work clothing should not be allowed out of the workplace.

2.6 Emergency Response / First Aid:

- Get Medical attention if you feel unwell.
- If exposed or concerned – get medical attention.
- If in eye: Rinse continuously with water for several minutes, remove contact lenses. If eye irritation persists – get medical attention.
- If on skin: Wash with soap and water, Wash contaminated cloths before use.
- Ig inhaled: If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing.
- If respiratory symptoms: Call a physician.

2.7 Storage:

- Store in locked up.

2.8 Disposal:

- Disposal of contents and container in accordance with all local, regional, national and international regulation.

3. Composition / Alloying Elements:

Tooth Edge Chemical Composition			
Elements	**Symbol**	**CAS No**	**Content (%)**
Silicon	Si	7440-21-3	0 – 1.0
Manganese	Mn	7439-96-5	0 – 0.5
Chromium	Cr	7440-47-3	3 – 5
Molybdenum	Mo	7439-98-7	3 – 10
Tungsten	W	7440-33-7	1 – 12
Cobalt	Co	7440-48-4	6 - 15

Backing Material Chemical Composition			
Elements	**Symbol**	**CAS No**	**Content (%)**
Silicon	Si	7440-21-3	0.1 – 0.5
Manganese	Mn	7439-96-5	0.5 – 1.0
Chromium	Cr	7440-47-3	2 – 5
Molybdenum	Mo	7439-98-7	0.5 – 2.0
Nickel	Ni	7440-02-0	0 – 0.5

Any Chemical composition shown as a range is to protect confidentiality or due to batch variation.

4. First Aid:

Eye Contact	Immediately Flush eyes with plenty of water, continue to rinse for at least 10 minutes, Get Medical attention
Skin Contact	Wash with plenty of soap and water. Remove contaminated clothing and shoes. Wash continues to rinse for at least 10 minutes. Get Medical attention.
Inhalation	Remove victim to fresh Air and keep at rest in a position comfortablefor breathing. If condition continues consult medical
Ingestion	Wash out mouth with water. Remove dentures if any. Remove victim to fresh Air and keep at rest in a position comfortable for breathing. If condition continues consult medical

5. Fire Fighting Measure:

5.1 Extinguishing Media:

Use an extinguishing agent suitable for the surrounding fire.

5.2 Specific Hazards:

No Specific Fire or explosion Hazards.

5.3 Specific ProtectiveAction for Fire- Fighters.

Promptly isolate the scene by removing all persons from the vicinityof the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.

5.4 Special Protective Equipment for Fire-Fighters

Fire Fighters should wear appropriate protective equipment and self-contained breathing apparatus with a full face-pieces operated in positive pressure mode.

6. Accidental Release Measure

6.1 PPE and emergency procedure Personal Precaution:

No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding area. Keep unnecessary and unprotected personnel form entering. Do not touch or walk through spilled material. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Use appropriate personal protective equipment.

6.2 Environmental Precaution:

Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution.

6.3 Disposal Method:

Clean spill area, avoid dust generation. Place spill material in a designated, labeled waste container. Disposed via a licensed waste disposal contractor.

7. Handling and Storage:

7.1 Handling:

Use appropriate Personal protective Equipment for protectionagainst dust and fumes.

7.2 Storage:

Keep it in case until just before operation Do not put product on wet floor while in use transformation of the product is avoiding.

8. Special Protection Information:

8.1 Facilities:

- Set up the local exhaust ventilation.
- The dust mask is worn if necessary.
- Washing facility for eyes is set up near operating place.

8.2 Occupational Exposer limits:

Alloying Elements	Symbols	OSHA PEL Mg/m³	ACGIH TLV Mg/m³
Silicon	Si	5	10
Manganese	Mn	5	0.2
Chromium	Cr	0.5	0.5
Molybdenum	Mo	15	10
Nickel	Ni	1	1.5
Cobalt	Co	0.1	0.02

Whereas :

OSHA : Occupational Safety and Health Administration
PEL : Permissible exposure limit
ACGIH : American Conference of Govt. Industrial Hygienists
TLV : Allowable limit

8.3 Respiratory Protection:
Use appropriate Personnel protective Equipment like Mask.

8.4 Hand Protection:
Use appropriate Personnel protective Equipment like Gloves.

8.5 Eye Protection:
Use appropriate Personnel protective Equipment like Safety Glass.

9. Physical and Chemical Data:

Physical State	Solid
Color	Metallic Gray
Odor	Odorless
Ph	Not Available
Boiling point	Not Available
Melting point	1430°C
Flash Point	Not Available
Vapor density	Not Available
Vapor Pressure	Not Available
Relative Density	8
Solubility in Water	Insoluble
Decomposition Temperature	Not Available
Volatile	None

10. Stability & Reactive Data:

Stability: Chemically Stable

Reactivity: No Specific test data available

Incompatibility: Reacts with strong Acid

Hazardous Decomposition: Metallic Oxidation

11. Health Hazard Statement:

Not Health Hazardous – However, subsequent operations such as grinding, welding and melting cause a release of dust or fumes which may cause some of the effect.

No evaluation data and hazardous information for Skin Hazard.

No Hazardous information for specific target internal organ toxicity and harmful effect.

12. Environmental Impact:

No significant effect on environmental.

13. Disposal Method:

Follow the Local, State, National & international regulations regarding disposal. Use as recycle material as possible.

14. Transportation:

14.1 International Regulation:

Sea Restriction: Non-Hazardous material (Except Metallic powder)

Marine Pollutant: Non-Hazardous material (Except Metallic powder)

Airlines Restriction: Non-Hazardous material (Except Metallic powder)

14.2 Domestic Regulation:

Land Restriction: Non-Hazardous material (Except Metallic powder)

Sea Restriction: Non-Hazardous material (Except Metallic powder)

Marine Pollutant: Non-Hazardous material (Except Metallic powder)

Airlines Restriction: Non-Hazardous material (Except Metallic powder)

14.3 Security precaution:

It is necessary to note it for handling because the tip of the blade and the getting injury arerereceived. Protect collapse of cargo at the time of transportation.

15. Regulatory Information:

Prevention and Control of Pollution Act
Occupational Safety and Health Act

16. Other Information:

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