



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

### 99.5% (metals basis) Boron Carbide Plate

B4C

Product Code: BO-C-025M-PL

Lot #: 1141152444-400.2

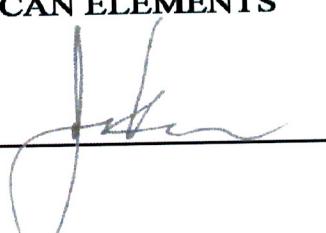
CAS #: 12069-32-8

Description: Per customer drawing B4C\_B LAYER

<u>Analysis</u>	<u>%</u>
B2O3	0.1200
Ca	0.0390
F	0.0024
Fe	0.0600
Cl	0.0071

AMERICAN ELEMENTS

By

A handwritten signature in blue ink, appearing to read "John", is written over a horizontal line next to the word "By".



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

**99.9% (metals basis) Bismuth Metal Plate**

Bi

**Product Code:** BI-M-03M-PL

**Lot #:** 1131393444-420.1

**CAS #:** 7440-69-9

**Description:** Per customer drawing BI\_1 LAYER

**\*May be pits and edge breakage of surface**

<u>Analysis</u>	<u>%</u>
Cu	0.0005
Fe	0.0004
Pb	0.0005
Sb	0.0005
Zn	0.0005
Te	0.0002

AMERICAN ELEMENTS

By \_\_\_\_\_

A handwritten signature in blue ink is written over a horizontal line. The signature appears to begin with a large 'J' or 'L' and ends with a flourish.



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

### 6061 Alloy Aluminum Metal Plate

Al

**Product Code:** AL-M-6061-PL

**Lot #:** 10313918844-400.3

**CAS #:** 7429-90-5

**Description:** Per customer drawing CASE\_3

<u>Analysis</u>	<u>%</u>
Al	97.7
Si	0.6
Fe	0.2
Cu	0.3
Mg	1.0
Cr	0.1
Zn	0.1

AMERICAN ELEMENTS

By



AMERICAN  
ELEMENTS

THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

### 99.9% (metals basis) Lead Metal Plate

Pb

Product Code: PB-M-03M-PL

Lot #: 1401393444-431

CAS #: 7439-92-1

Description: Per customer drawing PB DRAWER FILLER

<u>Analysis</u>	<u>%</u>
Mg	0.0120
Ni	0.0060
Cu	0.0110
Zn	0.0020
Ag	0.0003
Sb	0.0004

AMERICAN ELEMENTS

By



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

**99.9% (metals basis) Praseodymium Metal Plate**

Pr

**Product Code: PR-M-03M-PL**

**Lot #: 1541393444-410.1**

**CAS #: 7440-10-0**

**Description: Per customer drawing BA\_A LAYER**

<u>Analysis</u>	<u>%</u>
La	0.0030
Nd	0.0180
Gd	0.0003
Ho	0.0010
Yb	0.0001
Ce	0.0220
Sm	0.0015
Tb	0.0005
Er	0.0003
Lu	0.0003
Pr	Main content
Eu	0.0005
Dy	0.0005
Tm	0.0001
Y	0.0075

**AMERICAN ELEMENTS**

By \_\_\_\_\_

A handwritten signature in blue ink, appearing to read "John Doe", is written over a horizontal line. To the left of the line, the word "By" is printed in a small, bold, black font.



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

### 99.9% (metals basis) Praseodymium Metal Plate

Pr

Product Code: PR-M-03M-PL

Lot #: 1541393444-410.2

CAS #: 7440-10-0

Description: Per customer drawing BA\_B LAYER

<u>Analysis</u>	<u>%</u>
La	0.0030
Nd	0.0180
Gd	0.0003
Ho	0.0010
Yb	0.0001
Ce	0.0220
Sm	0.0015
Tb	0.0005
Er	0.0003
Lu	0.0003
Pr	Main content
Eu	0.0005
Dy	0.0005
Tm	0.0001
Y	0.0075

AMERICAN ELEMENTS

By

A handwritten signature in blue ink, appearing to read "John S. Kuehne". It is positioned over a horizontal line.



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

### 99.9% (metals basis) Bismuth Metal Plate

Bi

Product Code: BI-M-03M-PL

Lot #: 1131393444-420.5

CAS #: 7440-69-9

Description: Per customer drawing BI\_4A LAYER

\*May be pits and edge breakage of surface

<u>Analysis</u>	<u>%</u>
Cu	0.0005
Fe	0.0004
Pb	0.0005
Sb	0.0005
Zn	0.0005
Te	0.0002

AMERICAN ELEMENTS

By

A handwritten signature in black ink, appearing to read "John S. Johnson". It is positioned below the "By" label and above a horizontal line.



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

### 99.9% (metals basis) Tungsten Metal Plate

W

**Product Code:** W-M-03M-PL

**Lot #:** 1791393444-400

**CAS #:** 7440-33-7

**Description:** Per customer drawing W LAYER

<u>Analysis</u>	<u>%</u>
Mo	0.0046
Si	0.0010
Ni	0.0005
Ca	0.0008
Al	0.0005
Cu	0.0002
Mg	0.0006
Fe	0.0018
Sn	0.0001

AMERICAN ELEMENTS

By

A handwritten signature in blue ink, appearing to read "John Doe". It is positioned above a horizontal line.



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

**99.9% (metals basis) Bismuth Metal Plate**

Bi

**Product Code:** BI-M-03M-PL

**Lot #:** 1131393444-420.2

**CAS #:** 7440-69-9

**Description:** Per customer drawing BI\_2 LAYER

\*May be pits and edge breakage of surface

<u>Analysis</u>	<u>%</u>
Cu	0.0005
Fe	0.0004
Pb	0.0005
Sb	0.0005
Zn	0.0005
Te	0.0002

**AMERICAN ELEMENTS**

By

A handwritten signature in blue ink, appearing to read "John S. Johnson". It is positioned above a horizontal line.



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

**99.9% (metals basis) Bismuth Metal Plate**

Bi

**Product Code: BI-M-03M-PL**

**Lot #: 1131393444-420.6**

**CAS #: 7440-69-9**

**Description: Per customer drawing BI\_4B LAYER**

**\*May be pits and edge breakage of surface**

<u>Analysis</u>	<u>%</u>
Cu	0.0005
Fe	0.0004
Pb	0.0005
Sb	0.0005
Zn	0.0005
Te	0.0002

**AMERICAN ELEMENTS**

**By** \_\_\_\_\_



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

### 99.9% (metals basis) Silicon (Elemental) Plate

Si

**Product Code:** SI-E-03M-PL

**Lot #:** 1626503444-405.2

**CAS #:** 7440-21-3

**Description:** Per customer drawing SI\_3 LAYER

<u>Analysis</u>	<u>%</u>
Al	0.001
Cr	0.0018
Ca	0.0008
Mn	0.0003
Ti	0.0008
Fe	0.001

AMERICAN ELEMENTS

By



THE MATERIALS SCIENCE COMPANY ®

10884 WEYBURN AVE. LOS ANGELES, CA 90024  
TEL. 310-208-0551 • FAX 310-208-0351 • E-MAIL: shipping@americanelements.com

## CERTIFICATE OF ANALYSIS

### 99.5% (metals basis) Boron Carbide Plate

B4C

Product Code: BO-C-025M-PL

Lot #: 1141152444-400.1

CAS #: 12069-32-8

Description: Per customer drawing B4C\_A LAYER

<u>Analysis</u>	<u>%</u>
B2O3	0.1200
Ca	0.0390
F	0.0024
Fe	0.0600
Cl	0.0071

AMERICAN ELEMENTS

By

A handwritten signature in blue ink is written over a solid horizontal line. The signature appears to begin with a capital letter 'J' or 'L' and ends with a flourish.