Storm Analysis

***All warnings for U.S. Territories (Puerto Rico and the U.S. Virgin Islands) have been discontinued. This will be the final Quicklook posted unless/until a new tropical storm warning is issued by the National Hurricane Center for the Southeast U.S. Coastline. This post will remain up for 24 hours or until new warnings are issued.
As of 08/28/2015 18:00 AST, water levels along the coast of Puerto Rico are slightly elevated and range between 0.1 and 0.6 feet above tidal predictions. Wind speeds and gusts have continued to decrease in the last few hours. Barometric pressure has continued to increase at most locations.

Water Level and Meteorological plots available below are updated automatically. A line denoting Mean Higher High Water (MHHW) is displayed to provide an approximate indication of when flooding inundation may occur.

For additional data, please see the Center for Operational Oceanographic Products & Services website. For more information or archived products and reports, please see the Storm QuickLook Homepage.

Analyst: CRD

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DISCUSSION AND 48-HOUR OUTLOOK

At 500 PM EDT, the center of Tropical Storm Erika was estimated near latitude 17.9 North, longitude 71.2 West. Erika is moving toward the west near 21 mph. A turn toward the west-northwest or northwest is expected tonight, with this motion continuing with a decrease in forward speed through Sunday. On the forecast track, the center of Erika will move over the Dominican Republic and Haiti during the next several hours, and be near the southeastern Bahamas or eastern Cuba on Saturday.

Maximum sustained winds are near 50 mph with higher gusts. Weakening is forecast during the next 48 hours, and Erika is forecast to weaken to a tropical depression on Saturday. There is a possibility that Erika could dissipate to a trough of low pressure during or after its passage over Hispaniola.

Tropical storm force winds extend outward up to 140 miles to the east of the center. Santo Domingo in the Dominican Republic recently reported a wind gust of 51 mph.

The estimated minimum central pressure, based on observations from the Dominican Republic, is 1009 mb (29.80 inches).

HAZARDS AFFECTING LAND

WIND: Tropical storm conditions are currently spreading across portions of the Dominican Republic. Tropical storm conditions are expected to spread across Haiti this evening, the Turks and Caicos Islands and the southeastern Bahamas this evening and tonight, and the central Bahamas on Saturday. Tropical storm conditions are possible over eastern Cuba on Saturday and in the northwestern Bahamas by Saturday night.

RAINFALL: Erika is expected to produce total rainfall accumulations of 3 to 6 inches with maximum amounts of 10 inches possible across portions of the Dominican Republic and Haiti, the Turks and Caicos Islands, eastern Cuba, and the southeastern and central Bahamas through Saturday. An additional 1 to 2 inches is expected for Puerto Rico. These rains could cause life-threatening flash floods and mud slides.

Forecaster Beven
For the purpose of timely release, data contained within this QuickLook have undergone a "limited" NOS Quality Assurance/Control; however, the data have not yet undergone final verification. All data subject to NOS verification.

Jump to: Isabel Segunda, Vieques Island - Water Level, Isabel Segunda, Vieques Island - Winds, Esperanza, Vieques Island - Water Level, Esperanza, Vieques Island - Winds, Esperanza, Vieques Island - Barometric, Fajardo - Water Level, Fajardo - Winds, Yabucoa Harbor - Water Level, Yabucoa Harbor - Winds, San Juan - Water Level, San Juan - Winds, Magueyes Island - Water Level, Magueyes Island - Winds, Mona Island - Water Level, Mona Island - Barometric
Tropical Storm ERIKA QuickLook, POSTED 18:00 AST 08/28/2015

NOAA/NOS/CO-OPS 9752619 Isabel Segunda, Vieques Island, PR

Preliminary Water Level, relative to Mean Higher High Water (MHHW)

Last Observed Sample: 08/29/2015 09:12 (AST). Data relative to MHHW

Observed: -0.05 ft. Predicted: -0.41 ft. Residual: 0.36 ft.

Historical Maximum Water Level: n/a

Next High Tide: 08/29/2015 20:43 (AST), 0.06 ft.

Last Observed Sample: 08/29/2015 09:12 (AST)

Wind Speed: 8 knots Gusts: 12 knots Direction: 101° T
Last Observed Sample: 08/29/2015 09:12 (AST). Data relative to MHHW

Observed: -0.25 ft. Predicted: -0.49 ft. Residual: 0.24 ft.
Historical Maximum Water Level: Aug 22 2011, 0.99 ft.
Next High Tide: 08/29/2015 20:32 (AST), -0.05 ft.

Last Observed Sample: 08/29/2015 09:12 (AST)
Wind Speed: 8 knots Gusts: 15 knots Direction: 109° T
NOAA/NOS/CO-OPS 9752695 Esperanza, Vieques Island, PR

Last Observed Sample: 08/29/2015 09:12 (AST)
Barometric Pressure: 1018.1 mb

NOAA/NOS/CO-OPS 9753216 Fajardo, PR

Last Observed Sample: 08/29/2015 09:12 (AST)
Data relative to MHHW Observed: 0.02 ft. Predicted: -0.27 ft. Residual: 0.29 ft.
Historical Maximum Water Level: Aug 30 2010, 0.84 ft.
Next High Tide: 08/29/2015 20:30 (AST), 0.24 ft.
Tropical Storm ERIKA QuickLook, POSTED 18:00 AST 08/28/2015

NOAA/NOS/CO-OPS 9753216 Fajardo, PR

Wind Speed / Gusts / Direction

Last Observed Sample: 08/29/2015 09:12 (AST)
Wind Speed: 7 knots Gusts: 11 knots Direction: 101° T

NOAA/NOS/CO-OPS 9754228 Yabucoa Harbor, PR

Preliminary Water Level, relative to Mean Higher High Water (MHHW)

Last Observed Sample: 08/29/2015 09:12 (AST). Data relative to MHHW
Observed: -0.28 ft. Predicted: -0.48 ft. Residual: 0.20 ft.
Historical Maximum Water Level: n/a
Next High Tide: 08/29/2015 21:28 (AST), -0.03 ft.
Tropical Storm ERIKA QuickLook, POSTED 18:00 AST 08/28/2015

NOAA/NOS/CO-OPS 9754228 Yabucoa Harbor, PR

Wind Speed / Gusts / Direction

Last Observed Sample: 08/29/2015 09:12 (AST)
Wind Speed: 8 knots Gusts: 12 knots Direction: 72° T

NOAA/NOS/CO-OPS 9755371 San Juan, PR

Preliminary Water Level, relative to Mean Higher High Water (MHHW)

Last Observed Sample: 08/29/2015 09:06 (AST). Data relative to MHHW
Observed: 0.12 ft. Predicted: -0.17 ft. Residual: 0.29 ft.
Historical Maximum Water Level: Sep 18 1989, 2.77 ft.
Next High Tide: 08/29/2015 20:55 (AST), 0.33 ft.
Tropical Storm ERIKA QuickLook, POSTED 18:00 AST 08/28/2015

NOAA/NOS/CO-OPS 9755371 San Juan, PR

Wind Speed / Gusts / Direction

Last Observed Sample: 08/29/2015 09:06 (AST)
Wind Speed: 12 knots  Gusts: 15 knots  Direction: 94° T

NOAA/NOS/CO-OPS 9759110 Magueyes Island, PR

Preliminary Water Level, relative to Mean Higher High Water (MHHW)

Last Observed Sample: 08/29/2015 09:06 (AST). Data relative to MHHW
Observed: -0.01 ft.  Predicted: -0.27 ft.  Residual: 0.26 ft.
Historical Maximum Water Level: Sep 22 1998, 1.60 ft.
Next High Tide: 08/29/2015 21:48 (AST), 0.16 ft.
NOAA/NOS/CO-OPS 9759110 Magueyes Island, PR

Wind Speed / Gusts / Direction

Last Observed Sample: 08/29/2015 09:06 (AST)
Wind Speed: 4 knots Gusts: 9 knots Direction: 129° T

NOAA/NOS/CO-OPS 9759938 Mona Island, PR

Preliminary Water Level, relative to Mean Higher High Water (MHHW)

Last Observed Sample: 08/29/2015 09:00 (AST). Data relative to MHHW
Observed: -0.02 ft. Predicted: -0.48 ft. Residual: 0.46 ft.
Historical Maximum Water Level: Dec 23 2010, 1.26 ft.
Next High Tide: 08/29/2015 20:40 (AST), -0.07 ft.
Barometric Pressure

Last Observed Sample: 08/29/2015 09:00 (AST)
Barometric Pressure: 1016.0 mb
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<th>Station ID</th>
<th>Station Name</th>
<th>Date/Time</th>
<th>Observed Water Level</th>
<th>Predicted Tide</th>
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