

Small Magnesium Ingots (100 g / 300 g) – Technical Datasheet

1. Product Description

AlloyOne small magnesium ingots (100 g and 300 g) are produced from primary magnesium feedstock and designed for precise alloying additions in foundries and die-casting operations. Their small unit weight ensures accurate dosage control, fast dissolution and stable melt conditioning during aluminum or magnesium alloy production. Both acid-washing and non-acid-washing (standard as-cast surface) versions are available.

2. Main Applications

- Fine adjustment of Mg content in aluminum alloys
- Alloying operations for magnesium alloys
- Foundry melt correction and conditioning
- Laboratory melt preparation or alloy development
- Small-dose additions requiring fast dissolution and high precision

3. Chemical Composition (typical primary Mg 99.9% grade)

Element	Specification (%)
Mg	≥ 99.90
Al	≤ 0.04
Zn	≤ 0.02
Mn	≤ 0.03
Si	≤ 0.02

Fe	≤ 0.004
Cu	≤ 0.005
Ni	≤ 0.001
Others (total)	≤ 0.10

Chemical composition follows AlloyOne primary magnesium 99.9% specifications unless otherwise required by contract.

4. Surface Condition

- Non acid-washing (standard as-cast surface grade)
- Acid-washing (bright surface grade, reduced surface oxides)
- Clean and free from excessive oxidation or inclusions
- Fresh production suitable for precise alloy additions

5. Dimensions & Weight

Small magnesium ingots are produced in 100 g and 300 g unit weights, with block-type or trapezoidal shapes depending on mold design. The high surface-to-volume ratio ensures fast dissolution in aluminum or magnesium melts.

- 100 g small ingots
- 300 g small ingots
- Custom sizes available upon request

6. Packaging

- Packed in jumbo bags (1.0 – 1.1 MT per bag)
- Optional wooden pallets for forklift handling
- No-pallet option available to maximize container loading

- Inner PE/PP lining available for moisture protection
- Bundles secured and moisture-protected according to customer requirements

7. Loading & Transportation

- 20-ft container loading: approx. 20 – 23 MT
- In Europe, truck transport regulations prevent stacking two layers, so standard loading is typically 20 MT per container
- Bags may be handled by forklift (with pallet) or crane (without pallet)

8. HS Code

8104.11 — Unwrought magnesium, containing at least 99.8% by weight of magnesium