



TANO MINERALS

Material Safety Data Sheet

SECTION-I-PRODUCT & COMPANY

Product Name:	Abrasive Grains, Garnet
Product Range:	Grade A -12/24, Grade B -20/40, Grade C - 30/60 Grade D – 80 etc
Application:	Water Filtration, Sand Blasting, Water Jet cutting etc
Manufacturer:	Tano Minerals
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SECTION -II-MINERAL COMPOSITION

It is a natural mixture of Almandine garnet and it was collected from inland and sea shore areas.

Mineral composition	Proportion by weight
Almandine Garnet (Fe ₂ Al ₂ (SiO ₄) ₃)	>98.00 %
Quartz (SiO ₂)	<00.50 %
Others	<01.50 %

SECTION -III-HAZARDS INFORMATION

Non-Hazardous and Non-Dangerous cargo according to criterion NOHSC: 1008(2004). Because it is natural mineral.

SECTION -IV-HEALTH HAZARDS & FIRST AID PROCEDURES

Swallowed: Nontoxic. There are no known health hazard effects resulting from accidental ingestion as that many occur during the workers' normal handling. Absorb larger amounts may cause irritation due to abrasiveness. First aid is unlikely to be required, but, if necessary, wash mouth with water ensuring the mouthwash is not swallowed. Contact a medical consultant, if any problems develop.



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Eye: Materials and dust contact can cause eye irritation due to abrasiveness. Normal force with a lot of clean water for at least 10 minutes or until the abrasive is removed. Also, can contact a medical consultant, if any problems develop.

Skin: There are no known health effects from skin contact that may happen during normal handling. Contact a medical consultant, if any problem develops. Also, while blasting the material contact with the skin under pressure will damage the skin. Gently remove the contaminated clothing to avoid dust, then wash the skin. If the irritation persists, contact medical advice.

Inhaled: Normally regarded as a general nuisance dust, but can be irritating if inhaled in high concentration and may cause lung irritation. Shift to fresh air and blow nose to remove particulates from nasal passages. Contact a medical consultant, if any problems are found.

SECTION-V-STABILITY & REACTIVITY DATA

Stability	Stable
Polymerization	Cannot occur
Incompatibility	None
Hazardous Reactions	None
Decomposition	Not applicable
Flammability	Non-flammable
Flash Point	Not applicable
General Hazard	Non-flammable and does not support burning
LEL	Not applicable
UEL	Not applicable
Extinguishing Media	Use appropriate extinguishing media for the surrounding fire

1) PHYSICAL CHARACTERISTICS:-

Specific gravity	4.10
Bulk density	2.4 ft ³
Solubility in water	Insoluble
Appearances & Odor	Reddish and no odor
Physical state	Solid
Hardness (Moh)	7.30
Chloride	19.00 ppm
T.D.S	160 ppm
Conductivity	15 mS/m
Moisture	0.10



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II) CHEMICAL COMPOSITION:-

SiO ₂	31.00 %
Fe ₂ O ₃	38.85 %
Al ₂ O ₃	21.60 %
MgO	07.40 %
CaO	00.60 %
TiO ₂	00.55 %

If these levels are exceeded respiratory protection must be applied.

Personal Protection: Safety glasses, Gloves, and nose mask. Maintain a clean and safe workplace and monitor effectiveness.

Engineering controls: Dust collector and ventilation requirements will depend on handling methods and the amount in use but should be sufficient to maintain dust levels exposure limit. Pointsof dust generation such as conveyor and hopper discharges should be equipped with an effective extraction system.

SECTION -VI-HANDLING AND STORAGE

Adopt good housekeeping practices to reduce dust. Use approved hand, eye and respiratory protection devices while the material handling. No special safety measures required. Storage place should be ventilated and dust generation minimized when handling.

SECTION -VII-CONTROL MEASURES

Ventilation	Local Exhaust	Special
Yes	Use when blast cleaning	None
Yes	Mechanical (General)	Other
Yes	Meet dust TLV	None

NIOSH / MSHA: Approved filters and air-supplied goods for blasters.

Protection Gloves: Leather gloves, caps and paper mask

Eye Protection: Safety glasses with side shields approved by central

Other Protective Clothing or Equipment: Normal safety protection is adopted

Work / Hygienic Practices: Keep a clean and safe workplace and monitor work practices.



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SECTION-VIII-TRANSPORT

No special precautions. It is suggested to keep bags closed and covered using tarpaulin or sheet at the time of transporting to avoid dust generation.

SECTION-IX-DISPOSAL PROCEDURES

As per the local, state and central rules for the disposal of inert solid waste, material contaminated in use may require special handling and disposal.

SECTION-X-REGULATORY INFORMATION

This product is natural and dry mineral and the material collected from inland and sea shore. It is non-hazardous and non-dangerous cargo and does not require any special precautions.

SECTION -XI-ENVIRONMENTAL INFORMATION

It is a natural mineral with no known ecotoxicity. It is insoluble in water, because it is very heavy material and it should not contaminate waterways and food materials, and also not dangerous to animals and plants.

SECTION-XII-TOXIC INFORMATION

This product is non-toxic with no known sensitive health effects relating to human exposure.

SECTION-XIII-SPECIAL COMMENTS & PRECAUTIONS

The above said information is believed to be accurate but is not warranted with respect to the accuracy of the information or recommendations. As per the work safety rule, every user should reconsider the above information while product using.

Abbreviations:

Mg/m² - Milligram per cubic meter

NOHSC - National Occupational Health & Safety Commission
TLV - Threshold Limit Value

mS/m - milli Siemens per meter

ppm - Parts per million

g/cm² - Gram per cubic centimeter

End of MSDS

Garnet being a natural product, its analysis is expected to vary periodically and between deposits.

Authorized Signatory

For Tano Minerals