

820374-2A

INDUSTRIES INC. P.O. - 0001037 S.O. - 272645

AvestaPolarit, Inc.
Plate Products

AvestaPolarit
STAINLESS
As Gafolungu Group company

Certificate of Analysis and Tests

OUR ORDER 0234213 - 15

HEAT & PIECE 820374-2A 07/15/03

SOLD TO: RASCO Specialty Metals, LRC.
RASCO Specialty Metals, Inc.
2140 MEADOWPINE BLVD.
MISSISSAUGA, ONT.
L5N 6K6 CANADA

SHIP TO: INTEGRIS METALS LTD. - Etobicoke
161 THE WEST MALL
ETOBICOKE, ON M9C 6V8

----- YOUR ORDER & DATE -----

245589 7/09/03

TAG# 7581-2880

----- ITEM DESCRIPTION -----

HEAT & PIECE 820374 - 2A
WEIGHT 12475 COUNTRY OF ORIGIN BRT
FINISH 1
GRADE 316L / 316 UNS-S31603 / UNS-S31600
DIMENSIONS 1.750 X 95.000 X 254.000 EXACT

----- SPECIFICATIONS -----

*** MFG IN NEW CASTLE, IN. USA FROM SLABS IMPORTED FROM BRITAIN
ASME SA240 01 RD 02 ADD ASTM A210/A210M-02
ASTM A480/A480M-02 ASTM A262-01 PRAC A
ASTM A262-01 PRAC E NO GRIPPER MARKS
NO WELD REPAIRS

PLATES & TEST PCS SOLUTION ANNEALED @ 1950 DEGREES FAHRENHEIT MINIMUM.
THEN WATER COOLED OR RAPIDLY COOLED BY AIR
FREE OF KNOWN MERCURY CONTAMINATION
ROLLED, ANNEALED & PICKLED (HRAP)

----- MECHANICAL & OTHER TESTS -----

HARDNESS RB 72
GRAIN SIZE 3
YIELD STRENGTH (PSI) 40318
TENSILE STRENGTH (PSI) 78550
INTERGRANULAR CORROSION OK
ELONGATION * IN 2" 60.0
REDUCTION OF AREA * 74.5

----- CHEMICAL COMPOSITION -----

CARBON (C) .016
MANGANESE (MN) 1.73
PHOSPHORUS (P) .030
SULFUR (S) .001
SILICON (SI) .32
CHROMIUM (CR) 16.23
NICKEL (NI) 10.10
COBALT (CO) .17
COPPER (CU) .38
MOLY (MO) 2.13
NITROGEN (N) .02
COLOMBIUM (CB) .007
TITANIUM (TI) .007
ALUMINUM (AL) .007
ZINC (ZN) .002

WE HEREBY CERTIFY THAT THE MATERIAL HEREIN HAS BEEN MADE AND TESTED IN ACCORDANCE WITH THE LISTED SPECIFICATION(S) AND THAT THE RESULTS OF ALL TESTS ARE ACCEPTABLE.

JAMES DOUBMAN, QUALITY ASSURANCE MANAGER

CERTIFICATE IN CONFORMANCE WITH DIN50049 3.1.B/EN10204 3.1.B

James Douman
AvestaPolarit, Inc.
Plate Products
P.O. Box 370
New Canada Indiana 47220