

WYRICK 1960	LICHTLER 1960	CLARKE 1964	LEVE 1966	WOLANSKY 1978	MILLER 1980	BOGGESS 1986; ARTHUR AND OTHERS 2008	SWFWMD PRESENT
nonartesian aquifer	Shallow aquifer	water-table aquifer	shallow aquifer system	unconfined aquifer	surficial aquifer	surficial aquifer system	surficial aquifer
<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>

[SWFWMD, Southwest Florida Water Management District]

SPROUL AND OTHERS 1972	JOYNER, SUTCLIFFE 1976	WEDDERBURN AND OTHERS 1982	WOLANSKY 1983	BARR 1996	TORRES AND OTHERS 2001	KNOCHENMUS 2006	ARTHUR AND OTHERS 2008	SWFWMD PRESENT
<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>
sandstone aquifer	Zone 1	Hawthorn Aquifer System	Intermediate aquifers	Intermediate aquifer system	Tamiami/ Peace River zone (PZ1)	Intermediate aquifer system	zones/ aquifers were not delineated	Peace River aquifer
<i>confining unit</i>	<i>confining unit</i>				<i>confining unit</i>			<i>confining unit</i>
upper Hawthorn aquifer	Zone 2	mid-Hawthorn aquifer	Tamiami - upper Hawthorn aquifer	Permeable Zone 2	Upper Arcadia zone (PZ2)	Zone 2	Intermediate aquifer system / intermediate confining unit	upper Arcadia aquifer
<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>		<i>confining unit</i>
lower Hawthorn aquifer	Zone 3	FAS	Lower Hawthorn - upper Tampa aquifer	Permeable Zone 3	Lower Arcadia zone (PZ3)	Zone 3		lower Arcadia aquifer
<i>confining unit</i>	<i>confining unit</i>		<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>	<i>confining unit</i>

[FAS, Floridan aquifer system; PZ, permeable zone; SWFWMD, Southwest Florida Water Management District]

STRINGFIELD 1936	PARKER AND OTHERS 1955	STRINGFIELD 1966	MILLER 1982	BUSH 1982	MILLER 1986	REESE AND RICHARDSON 2008	ARTHUR AND OTHERS 2008	WILLIAMS AND KUNIANSKY 2016	SWFWMD PRESENT
confining unit	confining unit	confining unit	confining unit	confining unit	confining unit	confining unit	confining unit	confining unit	confining unit
chief water-bearing artesian formations	Floridan aquifer	principal artesian aquifer	Tertiary limestone aquifer system permeable zone	Tertiary limestone aquifer Upper permeable zone	Floridan aquifer system Upper Floridan aquifer	Lower Hawthorn producing zone Upper Floridan aquifer	Upper Floridan aquifer	Upper Floridan aquifer Upper permeable zone	upper Floridan aquifer
					middle confining unit I	MC1 (middle semiconfining unit and/or confining unit, upper part)		Ocala-Avon Park low permeability zone (OCAPIpz)	Ocala low- permeability zone
			less permeable zone	Intra-aquifer low-permeability zone	Lower Floridan aquifer below middle confining unit I	Avon Park permeable zone		Avon Park Permeable Zone	Avon Park high- permeability zone ²
			permeable zone	Lower permeable zone	middle confining unit II or VI	MC2 (middle semiconfining unit and/or confining unit, lower part)	Middle Floridan confining unit ¹	Middle-Avon Park confining unit (MAPCU)	Avon Park high- permeability zone ²
					Lower Floridan aquifer below middle confining unit II or VI	Lower Floridan aquifer	Lower Floridan aquifer	Lower Floridan aquifer Lower Avon Park permeable zone	lower Floridan aquifer below middle confining unit I
					middle confining unit VIII ³			Glauconite marker unit (GLAUCIpu)	middle confining unit II or VI
					Lower Floridan aquifer below middle confining unit VIII			Oldsmar permeable zone	lower Floridan aquifer below middle confining unit VIII
			confining unit	confining unit	confining unit	confining unit	confining unit	confining unit	confining unit

[Terms shown are for hydrogeologic units present within the Southwest Florida Water Management District (SWFWMD)]

¹Arthur and others acknowledge existence of the middle confining unit I within the Southwest Florida Water Management but do not map it for Special Publication 68.

²The Avon Park high-permeability zone (SWFWMD fracture zone) crosses middle confining unit I in central Polk County; therefore, it occurs above the middle confining unit I in northern Polk and below the middle confining unit I in southern Polk.

³The middle confining unit VIII of Miller (1986) in south Florida was extended across the entire peninsula as the Glauconite marker unit based on new data in Williams and Kuniansky (2016).

Southwest Florida Water Management District Stratigraphic Correlation Chart

Holocene		undifferentiated sand and clay		surficial aquifer	
Pleistocene		Cypresshead Fm			
Pliocene		Caloosahatchee Fm			
		Tamiami Fm			
Miocene	late	Hawthorn Group	Coosawhatchie Formation	confining unit	
	middle		Peace River Formation	Peace River aquifer	
	early		Arcadia Formation	confining unit	
Oligocene	late		<ul style="list-style-type: none"> • Bone Valley Member • Tampa Member • Nocatee Member 	<ul style="list-style-type: none"> • Bone Valley Member • Tampa Member • Nocatee Member 	upper Arcadia aquifer confining unit lower Arcadia aquifer confining unit
	early	Suwannee Limestone		confining unit	
Eocene	late	Ocala Limestone		Ocala low-permeability zone upper Floridan aquifer Avon Park high-permeability zone ²	
	middle	Avon Park Formation		middle confining unit I Avon Park high-permeability zone ² lower Floridan aquifer below middle confining unit I middle confining unit II or VI	
	early	Oldsmar Formation		lower Floridan aquifer below middle confining unit II or VI middle confining unit VIII ³ lower Floridan aquifer below middle confining unit VIII	
Paleocene		Cedar Keys Formation		confining unit	

This chart may be used to correlate the chronostratigraphic and lithostratigraphic units of the current hydrogeologic framework model of the Southwest Florida Water Management District.

Note: ¹The Hawthorn aquifer system was previously referred to as the intermediate aquifer system. ²The Avon Park high-permeability zone (SWF-WMD fracture zone) crosses middle confining unit I in central Polk County; therefore, it occurs above the middle confining unit I in northern Polk and below the middle confining unit I in southern Polk. ³The middle confining unit VIII of Miller (1986) was extended beyond the original extent in south Florida based on new data.

Southwest Florida Water Management District Stratigraphic Correlation Chart

Holocene		Alachua Formation	undifferentiated sand and clay		surficial aquifer	
Pleistocene			Cypresshead Fm			
Pliocene			Caloosahatchee Fm			
			Tamiami Fm			
Miocene	late	Alachua Formation	Hawthorn Group	Coosawhatchie Formation	Hawthorn aquifer system ¹	
	middle			Peace River Formation		Peace River aquifer
	early			Arcadia Formation		upper Arcadia aquifer
Oligocene	late	Alachua Formation	Hawthorn Group	Arcadia Formation	lower Arcadia aquifer	
	early					Suwannee Limestone
Eocene	late	Crystal River Fm Williston Formation Inglis Formation	Ocala Limestone	Ocala Limestone	upper Floridan aquifer	
	middle	Lake City Limestone			Avon Park Formation	middle confining unit I
	early				Oldsmar Formation	lower Floridan aquifer below middle confining unit I
Paleocene			Cedar Keys Formation	Cedar Keys Formation	lower Floridan aquifer below middle confining unit VIII ³	

This chart may be used to correlate the stratigraphic units in past reports to the current hydrogeologic framework model of the Southwest Florida Water Management District.

Note: ¹The Hawthorn aquifer system was previously referred to as the intermediate aquifer system. ²The Avon Park high-permeability zone (SWF-WMD fracture zone) crosses middle confining unit I in central Polk County; therefore, it occurs above the middle confining unit I in northern Polk and below the middle confining unit I in southern Polk. ³The middle confining unit VIII of Miller (1986) was extended beyond the original extent in south Florida based on new data.

SA References (in chronological order):

- Wyrick, G.G., 1960, Ground-water resources of Volusia County, Florida: Florida Geological Survey Report of Investigations 22, 65 p.
- Lichtler, W.F., 1960, Geology and ground-water resources of Martin County, Florida: Florida Geological Survey Report of Investigations 23, 149 p.
- Clarke, W.E., Musgrove, R.M., Menke, G.C., and Cagle, J.W., Jr., 1964, Water resources of Alachua, Bradford, Clay, and Union Counties, Florida: Florida Geological Survey Report of Investigations 35, 170 p.
- Leve, G.L., 1966, Ground water in Duval and Nassau Counties, Florida: Florida Geological Survey Report of Investigations 43, 91 p.
- Wolansky, R.M., 1978, Feasibility of water-supply development from the unconfined aquifer in Charlotte County, Florida: U.S. Geological Survey Water-Resources Investigations Report 78-26, 34 p.
- Miller, W.L., 1980, Geologic aspects of the surficial aquifer in the Upper East Coast planning area, southeast Florida: U.S. Geological Survey Water-Resources Investigations Report 80-586, scale 1:62,500, 2 sheets.
- Boggess, D.M., and Watkins, F.A., Jr., 1986, Surficial aquifer system in eastern Lee County, Florida: U.S. Geological Survey Water-Resources Investigations Report 85-4161, 59 p.
- Arthur, J.D., Fischler, C., Kromhout, C., Clayton, J.M., Kelley, M., Lee, R.A., O'Sullivan, M., Green, R.C., and Werner, C.L., 2008, Hydrogeologic Framework of the Southwest Florida Water Management District: Florida Geological Survey Bulletin No. 68, 104 p.

HAS References (in chronological order):

- Sproul, C.R., Boggess, D.H., and Woodward, H.J., 1972, Saline-water intrusion from deep artesian sources in the McGregor Isles area of Lee County, Florida: Florida Bureau of Geology Information Circular 75, 30 p.
- Joyner, B.F., and Sutcliffe, H. Jr., 1976, Water Resources of the Myakka River Basin Area, Southwest Florida: U.S. Geological Survey Water-Resources Investigation 76-58, 87 p.
- Wedderburn, L.A., Knapp, M.S., Waltz, D.P., and Burns, W.S., 1982, Hydrogeologic Reconnaissance of Lee County, Florida: South Florida Water Management District Technical Publication 82-1, pts. 1, 2, and 3, 192 p.
- Wolansky, R.M., 1983, Hydrogeology of the Sarasota-Port Charlotte Area, Florida: U.S. Geological Survey Water-Resources Investigations Report 82-4089, 54 p.
- Barr, G.L., 1996, Hydrogeology of the Surficial and Intermediate Aquifer Systems in Sarasota and Adjacent Counties, Florida: U.S. Geological Survey Water-Resources Investigations Report 96-4063, 87 p.
- Torres, A.E., Sacks, L.A., Yobbi, D.K., Knochenmus, L.A., and Katz, B.G., 2001, Hydrogeological Framework and Geochemistry of the Intermediate Aquifer System in Parts of Charlotte, De Soto, and Sarasota Counties, Florida: U.S. Geological Survey Water-Resources Investigations Report 01-4015, 81 p.
- Knochenmus, L.A., 2006, Regional Evaluation of the Hydrogeologic Framework, Hydraulic Properties, and Chemical Characteristics of the Intermediate Aquifer System Underlying Southern West-Central Florida: U.S. Geological Survey Scientific Investigations Report 2006-5013, 40 p.
- Arthur, J.D., Fischler, C., Kromhout, C., Clayton, J.M., Kelley, M., Lee, R.A., O'Sullivan, M., Green, R.C., and Werner, C.L., 2008, Hydrogeologic Framework of the Southwest Florida Water Management District: Florida Geological Survey Bulletin No. 68, 104 p.

FAS References (in chronological order):

Stringfield, V.T., 1936, Artesian water in the Floridan peninsula: U.S. Geological Survey Water-Supply Paper 773-C, p. C115-C195.

Parker, G.G., and others, 1955, Water resources of southeastern Florida: U.S. Geological Survey Water-Supply Paper 1255, 965 p.

Stringfield, V. T., 1966, Artesian water in Tertiary limestone in the Southeastern States: U.S. Geological Survey Professional Paper 517, 226 p.

Miller, J. A., 1982, Geology and configuration of the base of the Tertiary limestone aquifer system, southeastern United States: U.S. Geological Survey Water-Resources Investigations 81-1176, 1 map sheet.

Bush, P. W., 1982, Predevelopment Flow in the Tertiary limestone aquifer, southeastern United States; A Regional Analysis from Digital Modeling: U.S. Geological Survey Water-Resources Investigations Report 82-905, 56 p.

Miller, J. A., 1986, Hydrogeologic Framework of the Floridan Aquifer System in Florida and in Parts of Georgia, Alabama, and South Carolina: U.S. Geological Survey Professional Paper 1403-B., 91 p.

Reese, R.S., and Richardson, Emily, 2008, Synthesis of the Hydrogeologic Framework of the Floridan Aquifer System and Delineation of a Major Avon Park Permeable Zone in Central and Southern Florida: U.S. Geological Survey Scientific Investigations Report 2007-5207, 60 p., 4 pls., plus apps. (on CD).

Arthur, J.D., Fischler, C., Kromhout, C., Clayton, J.M., Kelley, M., Lee, R.A., O'Sullivan, M., Green, R.C., and Werner, C.L., 2008, Hydrogeologic Framework of the Southwest Florida Water Management District: Florida Geological Survey Bulletin No. 68, 104 p.

Williams, L.J., and Kuniansky, E.L., 2016, Revised Hydrogeologic Framework of the Floridan Aquifer System in Florida and Parts of Georgia, Alabama, and South Carolina (ver. 1.1, March 2016): U.S. Geological Survey Professional Paper 1807, 140 p., 23 pls., <http://dx.doi.org/10.3133/pp1807>.

NOTES: Figure captions to be used for reports are below. For figure 1, *A*, *B*, *C* will need to be added to the top left corner of each aquifer/aquifer system correlation chart. Do not include the reference and notes pages in the appendix. Instead include the references in the Selected References of the main report.

Figure F1. Nomenclature of (*A*), the surficial aquifer, (*B*), the Hawthorn aquifer system, and (*C*), the Floridan aquifer system used for the ROMP ## – Name well site compared to nomenclature in previously published reports.

Figure F1. **(Continued)** Nomenclature of (*A*), the surficial aquifer, (*B*), the Hawthorn aquifer system, and (*C*), the Floridan aquifer system used for the ROMP ## – Name well site compared to nomenclature in previously published reports.

Figure F2. Chart correlating chronostratigraphic and lithostratigraphic units to the current hydrogeologic framework of the Southwest Florida Water Management District.

Figure F3. Chart correlating lithostratigraphic units used in past reports to current lithostratigraphic units and the current hydrogeologic framework of the Southwest Florida Water Management District.