



PRODUCT CODE: 766052

Manganese standard solution Mn=1.000 g/l for ICP
(Mn in HNO₃ 2-5%) for ICP

TARIC 3822 00 00 00

The solution of the element at the concentration given about, is NIST standard traceable .

PHYSICAL DATA: liquid, Clear, Colourless, Miscible with water • D 20/4 1,01 • M.P.: -3 °C • B.P.: 101 °C •

BIBLIOGRAPHY:

HAZARDOUS: VLA-EC (HNO₃) 4 ppm10 mg/m³ VLA-ED (HNO₃) 2 ppm5,2 mg/m³



H: H319 • H335 • H315 •
P: P261 • P264 • P271 • P280 • P302+P352 • P501 • P304+P340 • P305+P351+P338 • P312 • P321 • P332+P313
• P337+P313 • P362 • P403+P233 • P405 •

TRANSPORT REGULATIONS: UN: 3264 • ADR: 8/III • IMDG: 8/III • IATA: 8/III • PAX: 852 • CAO: 856 • (E) •

WEIGHT/VOLUME INFORMATION: 1l~1,01 kg 1kg~0,99 l

SPECIFICATIONS:

Composition 1 g Mn / l in HNO₃ 2-5%
Concentration (as Mn)
Uncertainty
Traceability

0,990-1,010 g/l
See certificate
NIST

Method of analysis

ICP-OES

Maximum limit of impurities

Metals by ICP [in mg/Kg (ppm)]

Ag	0,002
Al	0,004
As	0,012
Au	0,002
B	0,006
Ba	0,002
Be	0,003
Bi	0,002
Ca	0,026
Cd	0,003
Ce	0,002
Co	0,011
Cr	0,011
Cs	0,002
Cu	0,011
Dy	0,002
Er	0,002
Eu	0,002
Fe	0,002
Ga	0,002
Gd	0,002
Ge	0,002
Hf	0,002
Hg	0,002
Ho	0,002
In	0,002
Ir	0,002
K	0,025
La	0,002
Li	0,004
Lu	0,002
Mg	0,025
Mo	0,007
Na	0,03
Nb	0,002
Nd	0,002
Ni	0,011
Os	0,002
P	0,013
Pb	0,011
Pd	0,009
Pr	0,002
Pt	0,002
Rb	0,002
Re	0,002
Rh	0,002
Ru	0,002
S	0,039
Sb	0,002
Sc	0,002
Se	0,002
Si	0,011
Sm	0,002

Sn	0,002
Sr	0,002
Ta	0,002
Tb	0,002
Te	0,002
Th	0,002
Ti	0,002
Tl	0,002
Tm	0,002
U	0,002
V	0,011
W	0,006
Y	0,002
Yb	0,002
Zn	0,014
Zr	0,002