



HYDROGRAPHIC DATUM MEAN HIGH WATER

Depth curve (meters): Foreshore flats
 Rocks awash; Reef
 Wharf: Exposed; Surken with masts exposed
 Wharf: Pier
 Seawall
 Oil / gas platform



Prepared and published by the National Geospatial-Intelligence Agency

MAP INFORMATION AS OF 2009

LEGEND

POPULATED PLACES
 Densely built-up areas
 Sparsely to moderately built-up areas

ROADS
 All weather, hard surface: 4 LANES
 Divided highway: 4 LANES
 Two or more lanes wide: 4 LANES
 One lane wide: 4 LANES
 All weather, loose surface: 4 LANES
 Two or more lanes wide: 4 LANES
 One lane wide: 4 LANES
 Fair or dry weather, loose surface: 4 LANES
 One lane wide: 4 LANES

RAILROADS
 Single Track
 Multiple Track
 Narrow gauge 1.0m
 Normal gauge
 Station: Location known
 Unknown

BOUNDARIES
 First-order administrative division
 Second-order administrative division
 MIL RES

MISCELLANEOUS CULTURAL FEATURES
 Building: Ruin; School
 Church; Mosque; Hospital
 Cemetery: Christian; Islamic
 Helipad at Hospital; Helipad
 Scaffolding
 Tank; Landmark area
 Obelisk
 Airfield/Ramp; Airport
 Mine: Active; Abandoned
 Culvert; Fence
 Bridge: Pedestrian bridge
 Mountain pass; Cave

NOTES

A LANE ON THIS MAP IS CONSIDERED TO BE AT LEAST 2.5 METERS (8 FEET) WIDE.

ROAD CLASSIFICATION SHOULD BE REFERRED TO WITH CAUTION.

CAUTION: NOT ALL TELEPHONE AND ELECTRIC SERVICE LINES ARE SHOWN.

BUILT-UP AREAS CONTAIN NUMEROUS WALLS.

CONTOUR INTERVAL 20 METERS

ELLIPSOID WORLD GEODETIC SYSTEM 1984/GEODETIC REFERENCE SYSTEM 1980
 GRID 1,000 METER UTM ZONE 19
 PROJECTION TRANSVERSE MERCATOR
 VERTICAL DATUM MEAN SEA LEVEL
 HORIZONTAL DATUM WORLD GEODETIC SYSTEM 1984/NORTH AMERICAN DATUM 1983
 PRINTED BY NGA 07-11

CONVERSION GRAPH
 (1 meter = 3.28 feet)

ELEVATIONS IN METERS

SCALE 1:50,000

Meters 1000 500 0 500 1000
 Kilometers 1 2 3 4 5
 Statute Miles 0.6 1.2 1.8 2.4 3.0

BOUNDARIES

Washington
 Pierce County
 Thurston County

ADJOINING SHEETS

1478 IV 1478 I 1478 V
 1478 III 1478 II 1478 IIII
 1477 IV 1477 I 1477 V

ELEVATION GUIDE

PERCENTAGE DEGREE
 10% 6.3°
 12% 6.9°
 14% 7.4°
 16% 7.9°
 18% 8.4°
 20% 8.9°
 22% 9.4°
 24% 9.9°
 26% 10.4°
 28% 10.9°
 30% 11.4°
 32% 11.9°
 34% 12.4°
 36% 12.9°
 38% 13.4°
 40% 13.9°

AB-HORIZONTAL DISTANCE BETWEEN CONTOURS
 AC-HORIZONTAL DISTANCE BETWEEN INDEX CONTOURS

2010 G.M. ANGLE
 16 1/2° (280 MILS) EAST

TO CONVERT A MAGNETIC AZIMUTH TO A GRID AZIMUTH ADD G.M. ANGLE
 TO CONVERT A GRID AZIMUTH TO A MAGNETIC AZIMUTH SUBTRACT G.M. ANGLE

USERS SHOULD REVIEW CORRECTIONS, ADDITIONS, AND COMMENTS TO THE NGA ENTERPRISE SERVICE DESK: 1-800-455-0099, COMMERCIAL: 303-277-9811; 0-201-277-9811; EMAIL: ENTERPRISESERVICE@NSA.MIL; PRINT: ESS@NSA.NGA.MIL; OR WRITE TO: DIRECTOR, NATIONAL GEOSPATIAL-INTELLIGENCE AGENCY, ATTN: ESS, MAIL STOP 240, 4600 SANDWATER ROAD, BETHESDA, MD 20816-5003

© COPYRIGHT 2011 BY THE UNITED STATES GOVERNMENT
 NO PART OF THIS MAP MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION STORAGE AND RETRIEVAL SYSTEM, WITHOUT PERMISSION IN WRITING FROM THE NATIONAL GEOSPATIAL-INTelligence AGENCY.