Storm Analysis

As of 08/26/2012 12:00 EDT, water levels in southeastern Florida and the Keys are elevated between 0.7 and 1.0 ft above predicted tide levels. Water levels along the western coast of Florida from Cedar Key to Naples have fallen 0.2-0.8 ft below predictions. Winds across southern Florida generally range between 10 and 30 knots with some gusts over 35 kts. Wind gusts up to 39 kts were recorded at Virginia Key, Fl. Barometric pressure continues to fall across the region.

Water Level and Meteorological plots available below are updated automatically. Water level predictions relative to Mean Lower Low Water are:

Key West, FL: Next predicted high tides are 1.1 ft (0.34 m) at 08/26/2012 19:32 EDT and 2.1 ft (0.65 m) at 08/27/2012 06:47 EDT.

Vaca Key, FL: Next predicted high tides are 0.7 ft (0.20 m) at 08/27/2012 00:49 EDT and 1.1 ft (0.33 m) at 08/27/2012 09:24 EDT.

Virginia Key, FL: Next predicted high tides are 2.3 ft (0.70 m) at 08/26/2012 17:30 EDT and 2.3 ft (0.70 m) at 08/27/2012 05:46 EDT.

Lake Worth Pier, FL: Next predicted high tides are 3.2 ft (0.98 m) at 08/26/2012 16:35 EDT and 2.8 ft (0.88 m) at 08/27/2012 04:47 EDT.

Trident Pier, FL: Next predicted high tides are 4.3 ft (1.32 m) at 08/26/2012 16:12 EDT and 3.4 ft (1.06 m) at 08/27/2012 04:24 EDT.
Naples, FL: Next predicted high tides are 2.3 ft (0.70 m) at 08/26/2012 22:47 EDT and 3.2 ft (0.98 m) at 08/27/2012 09:22 EDT.

Fort Myers, FL: Next predicted high tides are 1.0 ft (0.30 m) at 08/27/2012 02:11 EDT and 1.6 ft (0.50 m) at 08/27/2012 12:55 EDT.

St. Petersburg, FL: Next predicted high tides are 1.6 ft (0.50 m) at 08/27/2012 01:43 EDT and 2.7 ft (0.82 m) at 08/27/2012 10:46 EDT.

Cedar Key, FL: Next predicted high tides are 3.0 ft (0.91 m) at 08/27/2012 00:00 EDT and 4.0 ft (1.24 m) at 08/27/2012 10:37 EDT.

For additional data, please see the Center for Operational Oceanographic Products & Services website. For information on Highest Astronomical Tide (HAT), NAVD88 and other datums, please see Tidal Datums. For more information or archived products and reports, please see the Storm QuickLook Homepage.

Analyst: KG

SELECT NATIONAL HURRICANE CENTER ADVISORY INFORMATION:

TROPICAL STORM ISAAC ADVISORY NUMBER 22
1100 AM EDT SUN AUG 26 2012

...ISAAC LASHING SOUTH FLORIDA AND THE KEYS...

WATCHES AND WARNINGS

CHANGES WITH THIS ADVISORY...

THE HURRICANE WATCH FOR THE FLORIDA EAST COAST FROM GOLDEN BEACH SOUTHWARD TO OCEAN REEF IS DISCONTINUED.

THE HURRICANE WATCH IS EXTENDED WESTWARD ALONG THE LOUISIANA COAST TO JUST EAST OF MORGAN CITY...INCLUDING METROPOLITAN NEW ORLEANS AND LAKE PONTCHARTRAIN.

THE GOVERNMENT OF CUBA HAS DISCONTINUED THE TROPICAL STORM WARNING FOR THE CUBAN PROVINCES OF SANCTI SPIRITUS...CIEGO DE AVILA...CAMAGUEY...LAS TUNAS...HOLGUIN... GRANMA...SANTIAGO DE CUBA...AND GUANTANAMO.

SUMMARY OF WATCHES AND WARNINGS IN EFFECT...

A HURRICANE WARNING IS IN EFFECT FOR...
* THE FLORIDA KEYS INCLUDING THE DRY TORTUGAS
* THE WEST COAST OF FLORIDA FROM BONITA BEACH SOUTHWARD TO OCEAN REEF
* FLORIDA BAY

A HURRICANE WATCH IS IN EFFECT FOR...
* EAST OF MORGAN CITY LOUISIANA TO INDIAN PASS FLORIDA...INCLUDING METROPOLITAN NEW ORLEANS AND LAKE PONTCHARTRAIN

A TROPICAL STORM WARNING IS IN EFFECT FOR...
* THE CUBAN PROVINCE OF VILLA CLARA
* THE NORTHWESTERN BAHAMAS
* THE FLORIDA EAST COAST FROM SEBASTIAN INLET SOUTHWARD TO OCEAN REEF
* LAKE OKEECHOBEE
* THE FLORIDA WEST COAST AND THE FLORIDA PANHANDLE FROM NORTH OF BONITA BEACH TO INDIAN PASS...INCLUDING TAMPA BAY

A TROPICAL STORM WATCH IS IN EFFECT FOR...
* THE CUBAN PROVINCES OF MATANZAS AND CIENFUEGOS
* THE FLORIDA EAST COAST NORTH OF SEBASTIAN INLET TO FLAGLER BEACH

A HURRICANE WARNING MEANS THAT HURRICANE CONDITIONS ARE EXPECTED SOMEWHERE WITHIN THE WARNING AREA...IN THIS CASE WITHIN THE NEXT 24 HOURS. PREPARATIONS TO PROTECT LIFE AND PROPERTY SHOULD BE RUSHED.
TO COMPLETION.

A HURRICANE WATCH MEANS THAT HURRICANE CONDITIONS ARE POSSIBLE WITHIN THE WATCH AREA. A WATCH IS TYPICALLY ISSUED 48 HOURS BEFORE THE ANTICIPATED FIRST OCCURRENCE OF TROPICAL-STORM-FORCE WINDS...CONDITIONS THAT MAKE OUTSIDE PREPARATIONS DIFFICULT OR DANGEROUS.

A TROPICAL STORM WARNING MEANS THAT TROPICAL STORM CONDITIONS ARE EXPECTED SOMEWHERE WITHIN THE WARNING AREA WITHIN 36 HOURS.

A TROPICAL STORM WATCH MEANS THAT TROPICAL STORM CONDITIONS ARE POSSIBLE WITHIN THE WATCH AREA...GENERALLY WITHIN 48 HOURS.

INTERESTS IN THE REMAINDER OF CUBA...THE REMAINDER OF FLORIDA...AND THE REMAINDER OF THE NORTHERN GULF COAST SHOULD MONITOR THE PROGRESS OF ISAAC.

FOR STORM INFORMATION SPECIFIC TO YOUR AREA IN THE UNITED STATES...INCLUDING POSSIBLE INLAND WATCHES AND WARNINGS... PLEASE MONITOR PRODUCTS ISSUED BY YOUR LOCAL NATIONAL WEATHER SERVICE FORECAST OFFICE. FOR STORM INFORMATION SPECIFIC TO YOUR AREA OUTSIDE THE UNITED STATES... PLEASE MONITOR PRODUCTS ISSUED BY YOUR NATIONAL METEOROLOGICAL SERVICE.

DISCUSSION AND 48-HOUR OUTLOOK

AT 1100 AM EDT...THE CENTER OF TROPICAL STORM ISAAC WAS LOCATED NEAR LATITUDE 23. NORTH...LONGITUDE 80.8 WEST. ISAAC IS MOVING TOWARD THE WEST-NORTHWEST NEAR 18 MPH. A WEST-NORTHWESTWARD TO NORTHWESTWARD MOTION IS EXPECTED DURING THE NEXT 48 HOURS WITH A GRADUAL DECREASE IN FORWARD SPEED. ON THE FORECAST TRACK... THE CENTER OF ISAAC IS EXPECTED TO MOVE NEAR OR OVER THE LOWER FLORIDA KEYS LATER TODAY AND TONIGHT...AND MOVE INTO THE EASTERN GULF OF MEXICO ON MONDAY.

MAXIMUM SUSTAINED WINDS ARE NEAR 65 MPH... WITH HIGHER GUSTS. SOME STRENGTHENING IS FORECAST DURING THE NEXT 48 HOURS...AND ISAAC IS EXPECTED TO BE AT OR NEAR HURRICANE STRENGTH WHEN IT REACHES THE FLORIDA KEYS.

TROPICAL STORM FORCE WINDS EXTEND OUTWARD UP TO 205 MILES FROM THE CENTER. A WIND GUST TO 60 MPH... WAS REPORTED IN POMPANO BEACH... AND A WIND GUST TO 59 MPH WAS REPORTED IN KENDALL.

ESTIMATED MINIMUM CENTRAL PRESSURE IS 995 MB.

HAZARDS AFFECTING LAND

RAINFALL...TOTAL RAINFALL ACCUMULATIONS OF 4 TO 8 INCHES...WITH MAXIMUM AMOUNTS OF 12 INCHES... ARE POSSIBLE ACROSS THE FLORIDA KEYS... THE SOUTHERN PENINSULA OF FLORIDA AND PORTIONS OF CENTRAL AND EASTERN CUBA. TOTAL RAIN ACCUMULATIONS OF 3 TO 6 INCHES ARE POSSIBLE OVER THE CENTRAL AND SOUTHERN BAHAMAS.

WIND...TROPICAL STORM CONDITIONS ARE OCCURRING OVER PORTIONS OF EASTERN AND CENTRAL CUBA AND THE BAHAMAS AND THE TURKS AND CAICOS ISLANDS. TROPICAL STORM CONDITIONS ARE POSSIBLE IN PORTIONS OF NORTHWESTERN CUBA BY LATE TODAY.

HURRICANE CONDITIONS ARE EXPECTED IN THE HURRICANE WARNING AREA IN SOUTHWEST FLORIDA AND THE FLORIDA KEYS TODAY.

TROPICAL STORM CONDITIONS ARE OCCURRING IN THE TROPICAL STORM WARNING AREA ALONG THE FLORIDA EAST COAST. TROPICAL STORM CONDITIONS ARE EXPECTED TO SPREAD NORTHWARD ALONG THE WEST COAST OF FLORIDA AND INTO THE EASTERN FLORIDA PANHANDLE IN THE TROPICAL STORM WARNING AREA TONIGHT AND MONDAY.

HURRICANE CONDITIONS ARE POSSIBLE IN THE HURRICANE WATCH AREA ALONG
THE NORTHERN GULF COAST ON TUESDAY...WITH TROPICAL STORM CONDITIONS POSSIBLE BY MONDAY NIGHT.

STORM SURGE...THE COMBINATION OF A STORM SURGE AND THE TIDE WILL CAUSE NORMALLY DRY AREAS NEAR THE COAST TO BE FLOODED BY RISING WATERS. THE WATER COULD REACH THE FOLLOWING DEPTHS ABOVE GROUND IF THE PEAK SURGE OCCURS AT THE TIME OF HIGH TIDE...

* CRYSTAL RIVER THROUGH THE BIG BEND OF FLORIDA...4 TO 7 FT
* SOUTHWEST FLORIDA COAST WITHIN HURRICANE WARNING AREA...4 TO 6 FT
* FLORIDA WEST COAST FROM BONITA BEACH TO SOUTH OF CRYSTAL RIVER INCLUDING TAMPA BAY...3 TO 5 FT
* SOUTHEAST FLORIDA COAST AND THE FLORIDA KEYS...1 TO 3 FT
* CENTRAL AND EASTERN CUBA...1 TO 3 FT
* THE BAHAMAS...1 TO 3 FT

THE DEEPEST WATER WILL OCCUR ALONG THE IMMEDIATE COAST IN AREAS OF ONSHORE FLOW. SURGE-RELATED FLOODING DEPENDS ON THE RELATIVE TIMING OF THE SURGE AND THE TIDAL CYCLE...AND CAN VARY GREATLY OVER SHORT DISTANCES. FOR INFORMATION SPECIFIC TO YOUR AREA...PLEASE SEE PRODUCTS ISSUED BY YOUR LOCAL WEATHER SERVICE OFFICE. NEAR THE COAST...THE SURGE WILL BE ACCOMPANIED BY DANGEROUS WAVES.

TORNADOES...TORNADOES ARE POSSIBLE TODAY OVER CENTRAL AND SOUTHERN FLORIDA...WITH THE GREATEST THREAT OVER SOUTHERN FLORIDA AND THE KEYS.

SURF...DANGEROUS SURF AND RIP CURRENT CONDITIONS WILL CONTINUE TO AFFECT THE CENTRAL AND NORTHWESTERN BAHAMAS...EASTERN AND CENTRAL CUBA...THE FLORIDA PENINSULA AND THE FLORIDA KEYS DURING THE NEXT COUPLE OF DAYS. PLEASE CONSULT PRODUCTS FROM YOUR LOCAL WEATHER OFFICE FOR MORE INFORMATION.

FORECASTER PASCH/ROBERTS
FORECASTER BRENNA

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.
**Key West, FL**

**NDm-NOS/CDC-OBS**

Barometric Pressure Plot
8724900 Key West, FL
From 00/24/2012 12:00 - 08/27/2012 12:00

Barometric Pressure: 1002.7 mb

Last Observed Sample: 08/26/2012 11:48 (EDT)

**Relative to MLLW:** Observed: 0.89 ft. Predicted: 0.23 ft. Residual: 0.66 ft.


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**Vaca Key, FL**

**NDm-NOS/CDC-OBS**

Preliminary 6 min. Water Level vs. Predicted Plot
8723970 Vaca Key, FL
From 00/24/2012 12:00 - 08/27/2012 12:00

Last Observed Sample: 08/26/2012 11:48 (EDT)

**Relative to MLLW:** Observed: 1.42 ft. Predicted: 0.72 ft. Residual: 0.70 ft.

Historical Maximum Water Level: Oct 24 2005, 5.8 ft. above MHWW

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Tropical Storm ISAAC QuickLook, POSTED 12:00 EDT 08/26/2012

http://tidesandcurrents.noaa.gov/quicklook/data/ISAAC-print.html
Vaca Key, FL - Return to List

NOAA/NOS/OC-OPS
Wind Speed/Gusts/Dir
3793970 Vaca Key, FL
from 08/24/2012 12:00 - 08/27/2012 12:00

Last Observed Sample: 08/26/2012 11:48 (EDT)
Wind Speed: 28 knots Gusts: 35 knots Direction: 60° T

Vaca Key, FL - Return to List

NOAA/NOS/OC-OPS
Barometric Pressure Plot
3793970 Vaca Key, FL
from 08/24/2012 12:00 - 08/27/2012 12:00

Last Observed Sample: 08/26/2012 11:48 (EDT)
Barometric Pressure: 1002.6 mb

Virginia Key, FL - Return to List

NOAA/NOS/OC-OPS
Preliminary 6 min. Water Level vs. Predicted Plot
3793914 Virginia Key, FL
from 08/24/2012 12:00 - 08/27/2012 12:00

Last Observed Sample: 08/26/2012 11:54 (EDT)
Relative to MLLW: Observed: 1.19 ft. Predicted: 0.21 ft. Residual: 0.98 ft.
Historical Maximum Water Level: Oct 24 2005, 2.58 ft. above MHHW
Virginia Key, FL

Wind Speed/Gusts/Dir
8723214 Virginia Key, FL
from 08/24/2012 12:00 - 08/27/2012 12:00

Wind Speed: 24 knots Gusts: 35 knots Direction: 90° T

Last Observed Sample: 08/26/2012 11:54 (EDT)

Lake Worth Pier, FL

Barometric Pressure Plot
8722570 Lake Worth Pier, FL
from 08/24/2012 12:00 - 08/27/2012 12:00

Barometric Pressure: 1006.4 mb

Last Observed Sample: 08/26/2012 11:48 (EDT)

Relative to MLLW: Observed: 1.30 ft. Predicted: 0.64 ft. Residual: 0.66 ft.

Historical Maximum Water Level: Nov 23 1984, 1.88 ft. above MHHW

http://tidesandcurrents.noaa.gov/quicklook/data/ISAAC-print.html
Lake Worth Pier, FL - Return to List

NOS/NOMOC-OPS
Wind Speed/Gusts/Dir
8722570 Lake Worth Pier, FL
from 08/24/2012 12:00 - 08/27/2012 12:00

- Speed (kn):
- Gusts (kn): 31
- Direction: 61° T

Last Observed Sample: 08/26/2012 11:48 (EDT)
Wind Speed: 25 knots
Gusts: 31 knots
Direction: 61° T

Lake Worth Pier, FL - Return to List

NOS/NOMOC-OPS
Barometric Pressure Plot
8722570 Lake Worth Pier, FL
from 08/24/2012 12:00 - 08/27/2012 12:00

- Barometric Pressure (mb):
- Last Observed Sample: 08/26/2012 11:48 (EDT)
Barometric Pressure: 1011.0 mb

Trident Pier, FL - Return to List

NOS/NOMOC-OPS
Preliminary 6 min. Water Level vs. Predicted Plot
8721064 Trident Pier, FL
from 08/24/2012 12:00 - 08/27/2012 12:00

- Predicted Tide
- Observed WL
- Last Observed Sample: 08/26/2012 11:48 (EDT)
Relative to MLLW:
- Observed: 1.60 ft.
- Predicted: 1.14 ft.
- Residual: 0.46 ft.
Historical Maximum Water Level: Sep 26 2004, 4.01 ft. above MHHW

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http://tidesandcurrents.noaa.gov/quicklook/data/ISAAC-print.html
Trident Pier, FL - Return to List

- Last Observed Sample: 08/26/2012 11:48 (EDT)
- Wind Speed: 6 knots
- Gusts: 9 knots
- Direction: 48° T

Trident Pier, FL - Return to List

- Barometric Pressure: 1015.3 mb

Naples, FL - Return to List

- Last Observed Sample: 08/26/2012 11:48 (EDT)
- Predicted: 1.75 ft.
- Residual: -0.92 ft.
Tropical Storm ISAAC QuickLook, POSTED 12:00 EDT 08/26/2012

http://tidesandcurrents.noaa.gov/quicklook/data/ISAAC-print.html

10 of 13 8/26/2012 12:05 PM
**Fort Myers, FL** - Return to List

Historical Maximum Water Level: Nov 23 1988, 3.41 ft. above MHHW

Wind Speed/Gusts/Dir
8/24/2012 - 8/27/2012

Last Observed Sample: 08/26/2012 11:48 (EDT)
Wind Speed: 12 knots Gusts: 22 knots Direction: 52° T

**St. Petersburg, FL** - Return to List

Barometric Pressure: 1010.4 mb

Preliminary 6 min. Water Level vs. Predicted Plot
8/24/2012 - 8/27/2012

Relative to MLLW: Observed: 1.57 ft. Predicted: 2.23 ft. Residual: -0.66 ft.

Historical Maximum Water Level: Aug 31 1985, 4 ft. above MHHW
St. Petersburg, FL - Return to List

NOS/NOMOS-US-OPS
Wind Speed/Gusts/Dir
372520 St. Petersburg, FL
from 08/24/2012 12:00 to 08/27/2012 12:00

Last Observed Sample: 08/26/2012 11:48 (EDT)
Wind Speed: 9 knots Gusts: 15 knots Direction: 43° T

St. Petersburg, FL - Return to List

NOS/NOMOS-US-OPS
Barometric Pressure Plot
372520 St. Petersburg, FL
from 08/24/2012 12:00 to 08/27/2012 12:00

Last Observed Sample: 08/26/2012 11:48 (EDT)
Barometric Pressure: 1014.5 mb

Cedar Key, FL - Return to List

NOS/NOMOS-US-OPS
Preliminary 6 min. Water Level vs. Predicted Plot
372750 Cedar Key, FL
from 08/24/2012 12:00 to 08/27/2012 12:00

Predicted Tide (Obs-Pred) -0.7
Observed ML

Tropical Storm ISAAC QuickLook, POSTED 12:00 EDT 08/26/2012
http://tidesandcurrents.noaa.gov/quicklook/data/ISAAC-print.html

Center for Operational Oceanographic Products & Services (CO-OPS) | National Ocean Service (NOS)
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