Water-Data Report 2012

USGS 252254080221101, Well G -3933, Local number TPGW-2

Biscayne aquifer
Biscayne Limestone Aquifer

Miami-Dade County, FL

LOCATION.--Lat 25°22'54.2", long 80°22'11.4" referenced to North American Datum of 1983, in sec.18, T.58 S., R.40 E., Miami-Dade County, FL, Hydrologic Unit 03090202, about 9 mi southeast of Homestead, Florida.

GROUNDWATER RECORDS

WELL CHARACTERISTICS.--Depth 103 ft. Upper casing diameter 2; top of first opening 86 ft, bottom of last opening 88 ft.

DATUM.--Land-surface datum is 3.20 ft above National Geodetic Vertical Datum of 1929. Measuring point: From April 5, 2010, to present, measuring point has been top of casing, in meter box, 1.14 ft above North American Vertical Datum of 1988. From April 5, 2010, to present, measuring point has been top of casing, in meter box, 2.67 ft above National Geodetic Vertical Datum of 1929. Land-surface datum is about 1.7 ft above the North American Vertical Datum of 1988 (NAVD 1988).

WATER SURFACE ELEVATION IN FEET NGVD 1929
WATER YEAR OCTOBER 2011 TO SEPTEMBER 2012

Date	Water level
Mar 21	1.32

Suggested citation: U.S. Geological Survey, 2013, Water-resources data for the United States, Water Year 2012: U.S. Geological Survey Water-Data Report WDR-US-2012, site 252254080221101, accessed at http://wdr.water.usgs.gov/wy2012/pdfs/252254080221101.2012.pdf

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WATER-QUALITY RECORDS

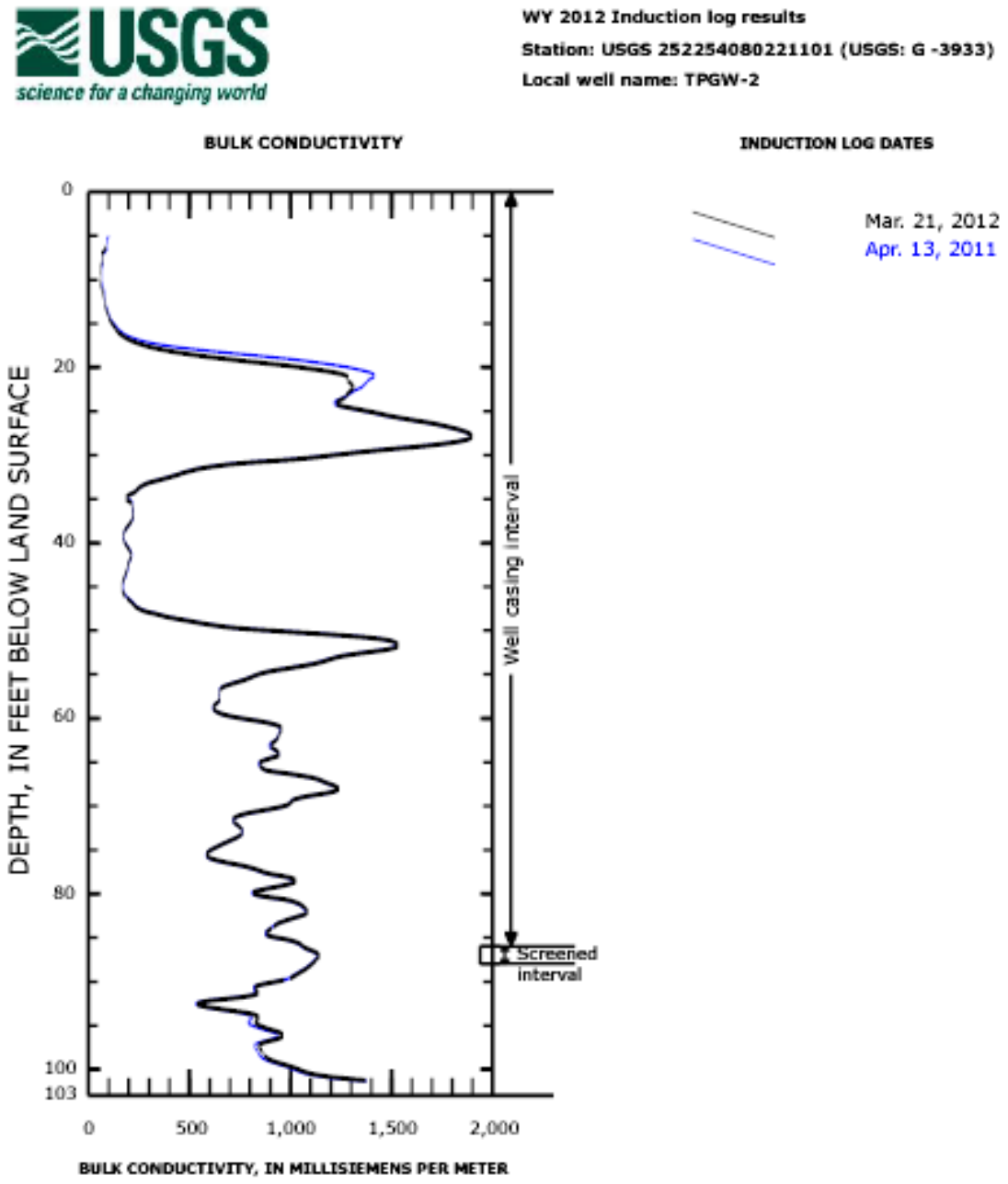
PERIOD OF RECORD.--April 2010 to current year. (Corrected) See REMARKS.

INSTRUMENTATION.--Annual measurement with chalked steel tape or an electric tape. Annual profile with electromagnetic induction logger. See REMARKS.

REMARKS.--This well is monitored for yearly changes in groundwater salinity, starting with the post-construction (electromagnetic) induction log collected in April 2010 and annual induction logs thereafter. Sequential induction logs collected at a consistent frequency interval can be used to assess relative salinity changes in ground water and/or to monitor changes in one or more interfaces between saline water and fresh water. See RECORDS OF BULK CONDUCTIVITY. Annual water-level measurements began in 2011.

In order to display changes in bulk conductivity between successive logs, the published induction logs are adjusted to a mean or median conductivity value selected for a depth matching a stable, lithologically controlled feature in the log that produces a consistent conductivity profile among the adjusted logs. The adjustments compensate for overall variations in equipment response that do not correspond to differences in bulk conductivity among aquifer materials at the site, or to salinity differences among water-bearing units within the aquifer, but may instead represent varying environmental conditions during annual equipment calibration and well logging operations.

For this publication, the WY 2011 and 2012 electromagnetic induction logs are adjusted to amean bulk conductivity value of 173 mS/m at a depth of 39.2 ft below land surface. The combined induction log is published in the figure below. The original and corrected records of bulk conductivity, in millisiemens per meter, are available in files of the U.S. Geological Survey. Pre- and post- construction induction logs collected in WY 2010 are published under local well number TPGW-2 in Open-File Report 2010-1260 (http://pubs.usgs.gov/of/2010/1260/). Figures of elevation, in ft above NAVD 1988, have been converted from NGVD 1929 using VERTCON.

COOPERATION.--Florida Power & Light Company

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