

208 AREAWIDE WATER QUALITY MANAGEMENT PLAN (SANDUSKY COUNTY)

The Federal Water Pollution Control Act Amendments of 1972 called upon areawide planning agencies with large urban populations to develop Areawide Water Quality Management Plans. In Ohio twenty-four counties with large urban populations act as the lead planning agency to prepare the 208 Plans. In Sandusky County, Toledo Metropolitan Area Council of Governments (TMACOG) prepares and maintains the 208 plans.

The information from each 208 plan is used by Ohio EPA and the planning areas as a guide for permitting wastewater collection and treatment systems along with evaluating financial assistance. The information provided in the plan is used to develop alternatives for correcting identified problems and to achieve Ohio's water quality standards.

The Areawide Water Quality Management Plan incorporates environmental goals and polices, describes the responsibilities of local governmental agencies to implement and provide sanitary sewerage service, and identify best management practices to control water pollution in an effort to achieve the "fishable and swimmable" water quality standards.

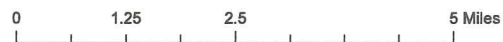
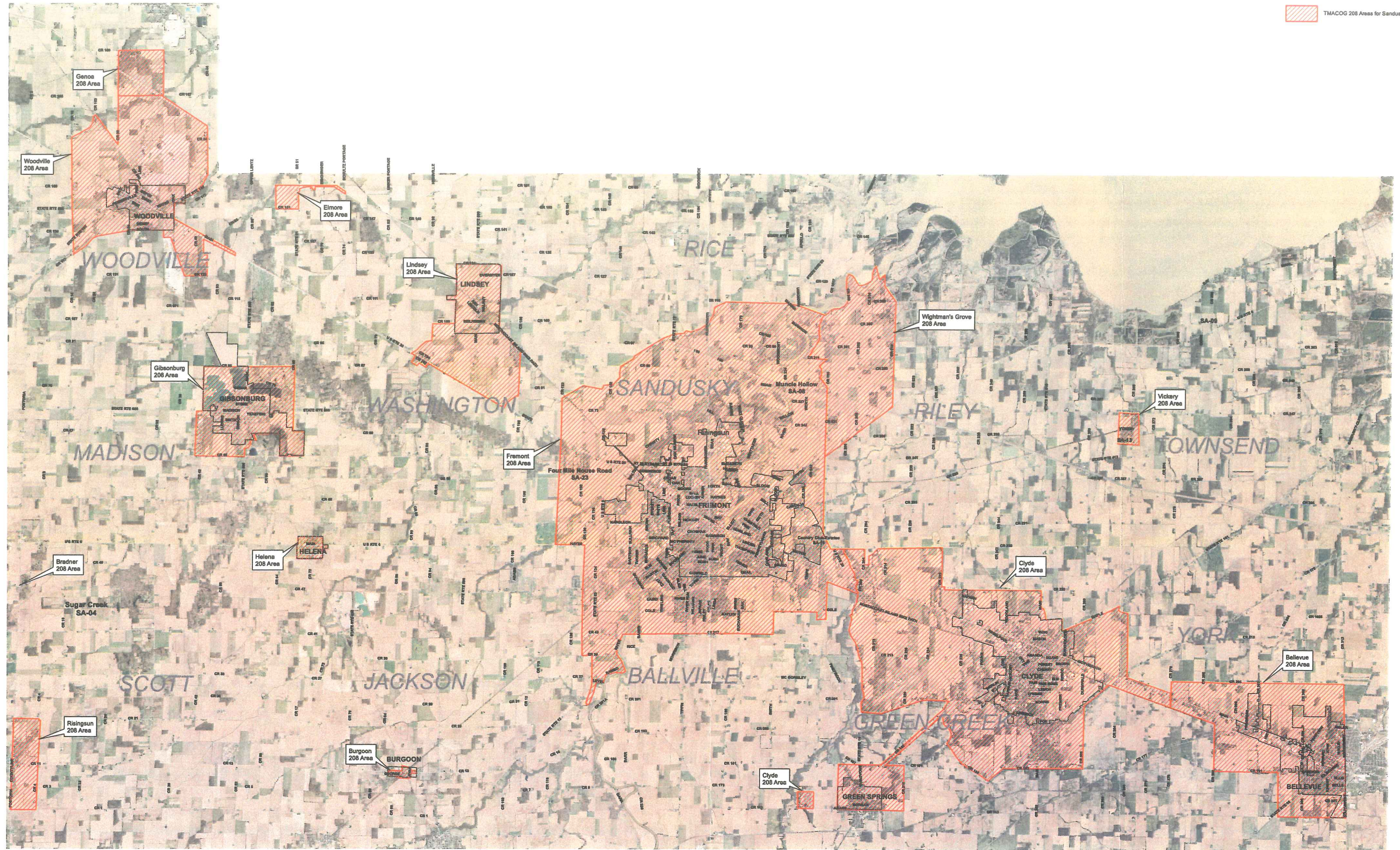
Facility Planning Area (FPA)

A Facility Planning Area is considered a key element of an Areawide Water Quality Management Plan. An FPA may cover a municipality and surrounding developed areas where public wastewater treatment may be provided more economically or effectively at a regional level than for individual treatment systems. FPA's provide sanitary sewer jurisdictions for existing treatment facilities and service areas which could include areas outside of their corporation limits. When establishing an FPA, a map illustrating a sanitary sewer service area is established and supported by documentation of existing infrastructure, population forecasts, availability of treatment along with means to meet finished water quality standards. Any development of sanitary sewers within the FPA of a municipality are required to discharge to that system. This can be problematic as it is possible that for financial or political reasons it may be beneficial to discharge to another treatment facility.

An FPA approved boundary is a planning area for a single specific present or future wastewater plant as well as a service area for designated wastewater plants. General guidelines and principals for FPAs are listed as follows:

1. FPAs should be compact and contiguous concentrations of urban land use without islands of one FPA surrounding another.
2. Remote service areas may be included in an FPA when connected by force main separated by areas that should remain un-urbanized.
3. FPAs should be designed to serve residents in the most cost-effective manner without duplication of service.
4. FPA boundaries should be consistent with adopted local land use plans.
5. FPA boundaries should be developed through cooperative dialogue among affected local jurisdictions. Ohio EPA encourages neighboring governments to resolve sewerage service conflicts through a collaborative process. If affected local jurisdictions are unable to resolve conflicts regarding an amendment to the plan through a collaborative process, then these issues will be resolved by Ohio EPA.

The Facility Planning Areas based on Sandusky County's Areawide Water Quality Management Plan as prepared by TMACOG is available online at www.tmacog.org or at ww.epa.state.oh.us. Areas outside of the designated 208 Planning Areas except for the Sandusky Township Sewer District is under the jurisdiction of the Sandusky County Commissioners and Sanitary Engineer's office. Sandusky County will continue to work with TMACOG as changes and/or modifications are required for County planning as it relates to the Areawide Quality Management Plan. This allows the County some freedom to offer comments to change and adjust FPAs in conjunction with other communities', TMACOG's, and Ohio EPA's input.



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2/6/2014
PDG JOB# 3185-039
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SANDUSKY COUNTY
FACILITY PLANNING AREAS

PLATE 8

SANDUSKY COUNTY
COMPREHENSIVE WATER & SEWER
GENERAL PLAN



Sanitary Sewer Districts

The first established sanitary sewer service area (Sewer District #1) within Sandusky County was established in 1964 to preserve and promote public health and welfare. An agreement between the City of Fremont and the County of Sandusky was adopted in 1973. The agreement allowed the County to construct a sanitary sewer collection system to transport sewage to the City of Fremont for treatment. This eliminated the necessity for the construction of a county-owned wastewater treatment facility. All sewage from Sewer District #1 is collected by the County's collection system and treated by the City of Fremont.

Fourteen supplemental agreements to the original Sewer District #1 between the City of Fremont and the County have been developed and adopted with the last supplemental agreement entered into on January of 2012. The agreement and supplemental agreements are currently being replaced with a new agreement between the City of Fremont and the County of Sandusky. The new Sewer District #1 Agreement should be completed in 2015.

In 1998, the County General Sewer District was formed by consolidating three other Sewer Districts except for Sewer District #1. Those Districts included the following wastewater plants: Shorewood (constructed in 1971), Westwood (constructed in 1973), and Adams Acres (constructed in 1976). Since the formation, Shorewood Wastewater Plant was abandoned and connected to the City of Fremont for treatment via a County collection system in 2001. The General Sewer District includes the entire County outside of the municipalities and the Sandusky Township Sewer District. All areas utilize County collection systems transporting sewage to the City of Fremont for treatment except Westwood and Adams Acres Wastewater Plants.

Sandusky Township formed a Sanitary Sewer District in 1993 and they have operation and maintenance agreements with the County and treatment agreements with the City of Fremont. At that time, Sandusky Township Sewer District determined that in order to provide sanitary sewage service, conveyance of the sanitary waste to the City of Fremont for treatment was in the District's best interest. For the Township Sewer District's first project, the Township Sewer District utilized the County General Sewer District facilities to transport the sewage to the City of Fremont. Other Township service areas have been added with direct connections to the City of Fremont via additional agreements with the City of Fremont.

As outlined and recommended in the previous Comprehensive Water and Sanitary Sewer General Plan in 1997, the two County Sewer Districts (Sewer District #1 and the General Sewer District) would be best to be merged into a single sewer district that encompasses all of the territory within the boundaries of Sandusky County, excluding the limits of the municipal corporation along with the current limits of the Sandusky Township Sewer District. This would provide the County the ability for further expansion of both districts along with rehabilitation of the aging system of Sewer District #1. This would also yield a more efficient operation, maintenance, and replacement services provided by the County. Administrative record keeping and accounting would be greatly simplified, allowing for significant cost savings.

Another benefit of a single sewer district is the County could utilize a single user charge system for operation, maintenance, rehabilitation, and expansion. There are many ways to establish the charges and would need to be determined by the County. One way would be to spread out the operation, maintenance, and rehabilitation over the entire customer base with the debt retirement assigned to a specific area for the expansion of services if possible. Intergovernmental agreements could be reduced from three agreements to one agreement. The County has two separate sewer budgets and accounting for each district.⁶ In 1997, District #1 customers were concerned with pooling of the funds with the newly formed General Sewer District. Since the consolidation, the General Sewer District is a self-sufficient and independent of Sewer District #1 and this should no longer be a concern of District #1 customers.

The County was approached in the past by the Sandusky Township Sewer Board in regard to taking over ownership of their Sewer District. At this time, the County did not want to take ownership of legal issues that were ongoing at that time. The County indicated to the Township Sewer District that this could be revisited when the Township Sewer District resolved their legal issues. The County should prepare for taking over the ownership of the Township Sewer District's sewers if the Township Sewer District so desires.

Rehabilitation projects are a high priority with the aging system for the County's Sewer District #1. The County replaced the Grandview Lift Station in 2013 and performed major upgrades to the Ireland Lift Station in 2014. This trend will continue with the other aging facilities of the County's District. The Ohio EPA is requiring more inflow and infiltration projects for all sewer districts via the

City of Fremont's NPDES permit. Both the County and Township will need to initiate additional inspections of their systems along with coordination of rehabilitation projects based on the inspections.⁶

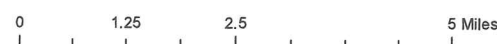
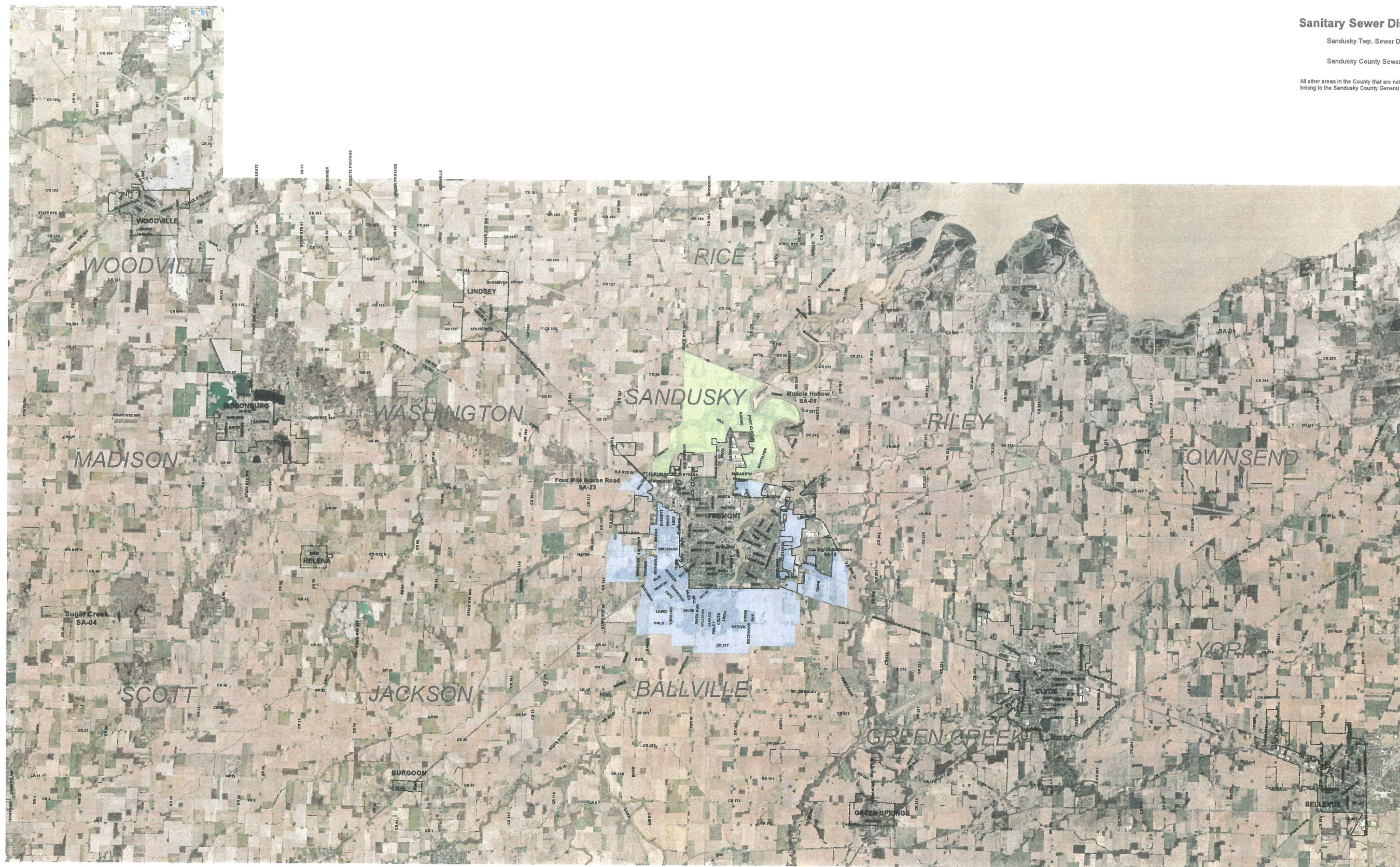
Plate 9 shows the sanitary service areas for all three sewer districts. All areas outside the municipalities, Sewer District #1, and the Sandusky Township Sewer District are included in the Sandusky County General Sewer District. Plate 10 shows the actual sanitary sewer pump stations, force mains, and gravity sewers that serve all three Sewer Districts.

Sanitary Sewer Districts

Sandusky Twp. Sewer District

Sandusky County Sewer District # 1

All other areas in the County that are not shaded belong to the Sandusky County General Sewer District



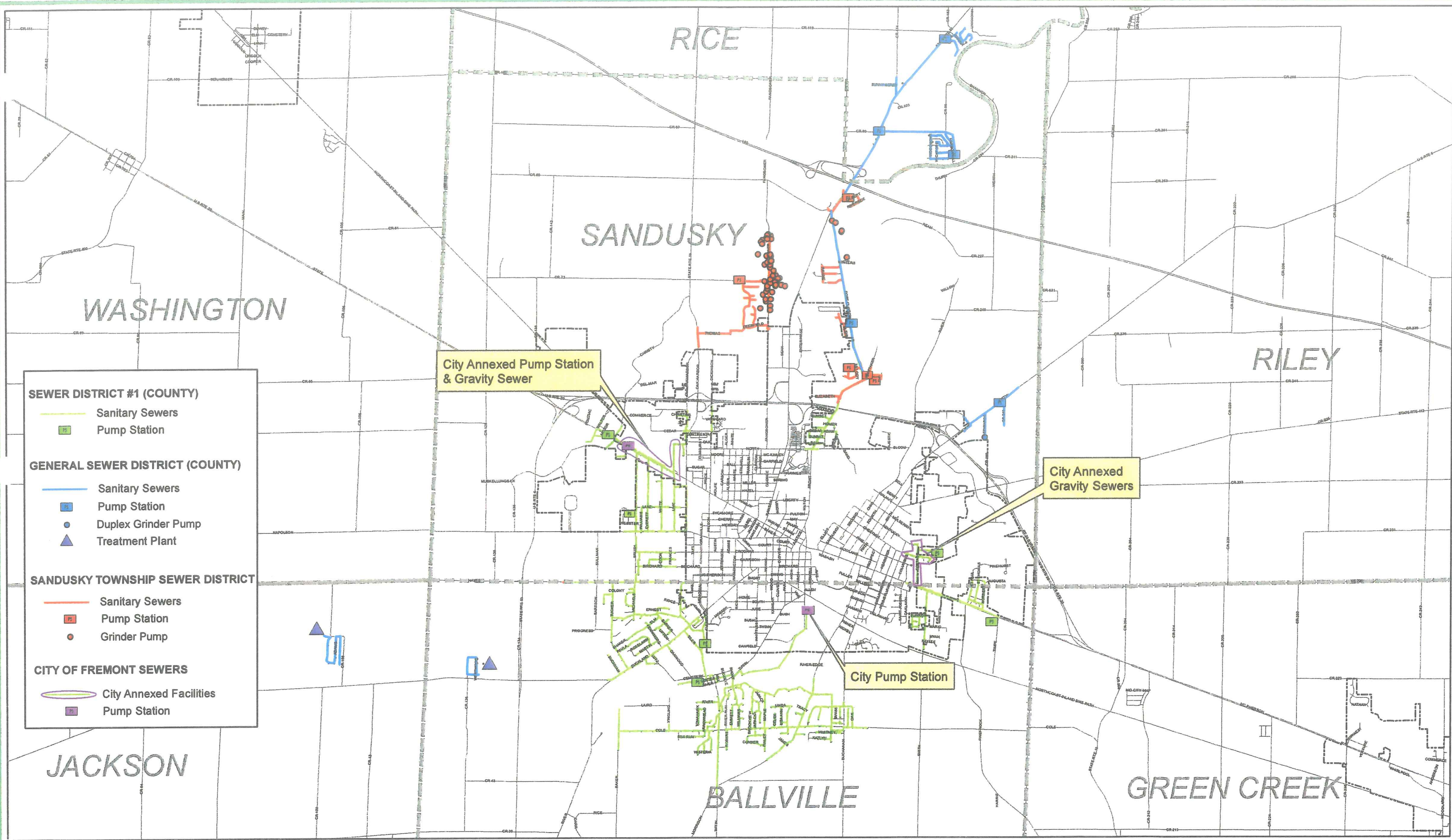
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**SANDUSKY COUNTY
SANITARY SEWER DISTRICTS**

PLATE 9

**SANDUSKY COUNTY
COMPREHENSIVE WATER & SEWER
GENERAL PLAN**





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11/7/2013
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SANITARY SEWERS
PLATE 10

SANDUSKY COUNTY
COMPREHENSIVE WATER & SEWER
GENERAL PLAN



Critical Sewage Areas

The Sandusky County Board of Health and Ohio EPA Division of Surface Water have identified critical Sewage Areas. These areas have concentrations of failed or soon to fail on-site sewage systems that have been tested for fecal coliform or E. coli or complaints have been received. The critical sewage areas if allowed to continue could cause surface and groundwater contamination or lead to a public health nuisance. Existing system upgrades/replacement often will not solve the problem due to soil conditions, small lots, and system concentrations.

The TMACOG Environmental Council with the direction and assistance of the Sandusky County Health Department and Ohio EPA, Northwest District Office have developed a list of critical swage areas which includes twenty-one areas. Table 13 lists each area without prioritization.

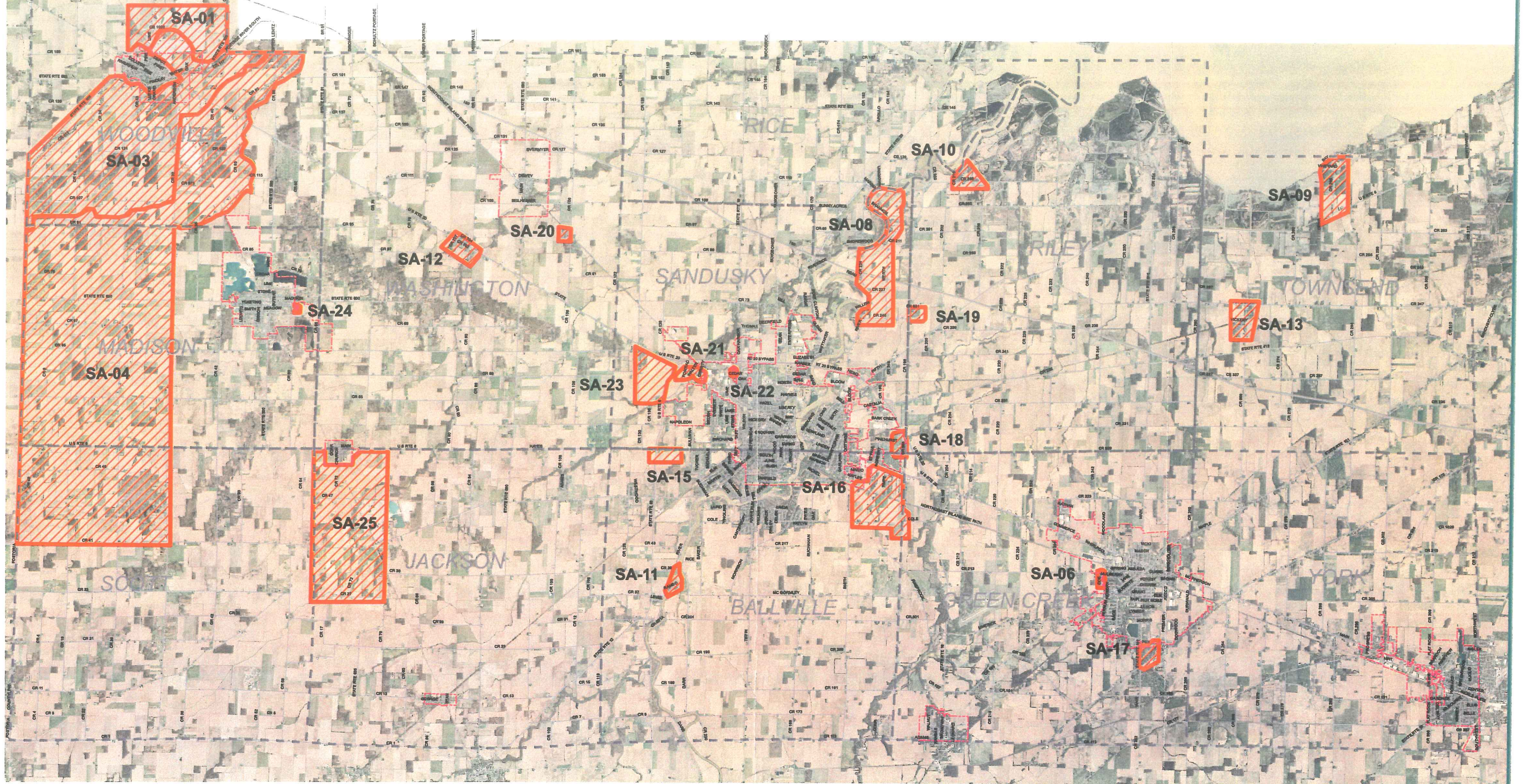
TABLE 13 SANDUSKY COUNTY CRITICAL SEWAGE AREAS		
Name	Township	Critical Sewer Area Numbers
North of Portage River	Woodville	SA-01
South of Portage River	Woodville	SA-03
Sugar Creek	Woodville, Madison, and Scott	SA-04
Rodriguez Street	Madison	SA-24
Hessville	Washington	SA-12
Wooded Acres Campground	Washington	SA-20
Millersville	Jackson	SA-25
Four Mile House Road	Sandusky	SA-23
West State Street	Sandusky	SA-21
Christina Drive	Sandusky	SA-22
East of Sandusky River	Sandusky	SA-08
Country Club Estates (Fairway Drive)	Sandusky	SA-18
Hayes Avenue/State Route 53	Ballville and Sandusky	SA-15
Rambo Lane	Ballville	SA-11

TABLE 13 SANDUSKY COUNTY CRITICAL SEWAGE AREAS		
Name	Township	Critical Sewer Area Numbers
Timpe/Township Line/Cole	Ballville and Green Creek	SA-16
Wightman's Grove	Riley	SA-10
Barkshire Hills (Bethany Drive)	Riley	SA-19
Woodland Heights (Coe Road/Franks Avenue)	Green Creek	SA-06
Limerick Road	Green Creek	SA-17
Vickery	Townsend	SA-13
Whites Landing	Townsend	SA-09

Plate 11 shows the location of each of the critical sewer areas as identified by TMACOG.

CRITICAL SEWAGE AREAS
JUNE 2013

Source: TMACOG



Legend

 Critical Areas



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CRITICAL SEWAGE AREAS
IN SANDUSKY COUNTY

PLATE 11

SANDUSKY COUNTY
COMPREHENSIVE WATER & SEWER
GENERAL PLAN



Director's Findings and Orders

Ohio Revised Code (ORC) and Ohio Administrative Code (OAC) set procedures for reporting cases where untreated sewage is contaminating public waterways. ORC §6111.05 requires Ohio EPA to investigate when it receives a written complaint. ORC §6117.34 describes a more rigorous complaint procedure applicable to unincorporated areas and is recommended for Health Departments. Such a complaint should be sent to the Ohio EPA District Office and follow procedures set in OAC 3745-1-04(F), summarized below:

- ▶ Detailed documentation of unsanitary conditions, visual (black water or sludge, gassing or grayish white water, toilet paper), odor (sewage smell), and data (fecal coliform or E. coli).

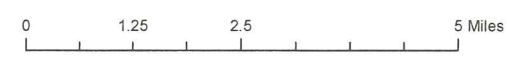
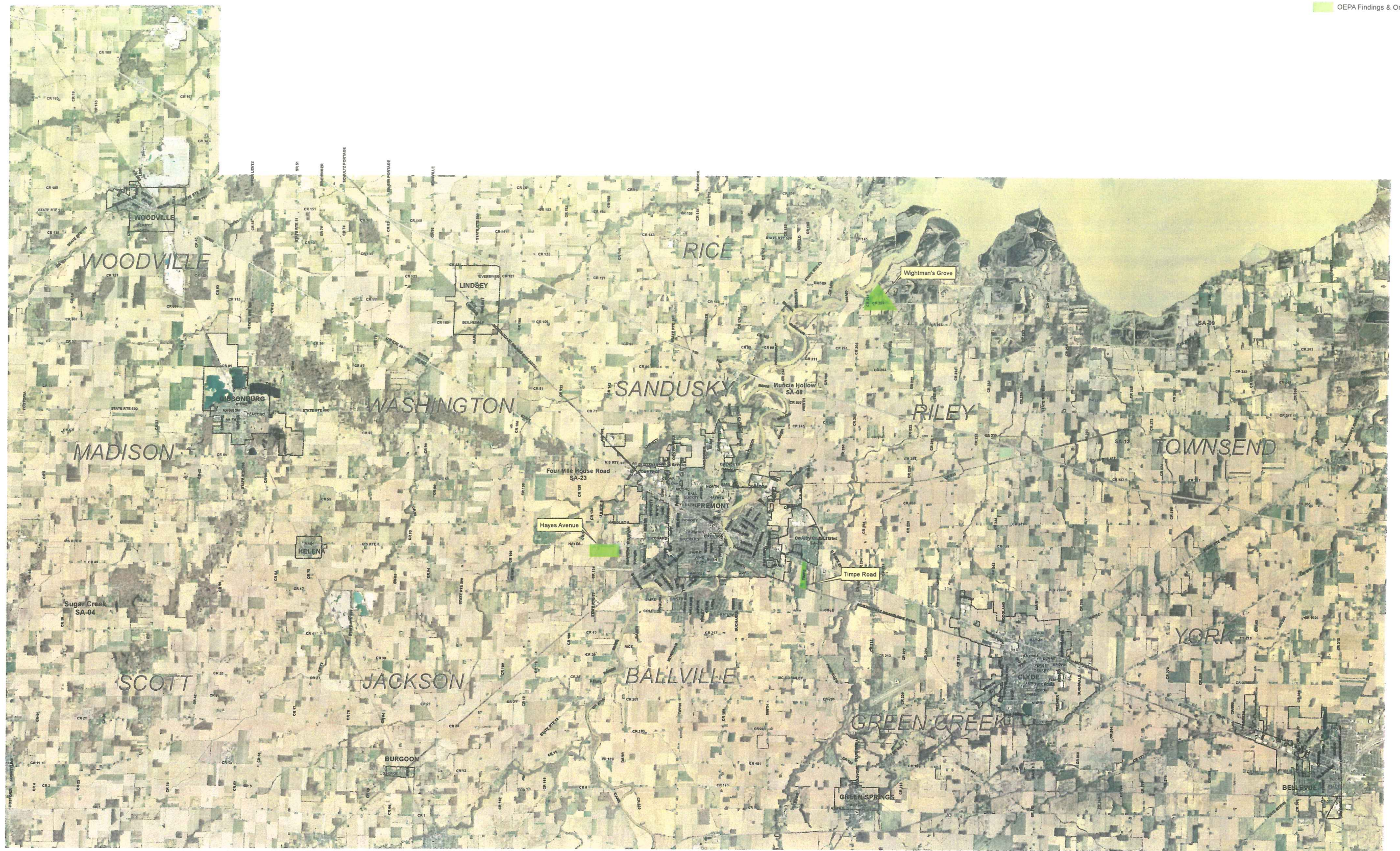
- ▶ Bacterial tests conducted under the supervision of Ohio EPA or a Registered Sanitarian should include at least two (2) sample runs. The samples must be collected at least two (2) hours apart but within 30 days of each other. The samples are to be collected when stream flow is in a steady state dry weather condition. Bacterial standards defining a violation of water quality standards are:
 - more than 5,000 fecal coliform/100 ml in two or more samples when more than five or fewer samples are collected; or in more than 20% of samples when more than five are collected
 - More than 576 E. coli/100 ml in two or more samples when five or fewer samples are collected; or in more than 20% of samples when more than five are collected.

A complaint filed under ORC §6117.34 must include a resolution adopted by the Township Trustees or Board of Health.

When it has been determined that the area in question has inadequate or failing on-site sewage disposal systems which discharge raw or partially treated sewage indirectly through storm sewers or field tiles into waters of the State, Ohio EPA's Director will issue Findings and Orders to abate the water pollution and correct the unsanitary condition.

There are three (3) Critical Sewer Areas in Sandusky County that are under Findings and Orders. These areas are prioritized based on the number of failed on-site systems.

	<u>Name</u>	<u>Failed On-Site Systems</u>
1.	Wightman's Grove	93
2.	Timpe Road	105
3.	Hayes Avenue	20



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OHIO EPA FINDINGS & ORDERS
FOR SANDUSKY COUNTY
PLATE 12

SANDUSKY COUNTY
COMPREHENSIVE WATER & SEWER
GENERAL PLAN

