Arizona Department of Transportation

Environmental Planning

FINAL

Air Quality Analysis Technical Report

US 95, Rifle Range Road to Wellton Mohawk Canal

Federal Project No. 095-B(214)T
ADOT Project No. 095 YU 035 F0359 01C

ADOT Revised Date
October 14, 2021

FHWA Conformity Determination Date
October 19, 2021

AIR QUALITY ANALYSIS TECHNICAL REPORT
FOR

US 95, Rifle Range Road to Wellton Mohawk Canal

Federal Project No. 095-B(214)T
ADOT Project No. 095 YU 035 F0359 01C

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October 14, 2021

APPROVED
By Beverly Chenausky at 4:28 pm, Oct 19, 2021

EXECUTIVE SUMMARY

Yuma County, in coordination with the Arizona Department of Transportation (ADOT), is planning a roadway construction project that would widen US 95 from 2 lanes to a 5-lane section with 2 lanes in each direction and a continuous center turn-lane. The project will extend from Rifle Range Road north to the Wellton Mohawk Canal (about 3 miles).

The National Environmental Policy Act (NEPA) of 1969 and the Clean Air Act (CAA) Amendments of 1990 require that air quality impacts be addressed in the preparation of environmental documents for federal projects. The level of effort used to evaluate these impacts may vary from a qualitative description of potential impacts to a detailed, quantitative modeling analysis. The proposed project is located in the Yuma County nonattainment area for PM_{10} (particulate matter less than 10 microns in diameter). PM_{10} is one of the six criteria pollutants that were established as National Ambient Air Quality Standards (NAAQS) in 1970 under the CAA. ADOT is presenting this project as a Project that is NOT of Air Quality Concern and therefore will not require a PM hot-spot analysis (a "Project-Level PM Quantitative Hot-Spot Analysis – Project of Air Quality Concern Questionnaire" is attached to this report, as is a summary of the interagency consultation process conducted by ADOT). The project is not likely to cause or contribute to the severity or number of violations of the NAAQS.

Mobile Source Air Toxics (MSATs) are a subset of the 188 air toxics defined by the CAA, and nine of these 21 MSATs are defined by the FHWA as priority MSATs. There is no EPA approved methodology currently available for quantifying future potential impacts to ambient levels of MSATs from vehicle emissions. A qualitative MSAT evaluation was conducted for the proposed project becauseof low potential MSAT effects.

Section 176c of the CAA requires that transportation projects conform to the approved air quality State Implementation Plan (SIP) for meeting the federal air quality standards. The conformity determinations for federal actions related to transportation projects must meet the requirements of 40 CFR (Code of Federal Regulations) Parts 51 and 93. The project is listed in the *Yuma Metropolitan Planning Organization (YMPO) 2022-2026 Transportation Improvement Program (TIP No. 102079, approved by the YMPO Executive Board, July 29, 2021)*. The project is also included in the YMPO 2018-2041 Regional Transportation Plan (RTP). On August 30, 2021, FHWA issued a Finding of Conformity on the FY 2022-2045 YMPO Regional Transportation Plan (RTP) and FY 2022-2026 Transportation Improvement Program (TIP). On October 19, 2021 FHWA issued a Project-level Conformity Determination.

Based on the evaluations discussed in this report and discussed below, the proposed project meets the transportation conformity requirements established by the CAA and will have a low potential for MSAT effects.

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1. INTRODUCTION

Yuma County, in coordination with the Arizona Department of Transportation (ADOT) is planning a roadway construction project that would widen US 95 from 2 lanes to a 5-lane section with 2 lanes in each direction and a continuous center turn-lane. The project will extend from Rifle Range Road north to the Wellton Mohawk Canal (about 3 miles). The project limits extend from milepost (MP) 34.9 to MP 38.7 and will take place on land currently owned by ADOT, the Wellton-Mohawk Irrigation & Drainage District, Bureau of Reclamation, as well as some private land. The project location map is shown in Figure 1 and the project area map is shown in Figure 2, respectively.

The purpose of the project is to accommodate future traffic volumes by increasing capacity on US 95.

The scope of work for the project includes:

- Removal of existing pavement and reconstruction of the asphaltic concrete roadway to provide two lanes in both the northbound (NB) and southbound (SB) directions, a two-way left turn lane, and shoulders from Rifle Range Road to 0.6 miles north of the Wellton-Mohawk Canal,
- Install asphaltic concrete friction course on US 95,
- Remove and reconstruct the existing bridge over the Wellton-Mohawk Canal,
- Extend and/or realign the existing siphon at the Wellton-Mohawk return drainage channel,
- Reconstruct the maintenance access roads at the Wellton-Mohawk Canal to tie into the reconstructed US 95,
- Realign the Avenue 12E turnout to create perpendicular intersection and combined access, and
- Remove existing striping and restripe the US 95 and turnouts.

Other minor work as needed includes:

- Remove and reconstruct existing turnouts along US 95,
- Extend and/or remove and reconstruct existing pipe culverts along US 95,
- Extend existing concrete box culverts along US 95,
- Install roadside barriers,
- Construct noise barriers along US 95,
- Remove existing signage and provide new signage, including embedded advance warning signs,
- Remove and reconstruct fencing,
- Construct new utilities and relocate utilities,
- Conduct utility potholing and geotechnical investigations, and
- Install erosion control.

Figure 1. Project Location Map

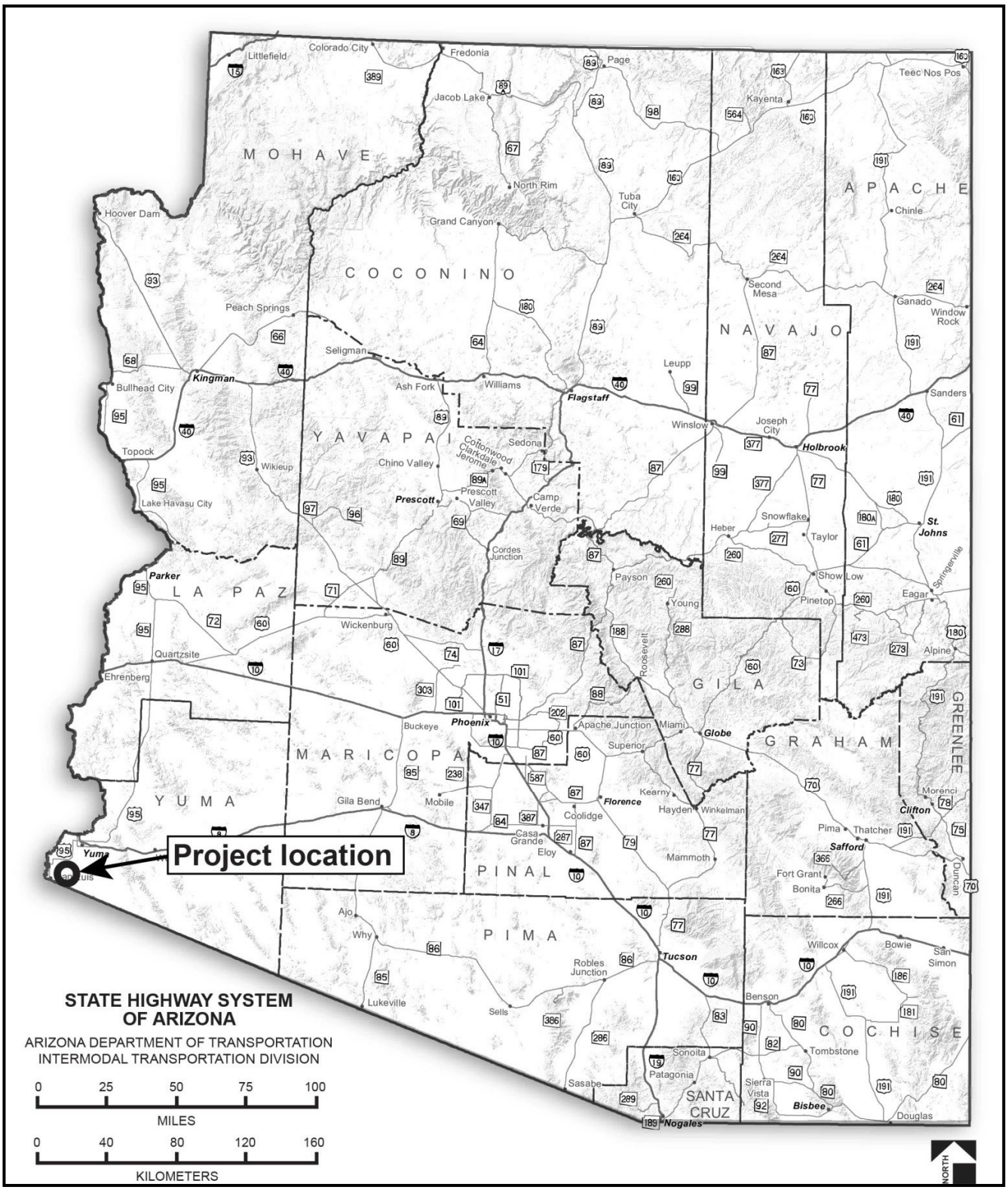

Figure 2. Project Area

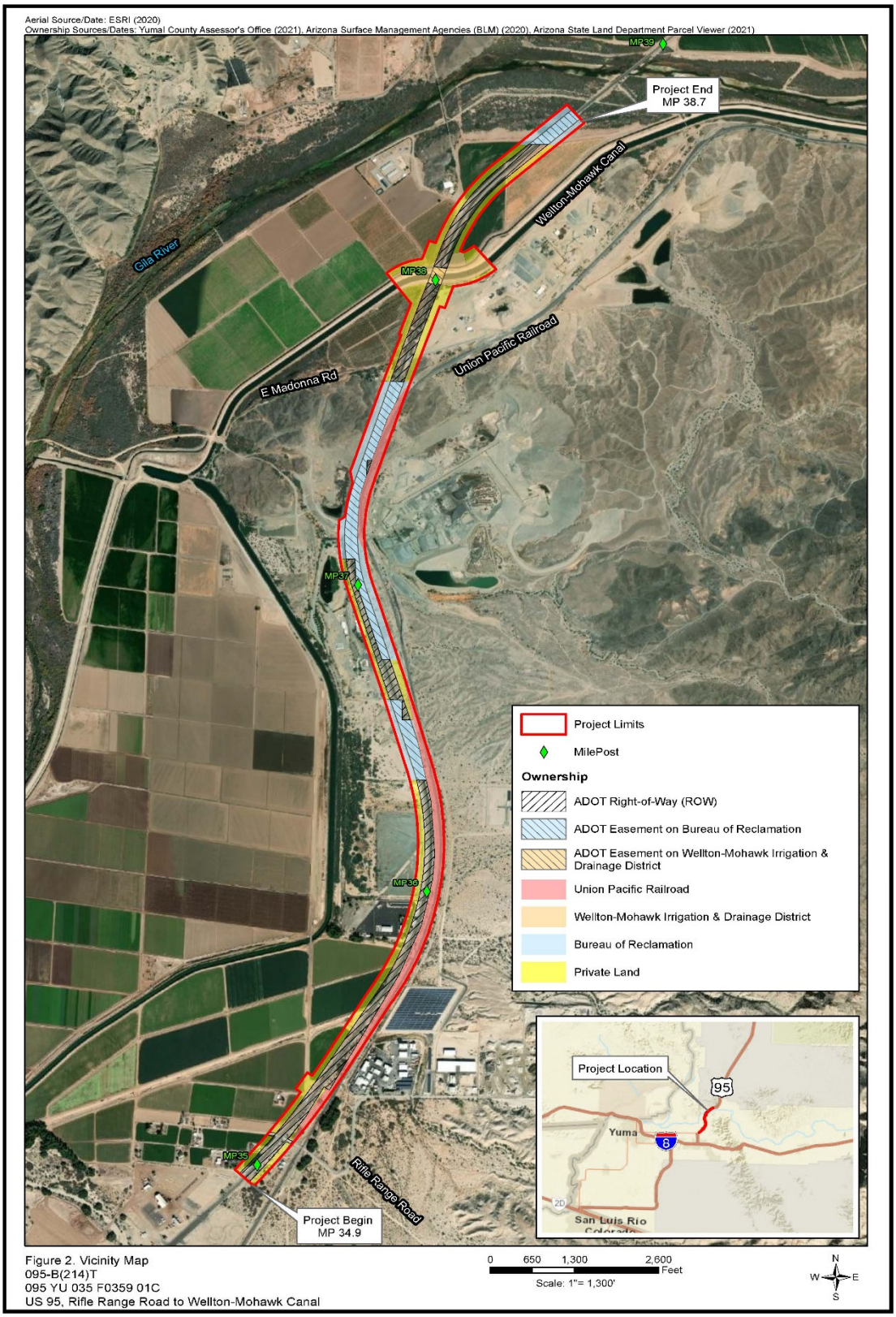

Figure 2. Vicinity Map
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US 95, Rifle Range Road to Wellton-Mohawk Canal

2. AFFECTED ENVIRONMENT

2.1 Regional Climatology

The project is located approximately 10 miles east of Yuma, Arizona on US 95. The project area is situated at an average elevation of about 140 feet above sea level and lies within a portion of the Sonoran Desert, with a climate characterized by hot summers, mild winters, and low precipitation. Average maximum temperatures during summer months range between 100- and 107-degrees Fahrenheit (^{o} f). Average minimum temperatures in the winter months range between 46^{o} f and 56^{o} f. Annual precipitation averages approximately two inches as rain during the summer and winter months. A summary of average temperature and precipitation recorded in Yuma between 1996 and 2008 is presented in Table 1. The relative humidity in Yuma is shown in Table 2.

Table 1
Summary of Climatology Data, Yuma AZ (1996 - 2008)

	Temperature (F)			Precipitation (inches)	
Month	Average	Avg. Maximum	Avg. Minimum	Average	Daily Max
January	57.4	68.3	46.4	0.16	0.30
February	62.1	74.8	49.4	0.04	0.13
March	70.2	84.9	55.6	0.01	0.04
April	74.0	88.1	59.8	0.04	0.10
May	82.9	97.0	68.9	0.02	0.03
June	89.5	104.2	74.8	0.03	0.06
July	94.5	106.8	82.3	0.23	0.74
August	94.8	106.2	83.3	0.23	0.25
September	88.3	100.0	76.6	0.06	0.16
October	77.8	91.6	64.0	0.03	0.05
November	68.3	80.5	56.2	0.74	2.22
December	57.9	68.7	47.0	0.16	0.44
Annual	76.5	89.3	63.7	1.75	2.22

Source: Western Regional Climate Center, 2020
Station: YUMA MCAS (KNYL), AZ

Table 2
Relative Humidity (%), Yuma AZ (1996 - 2010)

Month	Jan.	Feb.	Mar.	Apr.	May	Jun.	Jul.	Aug.	Sep.	Oct.	Nov.	Dec.	Ann.
Relative Humidity	56 [1]	55	54	46	44	45	50	58	57	54	58	60	53
	28 [2]	24	21	17	15	13	22	24	24	23	27	32	23

Notes:
[1]. relative humidity in the morning
[2]. relative humidity in the afternoon
Source: Western Regional Climate Center, 2020
Station: YUMA MCAS (KNYL), AZ

2.2 Clean Air Act Amendments of 1990

The Clean Air Act (CAA) Amendments of 1990 directed the Environmental Protection Agency (EPA) to develop and implement environmental policies and regulations that will ensure cleaner air quality. According to Title I, Section 101, Paragraph F of the Amendments, "No federal agency may approve, accept or fund any transportation plan, program or project unless such plan, program, or project has been found to conform to any applicable (State) implementation plans (SIP) in effect under this act." Title I of the Amendments defines conformity as follows:

- Conformity to an implementation plan's purpose of eliminating or reducing the severity and number of violations of the National Ambient Air Quality Standards (NAAQS) and achieving expeditious attainment of such standards.
- Such activities will not:
    a. Cause or contribute to any new violation of any NAAQS in any area.
    b. Increase the frequency or severity of any existing violation of any NAAQS in any area.
    c. Delay timely attainment of any NAAQS or any required interim emission reductions or other milestones in any area.

2.3 National and State Ambient Air Quality Standards

EPA has established NAAQS (40 [Code of Federal Regulations] CFR Part 50) for pollutants considered harmful to public health and the environment. Six principal pollutants (carbon monoxide, nitrogen dioxide, ozone, particulate matter, sulfur dioxide, and lead), referred to as the criteria pollutants, were established as NAAQS and limits placed on acceptable ambient concentrations. The six pollutants were chosen based on two criteria:

- Emissions that cause or contribute to air pollution that may reasonably be anticipated to endanger public health or welfare.
- Their presence in the ambient air results from numerous or diverse mobile or stationary sources.

The CAA of 1970 established two types of air quality standards for most of the criteria pollutants. Primary standards set limits to protect public health, including the health of "sensitive" populations such as asthmatics, children, and the elderly. Secondary standards set limits to protect public welfare, including protection against decreased visibility, damage to animals, crops, vegetation, and buildings. The promulgation of these standards, however, does not prohibit any state from establishing air quality standards that are more stringent than the federal standards. Arizona has adopted the federal NAAQS and the standards for the six criteria pollutants are shown in Table 3.

Table 3
National Ambient Air Quality Standards

Pollutant	Average Time	Primary Standard	Secondary Standard
Carbon monoxide (CO)	1-hour	35 ppm	No standard
	8-hour	9 ppm	No standard
Nitrogen dioxide (NO_2)	1-hour	0.100 ppm	No standard
	Annual	0.053 ppm	0.053 ppm
Ozone (O_3)	1-hour[a]	0.12 ppm	0.12 ppm
	8-hour	0.070 ppm[b]	0.070 ppm
Particulate matter (PM_{10})	24-hour	150 g/m^3	150 g/m^3
Fine particulate matter ($PM_{2.5}$)	24-hour	35 g/m^3	35 g/m^3
	Annual	12 g/m^3	15 g/m^3
Sulfur dioxide (SO_2)	1-hour	0.075 ppm	None
	3-hour	No standard	0.5 ppm
Lead	Rolling 3-month average	0.15 g/m^3	0.15 g/m^3

mg/m^3 – milligrams per cubic meter
g/m^3 – micrograms per cubic meter
ppm – parts per million
Notes:
[a] 1-hour standard revoked June 15, 2005 in Arizona
[b] based on a 3-year average of the 4th highest concentration
Source: EPA, 2020

Carbon monoxide (CO) is a colorless, odorless gas that interferes with the transfer of oxygen to the brain. CO is emitted from the incomplete combustion of carbon-based fuels, including petroleum products. In most areas, vehicle emissions are the primary source of carbon monoxide. CO levels are generally highest in the colder months of the year when inversion condition (when warmer air traps colder air near the ground) are more frequent. CO concentrations can vary greatly over relatively short distances. Relatively high concentrations of CO are typically found near congested intersections, along heavily used roadways carrying slow-moving traffic.

Nitrogen dioxide (NO_2) is a brownish gas that irritates the lungs. It can cause breathing difficulties at high concentrations. Diesel vehicles and power plants are major sources of nitrogen dioxide.

Ozone (O_3) is a colorless toxic gas. It is produced through a complex chemical reaction in which precursor compounds, such as hydrocarbons and nitrogen oxides, are transformed by sunlight into ozone molecules, which consist of three oxygen atoms. The primary sources for ozone precursors are vehicle and industrial emissions.

Particulate matter (PM_{10} and $PM_{2.5}$) consists of suspended dust, fibers, combustion ash, and other fine particles. The major source is industrial emissions, but it also results from diesel vehicle emissions, vehicle travel on unpaved roadways, agricultural activity, and mechanical resuspension on paved roads from vehicle activity. PM_{10} refers to particulate matter less than 10 microns in diameter,

about one-seventh the thickness of a human hair. $PM_{2.5}$ refers to particulate matter less than 2.5 microns in diameter.

Sulfur dioxide (SO_2) is a colorless gas with a rotten egg odor that results from the combustion of fuels containing sulfur. Primary sources are coal-fired power plants, industrial plants, and metals smelters, with some emissions from diesel vehicles burning low-grade fuels. SO_2 is an irritant gas that attacks the throat and lungs.

Lead in the atmosphere results primarily from the burning of leaded fuels. Its principal effects in humans are on the blood-forming, nervous, and renal systems. Lead pollution has been drastically reduced in the United States since the banning of leaded automobile fuels.

2.4 Federal Attainment Status

The CAA Amendments require that the EPA publish a list of all geographic areas in compliance with the NAAQS, as well as those areas not in attainment of the NAAQS. Areas in compliance with the NAAQS are termed attainment areas and areas not in compliance with the NAAQS are termed nonattainment areas. Areas once classified as nonattainment but have since demonstrated attainment of the NAAQS are designated as maintenance areas. The designation of an area is made on a pollutant-by-pollutant basis. The project area lies within the Yuma nonattainment area for PM_{10}. A map of the approximate Yuma nonattainment area for PM_{10} is provided in Figure 3.

2.5 Ambient Pollutant Levels

The Arizona Department of Environmental Quality (ADEQ) is the agency responsible for air quality monitoring in the state. ADEQ's primary monitoring objective is to measure criteria pollutants regulated under the CAA for compliance with the NAAQS. The monitoring site nearest the project area is the Yuma Supersite, which is on the southeast corner of the Rural Metro Administration Facility property in Yuma. This site monitors for ozone, $PM_{2.5}$, and PM_{10}. This monitoring site was selected for presentation due to pollutants monitored and/or their relative proximity to the project area. As shown in Figure 3, the proposed project is approximately 12 miles south of the Yuma Supersite monitor. Concentrations obtained at this locationin 2019 are summarized in Table 4.

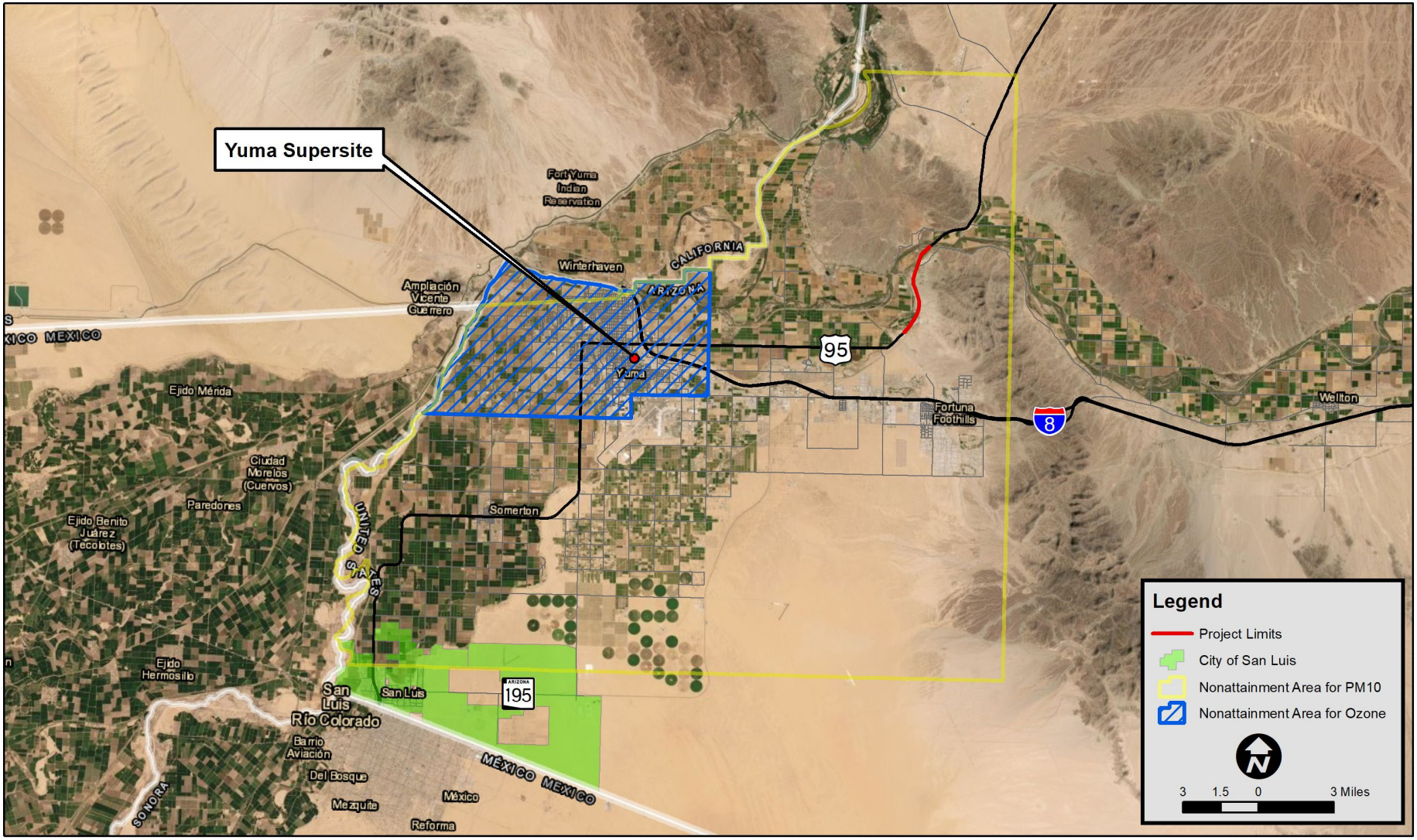
In 2019, the maximum 1-hour and 8-hour ozone concentrations were below the NAAQS. The 24-hour and annual average $PM_{2.5}$ concentration were also below the NAAQS. The maximum 24-hour PM_{10} concentration was above the NAAQS and there were four exceedances in 2019.

Table 4
Air Quality Monitoring Data (2019) Maximum Ambient Concentration of NAAQS Criteria Pollutants

Site Name	Pollutant	Average Time	Concentration	No. of Exceedance
1. Yuma Supersite (approx. 12 miles to project area)	Ozone	1-hour	0.075 ppm	0
		8-hour	0.069 ppm	0
	PM_{10}	24-hour	211 [3]	4
	$PM_{2.5}$	24-hour	25.7 [3]	0
		Annual average	7.9 [3]	0

[3] – micrograms per cubic meter
ppm – parts per million
Source: EPA, accessed in 2020, https://www.epa.gov/outdoor-air-quality-data/monitor-values-report

Figure 3. Yuma PM_{10} and Ozone Nonattainment Areas



2.6 Mobile Source Air Toxics

In addition to the criteria air pollutants for which there are National Ambient Air Quality Standards (NAAQS), the Environmental Protection Agency (EPA) also regulates air toxics. Most air toxics originate from human-made sources, including on-road mobile sources, non-road mobile sources (e.g., airplanes), and stationary sources (e.g., factories or refineries).

MSATs are a subset of 21 of the 188 air toxics defined by the Clean Air Act (CAA). The MSATs are compounds that are emitted not only from stationary sources such as power plants, factories, oil refineries, dry cleaners and gas stations, but also from highway vehicles and nonroad equipment. EPA identified nine compounds with significant contributions from mobile sources that are among the national and regional-scale cancer risk drivers or contributors and non-cancer hazard contributors from the 2011 National Air Toxics Assessment (NATA). These are 1,3-butadiene, acetaldehyde, acrolein, benzene, diesel particulate matter (diesel PM), ethylbenzene, formaldehyde, naphthalene, and polycyclic organic matter. While FHWA considers these the priority mobile source air toxics, the list is subject to change and may be adjusted in consideration of future EPA Rules (FHWA, 2016)

Acrolein is primarily used as an intermediate in the synthesis of acrylic acid and as a biocide. It may be formed from the breakdown of certain pollutants in outdoor air or from the burning of organic matter including tobacco, or fuels such as gasoline or oil. It is toxic to humans following inhalation, oral or dermal exposures. Acute (short-term) inhalation exposure may result in upper respiratory tract irritation and congestion. No information is available on its reproductive, developmental, or carcinogenic effects in humans, and the existing animal cancer data are considered inadequate to make a determination that acrolein is carcinogenic to humans (https://www.epa.gov/sites/default/files/2016-08/documents/acrolein.pdf).

Benzene is found in the air from emissions from burning coal and oil, gasoline service stations, and motor vehicle exhaust. Acute (short-term) inhalation exposure of humans to benzene may cause drowsiness, dizziness, headaches, as well as eye, skin, and respiratory tract irritation, and, at high levels, unconsciousness. Chronic (long-term) inhalation exposure has caused various disorders in the blood, including reduced numbers of red blood cells and aplastic anemia, in occupational settings. Reproductive effects have been reported for women exposed by inhalation to high levels, and adverse effects on the developing fetus have been observed in animal tests. Increased incidence of leukemia (cancer of the tissues that form white blood cells) has been observed in humans occupationally exposed to benzene. EPA has classified benzene as known human carcinogen for all routes of exposure (https://www.epa.gov/sites/default/files/2016-09/documents/benzene).

Motor vehicle exhaust is a constant source of 1,3-butadiene. Although 1,3-butadiene breaks down quickly in the atmosphere, it is usually found in ambient air at low levels in urban and suburban areas. Acute (short-term) exposure to 1,3-butadiene by inhalation in humans results in irritation of the eyes, nasal passages, throat, and lungs. Epidemiological studies have reported a possible association between 1,3- butadiene exposure and cardiovascular diseases. Epidemiological studies of workers in rubber plants have shown an association between 1,3-butadiene exposure and increased incidence of leukemia. Animal studies have reported tumors at various sites from 1,3-butadiene exposure. EPA has classified 1,3- butadiene as carcinogenic to humans by inhalation (https://www.epa.gov/sites/default/files/2016-08/documents/1,3-butadiene).

Diesel particulate matter is a collection of various-sized particles emitted from diesel-fueled vehicles, including primarily elemental carbon, organic carbon, and sulfate particles, with trace amounts of nitrate, metals, and other particles. Diesel particulate matter of concern for MSAT analyses are those particles sized 10 microns or smaller. Although particulate matter may be derived from a number of sources, diesel particulate matter by definition is derived exclusively from diesel vehicle exhaust. Exposure to diesel particulate matter results in irritation to theeyes, nose, throat, and lungs, and may exacerbate asthma. Diesel particulate matter is considered a probable human carcinogen. (https://www.epa.gov/sites/default/files/2015-04/documents/dieselexhaustus.pdf).

Formaldehyde is used mainly to produce resins used in particleboard products and as an intermediate in the synthesis of other chemicals. Exposure to formaldehyde may occur by breathing contaminated indoor air, tobacco smoke, or ambient urban air. Acute (short-term) and chronic (long-term) inhalation exposure to formaldehyde in humans can result in respiratory symptoms, and eye, nose, and throat irritation. Limited human studies have reported an association between formaldehyde exposure and lung and nasopharyngeal cancer. Animal inhalation studies have reported an increased incidence of nasal squamous cell cancer. EPA considers formaldehyde a probable human carcinogen (Group B1) (https://www.epa.gov/sites/default/files/2016-09/documents/formaldehyde).

The term polycyclic organic matter (POM) defines a broad class of compounds that includes the polycyclic aromatic hydrocarbon compounds (PAHs), of which benzo[a]pyrene is a member. POM compounds are formed primarily from combustion and are present in the atmosphere in particulate form. Sources of air emissions are diverse and include cigarette smoke, vehicle exhaust, home heating, laying tar, and grilling meat. Cancer is the major concern from exposure to POM. Epidemiologic studies have reported an increase in lung cancer in humans exposed to coke oven emissions, roofing tar emissions, and cigarette smoke; all of these mixtures contain POM compounds. Animal studies have reported respiratory tract tumors from inhalation exposure to benzo[a]pyrene and forestomach tumors, leukemia, and lung tumors from oral exposure to benzo[a]pyrene. EPA has classified seven PAHs (benzo[a]pyrene, benz[a]anthracene,

chrysene, benzo[b]fluoranthene, benzo[k]fluoranthene, dibenz[a,h]anthracene, and indeno[1,2,3- cd]pyrene) as Group B2, probable human carcinogens (https://www.epa.gov/sites/default/files/2016-09/documents/polycyclic-organic-matter.pdf).

Naphthalene is used in the production of phthalic anhydride; it is also used in mothballs. Acute (short-term) exposure of humans to naphthalene by inhalation, ingestion, and dermal contact is associated with hemolytic anemia, damage to the liver, and neurological damage. Cataracts have also been reported in workers acutely exposed to naphthalene by inhalation and ingestion. Chronic (long-term) exposure of workers and rodents to naphthalene has been reported to cause cataracts and damage to the retina. Hemolytic anemia has been reported in infants born to mothers who "sniffed" and ingested naphthalene (as mothballs) during pregnancy. Available data are inadequate to establish a causal relationship between exposure to naphthalene and cancer in humans. EPA has classified naphthalene as a Group C, possible human carcinogen (https://www.epa.gov/sites/default/files/2016-09/documents/naphthalene.pdf).

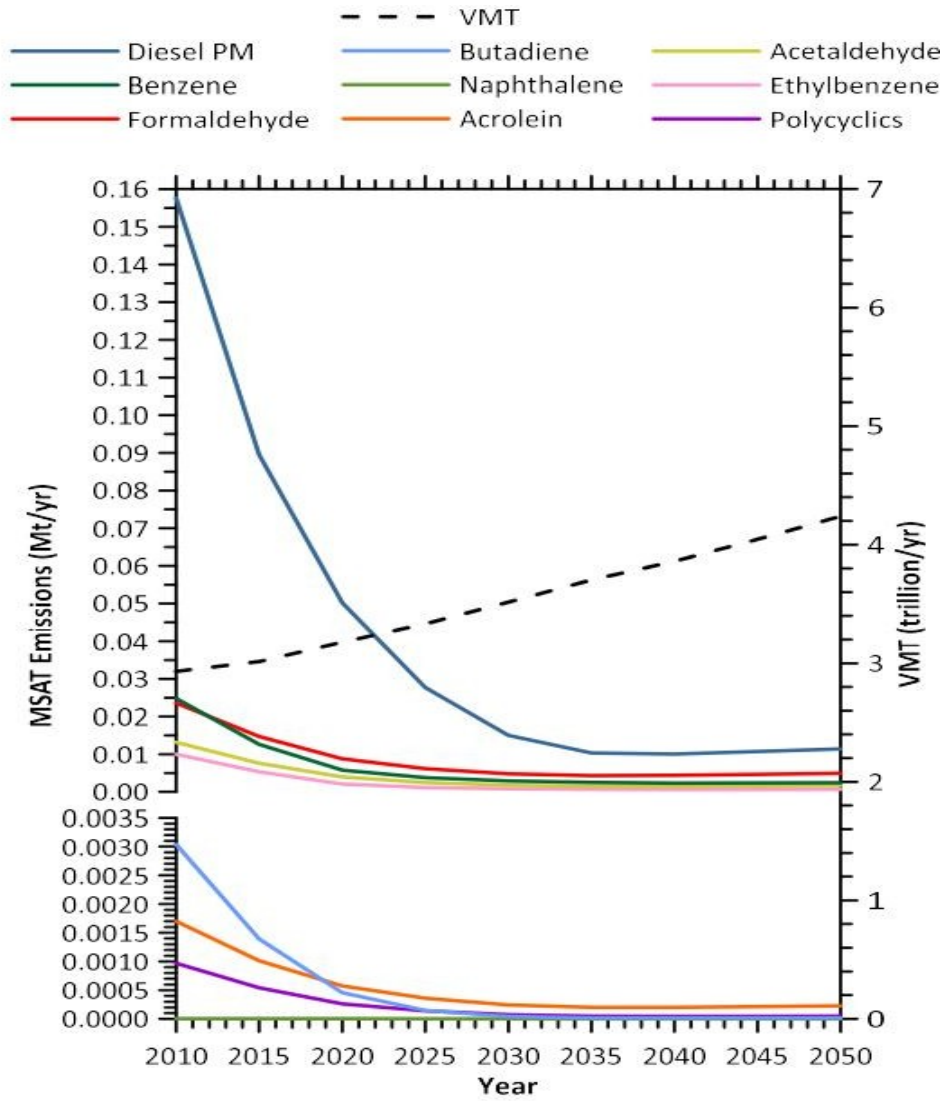
Acetaldehyde is mainly used as an intermediate in the synthesis of other chemicals. It is ubiquitous in the environment and may be formed in the body from the breakdown of ethanol. Acute (short-term) exposure to acetaldehyde results in effects including irritation of the eyes, skin, and respiratory tract. Symptoms of chronic (long-term) intoxication of acetaldehyde resemble those of alcoholism. Acetaldehyde is considered a probable human carcinogen (Group B2) based on inadequate human cancer studies and animal studies that have shown nasal tumors in rats and laryngeal tumors in hamsters (https://www.epa.gov/sites/default/files/2016-09/documents/acetaldehyde.pdf).

Ethylbenzene is mainly used in the manufacture of styrene. Acute (short-term) exposure to ethylbenzene in humans results in respiratory effects, such as throat irritation and chest constriction, irritation of the eyes, and neurological effects such as dizziness. Chronic (long-term) exposure to ethylbenzene by inhalation in humans has shown conflicting results regarding its effects on the blood. Animal studies have reported effects on the blood, liver, and kidneys from chronic inhalation exposure to ethylbenzene. Limited information is available on the carcinogenic effects of ethylbenzene in humans. In a study by the National Toxicology Program (NTP), exposure to ethylbenzene by inhalation resulted in an increased incidence of kidney and testicular tumors in rats, and lung and liver tumors in mice. EPA has classified ethylbenzene as a Group D, not classifiable as to human carcinogenicity (https://www.epa.gov/sites/default/files/2016-09/documents/ethylbenzene.pdf).

MSAT Emission Trends

The most recent FHWA MSAT guidance (October 18, 2016) incorporates emission estimates that take into account recent EPA rules that will further control motor vehicle emissions. These regulations for vehicle engines and fuels will result in a significant decline in MSAT emissions over the next several decades. Based on an FHWA analysis using EPA's MOVES2014a model, FHWA estimates that even if vehicle miles traveled (VMT) increases 45 percent from 2010 to 2050 as forecast, a combined reduction of 91 percent in the total annual emissions forthe priority MSATs is projected for the same time period (see Figure 3).

Figure 4. FHWA Projected National MSAT Emission Trends (2010 to 2050) for Vehicles Operating on Roadways Using EPA's MOVES2014a Model



Source: Federal Highway Administration, Updated Interim Guidance on Mobile SourceAir Toxic Analysis in NEPA Documents (October 18, 2016, page 3).

3. ENVIRONMENTAL CONSEQUENCES

3.1 PM_{10} Impacts

The proposed project lies within the Yuma PM_{10} Non-attainment Area. The primary sources of PM10 in the non-attainment area include dust from unpaved roads, construction dust, windblown dust, dust from unpaved roads, and cross border particulate emissions from Mexico (https://azdeq.gov/yuma-pm-10-nonattainment-area (accessed October 13, 2021).

Based on the Project Level PM Quantitative Hot-Spot Analysis – Project of Air Quality Concern Questionnaire (see Appendix A), traffic volumes on US 95 under the Build Alternative in 2045 are anticipated to be relatively low (about 9,450 AADT in 2045). In addition, the project is not anticipated to have a significant number of diesel vehicles (about 1,300 diesel vehicles, accounting for 14% of the total traffic volume in 2045). The project does not impact LOS D or worse intersections that have a significant number of operating diesel vehicles and there are no intersection improvements associated with the project.

ADOT presented the project for inter-agency consultation between September 16 and October 1, 2021. On October 1, 2021, ADOT concluded inter-agency consultation and that in accordance with 40 CFR 93.105 the Project is NOT of Air Quality Concern and does not require a PM hot-spot analysis.

3.2 Mobile Source Air Toxics

Existing (2019) average annual daily traffic (AADT) volumes on this segment of US 95 are about 7,700 vehicles per day (VPD). In the design year (2045) following completion of the proposed project, the AADT volumes are expected to be about 9,450 VPD (email from Vamshi Yellisety, Kittelson & Associates to Angie Newton, Newton Environmental Consultants, et. al. August 16, 2021, and August 26, 2021).

FHWA's Updated Guidance on Mobile Source Air Toxic Analysis in NEPA Documents (October18, 2016), anticipates that most highway projects will have a low potential for MSAT effects. Projects expected to have a low potential for MSAT effects include those that do not add substantial new capacity or create a facility that will meaningfully increase MSAT emissions, and projects where design year traffic is projected to be less than 140,000 to 150,000 AADT.

As noted above, the proposed project will not add substantial new capacity to US 95 and the AADTs associated with the project are well below the 140,000 to 150,000 AADT threshold where appreciable MSAT effects could be warranted.

The VMT along US 95 between Rifle Range Road and the Wellton Mohawk Canal would increase slightly under the proposed project due to slightly higher traffic volumes on the alignment in the 2045 design year. However, MSAT emissions would be reduced somewh**at** due to increased speeds; according to EPA's MOVES2014a model, emissions of all of the priority MSATs will decrease as speeds increase.

Regardless of the traffic volumes and VMT in the 2045 design year, MSAT emissions will be significantly lower in the future as a result of EPA's national control programs that are projected to reduce annual MSAT emissions by 91 percent between 2010 and 2050.

The proposed project would have little effect on MSAT emissions, as the project would cause minimal changes in regional VMT. However, EPA's projected reductions are so great (even after accounting for VMT growth over time) that MSAT emissions on US 95 from Rifle Range Road to the Wellton Mohawk Canal are likely to be lower in the future.

Incomplete or Unavailable Information for Project MSAT Health Impacts Analysis

In FHWA's view, information is incomplete or unavailable to credibly predict the project- specific health impacts due to changes in MSAT emissions associated with a proposed set of highway alternatives. The outcome of such an assessment, adverse or not, would be influenced more by the uncertainty introduced into the process through assumption and speculation rather than any genuine insight into the actual health impacts directly attributableto MSAT exposure associated with a proposed action.

The EPA is responsible for protecting the public health and welfare from any known or anticipated effect of an air pollutant. They are the lead authority for administering the CAA and its amendments and have specific statutory obligations with respect to hazardous air pollutants and MSAT. The EPA is in the continual process of assessing human health effects, exposures, and risks posed by air pollutants. They maintain the Integrated Risk Information System (IRIS), which is "a compilation of electronic reports on specific substances found in theenvironment and their potential to cause human health effect" (EPA, http://www.epa.gov/iris/). Each report contains assessments of non-cancerous and cancerouseffects for individual compounds and quantitative estimates of risk levels from lifetime oral and inhalation exposures with uncertainty spanning perhaps an order of magnitude.

Other organizations are also active in the research and analyses of the human health effects of MSAT, including the Health Effects Institute (HEI). Two HEI studies are summarized in Appendix D of *FHWA's Interim Guidance Update on Mobile Source Air Toxic Analysis in NEPA Documents*. Among the adverse health effects linked to MSAT compounds at high exposures are: cancer in humans in occupational settings; cancer in animals; and irritation to the respiratory tract, including the exacerbation of asthma. Less obvious is the adverse human health effects of MSAT compounds at current environmental concentrations (HEI, http://pubs.healtheffects.org/view.php?id=282) or in the future as vehicle emissions substantially decrease (HEI, http://pubs.healtheffects.org/view.php?id=306).

The methodologies for forecasting health impacts include emissions modeling; dispersion modeling; exposure modeling; and then final determination of health impacts – each step in the process building on the model predictions obtained in the previous step. All are encumbered by technical shortcomings or uncertain science that prevents a more complete differentiation of the MSAT health impacts among a set of project alternatives. These difficulties are magnified for lifetime (i.e., 70-year) assessments, particularly because unsupportable assumptions would have to be made regarding changes in travel patterns andvehicle technology (which affects emissions rates) over that time frame, since such information is unavailable.

It is particularly difficult to reliably forecast 70-year lifetime MSAT concentrations and exposure near roadways; to determine the portion of time that people are actually exposed ata specific location; and to establish the extent attributable to a proposed action, especially given that some of the information needed is unavailable.

There are considerable uncertainties associated with the existing estimates of toxicity of the various MSAT, because of factors such as low-dose extrapolation and translation of occupational exposure data to the general population, a concern expressed by HEI (http://pubs.healtheffects.org/view.php?id=282). As a result, there is no national consensus on air dose-response values assumed to protect the public health and welfare for MSAT compounds, and in particular for diesel PM. The EPA (http://www.epa.gov/risk/basicinformation.htm#g) and the HEI (http://pubs.healtheffects.org/getfile.php?u=395) have not established a basis for quantitative risk assessment of diesel PM in ambient settings.

There is also the lack of a national consensus on an acceptable level of risk. The current context is the process used by the EPA as provided by the CAA to determine whether more stringent controls are required in order to provide an ample margin of safety to protect public health or to prevent an adverse environmental effect for industrial sources subject to the maximum achievable control technology standards, such as benzene emissions from refineries. The decision framework is a two-step process. The first step requires EPA to determine an “acceptable” level of risk due to emissions from a source, which a generally no greater than approximately 100 in a million. Additional factors are considered in the second step, the goal of which is to maximize the number of people with risks less than 1 in a million due to emissions from a source. The results of this statutory two-step process do not guarantee that cancer risks from exposure to air toxics are less than 1 in a million; in some cases, the residual risk determination could result in maximum individual cancer risks that are as high as approximately 100 in a million. In a June 2008 decision, the U.S. Court of Appeals forthe District of Columbia Circuit upheld EPA’s approach to addressing risk in its two-step decision framework. Information is incomplete or unavailable to establish that even the largest of highway projects would result in levels of risk greater than deemed acceptable.

Because of the limitations in the methodologies for forecasting health impacts described, any predicted difference in health impacts between alternatives is likely to be much smaller than the uncertainties associated with predicting the impacts. Consequently, the results of such assessments would not be useful to decision makers, who would need to weight this information against project benefits, such as reducing traffic congestion, accident rates, and fatalities, in addition to improved access for emergency response, that are better suited for aquantitative analysis.

4. CONFORMITY

Section 176c of the CAA requires that transportation projects conform to the approved air quality SIP for meeting the federal air quality standards. The conformity determinations for federal actions related to transportation projects must meet the requirements of 40 CFR Parts 51 and 93.

The project-level PM10 impacts are described in Appendix A, on October 1, 2021, ADOT concluded Interagency Consultation as a project that does not require a quantitative PM10 hot-spot analysis under 40CFR 93.123(b) and thereby demonstrated under 40 CFR 93.116, that the project does not cause or contribute to any new localized PM10, increase the frequency or severity of any existing PM10 violations, or delay timely attainment of any NAAQS or any required interim emission reductions or other milestones in the PM10 nonattainment area.

This project is currently listed in the Y*uma Metropolitan Planning Organization (YMPO) 2022-2026 Transportation Improvement Program (TIP No. 102079, approved by the YMPO Executive Board, July 29, 2021)*. The project is also included in the YMPO 2018-2041 Regional Transportation Plan (RTP). On August 30, 2021 FHWA issued a Finding of Conformity on the FY 2022-2045 YMPO Regional Transportation Plan (RTP) and FY 2022-2026 Transportation Improvement Program (TIP). On October 19, 2021 FHWA issued a Project -Level Conformity Determination as Appendix B – FHWA Conformity Determination Letter as noted in Appendix B.

REFERENCES

1. Arizona Department of Environmental Quality, 2019. *State of Arizona Air Monitoring Network Plan for the Year 2019*.
2. Arizona Department of Transportation, 2000. *Standard Specifications for Road and Bridge Construction*. Phoenix.
3. Federal Highway Administration, Accessed in 2020. *Interim Guidance Update on Mobile Source Air Toxic Analysis in NEPA.* https://www.fhwa.dot.gov/environment/air_quality/air_toxics/policy_and_guidance/aqintguidmem.cfm
4. United States Department of Transportation (Federal Highway Administration [FHWA]), 1993. *Air Quality Analysis for NEPA Documents – A Discussion Paper*. Washington, D.C.
5. United States Environmental Protection Agency, Accessed in 2020. National Ambient Air Quality Standards (NAAQS). https://www.epa.gov/criteria-air-pollutants/naaqs-table
6. Western Regional Climate Center. Accessed in 2017. 1996 – 2008 Monthly Climate Summary for Yuma, Arizona. https://wrcc.dri.edu/Climate/west_lcd_show.php?iyear=2008&sstate=AZ&stag=yuma&sloc=Yuma
7. Western Regional Climate Center. Accessed in 2020. Average Relative Humidity (Morning). https://wrcc.dri.edu/Climate/comp_table_show.php?stype=relhum_am_means
8. Western Regional Climate Center. Accessed in 2020. Average Relative Humidity (Afternoon). https://wrcc.dri.edu/Climate/comp_table_show.php?stype=relhum_pm_means

Appendix A – PM Project of Air Quality Concern Questionnaire

Project Level PM Quantitative Hot-Spot Analysis - Project of Air Quality Concern Questionnaire

Project Setting and Description

The Arizona Department of Transportation (ADOT) is designing a roadway widening project on US 95 from Rifle Range Road to the Wellton-Mohawk Canal approximately 10 miles northeast of the City of Yuma in Yuma County, Arizona (shown below in Figure 1). The proposed project will widen US 95 from 2 lanes to a 5-lane section with 2 lanes in each direction and a continuous center turn-lane. The project limits extend from milepost (MP) 34.9 to MP 38.7. The project will occur on land owned by ADOT, Wellton-Mohawk Irrigation & Drainage District, Bureau of Reclamation, and private land.

The purpose of this project is to accommodate traffic volumes by increasing capacity.
The scope of work for this project includes:

- Remove existing pavement and reconstruct the asphaltic concrete roadway to provide two lanes in both the northbound (NB) and southbound (SB) directions, a two-way left turn lane, and shoulders from Rifle Range Road to 0.6 miles north of the Wellton-Mohawk Canal, Install asphaltic concrete friction course on US 95, Remove and reconstruct the existing bridge over the Wellton-Mohawk Canal, Extend and/or realign/reconstruct the existing siphon at the Wellton-Mohawk return drainage, Channel, Reconstruct the maintenance access roads at the Wellton-Mohawk Canal to tie into the reconstructed US 95, Realign the Avenue 12E turnout to create perpendicular intersection and combined access, Obliterate/remove striping and restripe the US 95 and turnouts.
- Other minor work as needed includes; Remove and reconstruct existing turnouts along US 95, Extend and/or remove and reconstruct existing pipe culverts along US 95, Extend existing concrete box culverts along US 95, Install roadside barriers, Construct noise barriers along US 95, Remove existing signage and provide new signage, including embedded advance warning signs, Remove and reconstruct fence, Construct new utilities and relocate utilities, Conduct utility potholing and geotechnical investigations, Install erosion control.

The proposed project lies within the Yuma PM_{10} Nonattainment Area. The primary sources of PM_{10} in the nonattainment area include dust from unpaved roads, construction dust, windblown dust, dust from unpaved farm roads, and cross border emissions from Mexico (https://azdeq.gov/yuma-pm-10-nonattainment-area, accessed August 24, 2021).

The project is listed in the Yuma Metropolitan Planning Organization (YMPO) FY 2022-2026 Transportation Improvement Program (TIP No. 102079, approved by the YMPO Executive Board, July 29, 2021). The project is also included in the YMPO 2018-2041 Regional Transportation Plan (RTP). On August 30, 2021 FHWA issued a Finding of Conformity on the FY 2022-2045 YMPO Regional Transportation Plan (RTP) and FY 2022-2026 Transportation Improvement Program (TIP).

Figure 1. Project Area

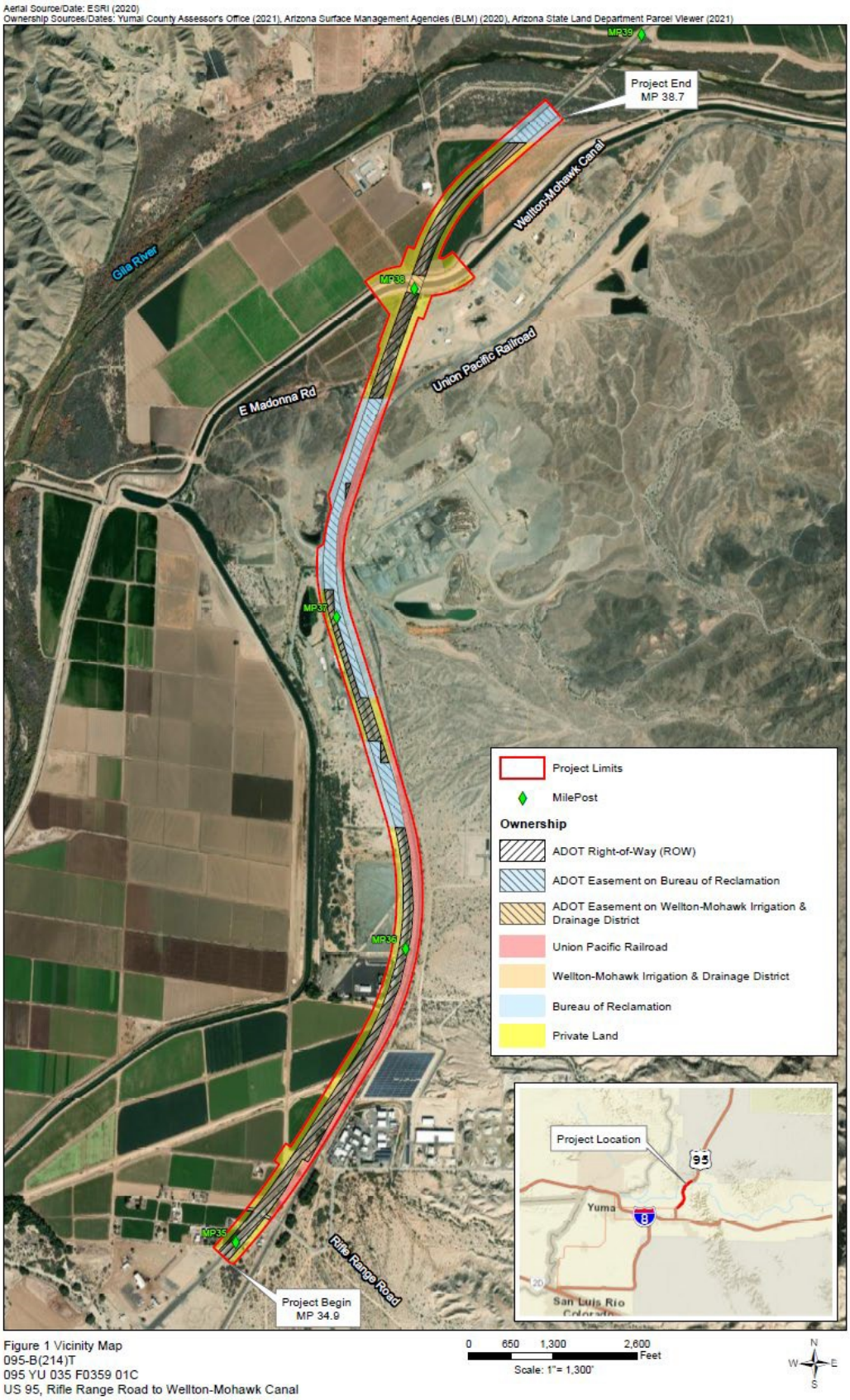


Figure 1 Vicinity Map
095-B(214)T
095 YU 035 F0359 01C
US 95, Rifle Range Road to Wellton-Mohawk Canal

Project Assessment

The following questionnaire is used to compare the proposed project to a list of project types in 40 CFR 93.123(b) requiring a quantitative analysis of local particulate emissions (Hot- spots) in nonattainment or maintenance areas, which include:

i) New highway projects that have a significant number of diesel vehicles, and expanded highway projects that have a significant increase in the number of diesel vehicles;
ii) Projects affecting intersections that are at Level-of-Service D, E, or F with a significant number of diesel vehicles, or those that will change to Level-of-Service D, E, or F because of an increase in traffic volumes from a significant number of diesel vehicles related to the project;
iii) New bus and rail terminals and transfer points that have a significant number of diesel vehicles congregating at a single location;
iv) Expanded bus and rail terminals and transfer points that significantly increase the number of diesel vehicles congregating at a single location; and
v) Projects in or affecting locations, areas, or categories of sites which are identified in the PM_{10} or $PM_{2.5}$ applicable implementation plan or implementation plan submission, as appropriate, as sites of violation or possible violation.

If the project matches one of the listed project types in 40 CFR 123(b)(1) above, it is considered a project of local air quality concern and the hot-spot demonstration must be based on quantitative analysis methods in accordance to 40 CFR 93.116(a) and the consultation requirements of 40 CFR 93.105(c)(1)(i). If the project does not require a PM hot- spot analysis, a qualitative assessment will be developed that demonstrates that the project will not contribute to any new localized violations, increase the frequency of severity of any existing violations, or delay the timely attainment of any NAAQS or any required emission reductions or milestones in any nonattainment or maintenance area.

On March 10, 2006, EPA published *PM2.5 and PM10 Hot-Spot Analyses in Project-Level Transportation Conformity Determinations for the New PM2.5 and Existing PM10 National Ambient Air Quality Standards; Final Rule* describing the types of projects that would be considered a project of air quality concern and that require a hot-spot analysis (71 FR 12468- 12511). Specifically on page 12491, EPA provides the following clarification: "Some examples of *projects of air quality concern* that would be covered by § 93.123(b)(1)(i) and (ii) are: A project on a new highway or expressway that serves a significant volume of diesel truck traffic, such as facilities with greater than 125,000 annual average daily traffic (AADT) and8% or more of such AADT is diesel truck traffic;" .." Expansion of an existing highway or other facility that affects a congested intersection (operated at Level-of-Service D, E, or F)that has a significant increase in the number of diesel trucks;" These examples will be used asthe baseline for determining if the project is a project of air quality concern.

New Highway Capacity

Is this a new highway project that has a significant number of diesel vehicles?
Example: total traffic volumes ≥125,000 annual average daily traffic (AADT) and truck volumes ≥10,000 diesel trucks per day (8% of total traffic).

NO – The proposed project is not a new highway project.

Expanded Highway Capacity

Is this an expanded highway projects that have a significant increase in the number of diesel vehicles?

Example: the build scenario of the expanded highway or expressway causes a significant increase in the number of diesel trucks compared with the no-build scenario, truck volumes > 8% of the total traffic.

NO – Widening US 95 between Rifle Range Road and the Wellton Mohawk Canal would not result in a significant increase in the number of diesel trucks on the alignment between 2020 and 2045.

AADT and Truck Volumes	Existing (2019)		No-Build (2045)		Build (2045)		Difference (Build - No-Build)	
	AADT	Truck (%)	AADT	Truck (%)	AADT	Truck (%)	AADT	Truck (%)
US 95 Between Rifle Range Road and Wellton Mohawk Canal	7,696	1,077 (14%)	9,097	1,274 (14%)	9,453	1,323 (14%)	356	49 (0%)

Source: Email from Vamshi Yellisety, Kittelson & Associates to Angie Newton, Newton Environmental Consultants, et. al. August 16, 2021 and August 26, 2021.

Projects with Congested Intersections

Is this a project that affects a congested intersection (LOS D or greater) that has a significant number of diesel trucks, OR will change LOS to D or greater because of an increase in traffic volumes from a significant number of diesel trucks related to the project?

NO – The proposed project does not affect congested intersections and there are no intersection improvements associated with the project.

New Bus and Rail Terminals

Does the project involve construction of a new bus or intermodal terminal that accommodates a significant number of diesel vehicles?

NO – The proposed project does not involve construction of a new bus or intermodal terminal.

Expanded Bus and Rail Terminals

Does the project involve an existing bus or intermodal terminal that has a large vehicle fleet where the number of diesel buses (or trains) increases by 50% or more, as measured by arrivals?

NO – The proposed project does not involve an existing bus or intermodal terminal.

Projects Affecting PM Sites of Violation or Possible Violation

Does the project affect locations, areas or categories of sites that are identified in the PM_{10} or $PM_{2.5}$ applicable plan or implementation plan submissions, as appropriate, as sites of violation or potential violation?

NO – the proposed project does not affect locations, areas or categories of sites that are identified in the PM10 or PM2.5 plan as sites of violation of potential violation.

As noted elsewhere, PM10 emissions in the Yuma County nonattainment area are largely due to dust from unpaved roads, construction dust, windblown dust, dust from unpaved farm roads, and cross border emissions from Mexico.

POAQC Determination

The project is not anticipated to have a significant number of diesel vehicles; the diesel truck increases due to this project is 49 AADT with overall traffic volumes low. Traffic volumes on US 95 between Rifle Range Road and the Wellton Mohawk Canal in 2045 (approximately 9,100 AADT under the 2045 No-Build scenario and 9,450 under the 2045 Build scenario). The project does not impact LOS D or worse intersections with a significant number of diesel vehicles as there are no intersection improvements or signalization projects associated with the proposed project.

Therefore, ADOT is presenting this project for interagency consultation in accordance with 40 CFR 93.105 as a Project that is NOT of Air Quality Concern and thereby will not require a PM hot-spot analysis.

Interagency Consultation Results

ADOT presented this questionnaire to the following consultation parties, EPA, FHWA, YMPO, and the Arizona Department of Environmental Quality (ADEQ) for interagency consultation between September 16 – October 1st, 2021 interagency consultation in accordance with 40 CFR 93.105 as a Project that is NOT of Air Quality Concern and that will not require a PM hot-spot analysis. There were no objections to the project determination and on October 1, 2021, ADOT concluded Interagency Consultation by notifying interested parties that this project will proceed as a project that does not require a quantitative PM10 hot-spot analysis under 40CFR 93.123(b).

Re: Interagency Consultation: F0359 01D | 095-B(214)T US 95, Rifle Range Road to Wellton Mohawk Canal

1 message

Beverly Chenausky <bchenausky@azdot.gov> Fri, Oct 1, 2021 at 11:24 AM
To: Paul Ward <pward@ympo.org>, "Wamsley.Jerry" <wamsley.jerry@epa.gov>, Transportationconformity <transportationconformity@azdeq.gov>, "Hansen, Alan (FHWA)" <Alan.Hansen@dot.gov>
Cc: Karina O'Conner <oconnor.karina@epa.gov>, Clifton Meek <meek.clifton@epa.gov>, Rebecca Yedlin <rebecca.yedlin@dot.gov>, Charles Gutierrez <cgutierrez@ympo.org>, Trent Kelso <tkelso@azdot.gov>, ADOTAirNoise - ADOT <adotairnoise@azdot.gov>, Morgan Ghods <mghods@azdot.gov>, Paul O'brien <POBrien@azdot.gov>, Mark Hoffman <mhoffman@azdot.gov>

As there are no objections to the project determination presented, interagency consultation is complete with the project identified as a project that does not require a quantave hot-spot analysis as listed under 40 CFR 93.123(b).

Thank you,

Beverly

On Thu, Sep 16, 2021 at 4:15 PM Beverly Chenausky <bchenausky@azdot.gov> wrote:

> ADOT is presenting the following project, **US 95, Rifle Range Road to Wellton Mohawk Canal**, for interagency consultation per 40 CFR 93.105 as a potential project that is **not** a project of Air Quality Concern and thereby will not require a PM10 hot-spot analysis. If through interagency consultation it is determined that this project will not require a hot-spot analysis, other conformity provisions apply and will be addressed in the air quality section of the environmental clearance. ADOT is requesting responses to the attached PM questionnaire within **10 business days**; a non-response will be interpreted as concurrence that the project is not a project of air quality concern and does not require a hot-spot analysis. If any consulted party believes this project should be treated as a project of air quality concern that requires a Quantitative PM hot-spot analysis, please document the appropriate section under 40 CFR 93.123 (b) that applies to the project and describe why the project should be treated as a project of air quality concern.
>
> Please let me know if you have any additional questions or need additional time to review. All other project details, upcoming events, and additional information on how to subscribe to project updates can be found on the project website at:
> https://azdot.gov/projects/southwest-district-projects/us-95-corridor-widening-and-reconstruction

Beverly T. Chenausky
Air & Noise Program Manager
MD EM02
205 South 17th Avenue
Phoenix, AZ 85007
C: 480.390.3417
azdot.gov

ADOT Environmental Planning

AIR—Our core values
KAIZEN—Our principles
AMS—Our management system
THE ADOT WAY

Re: Interagency Consultation: F0359 01D | 095-B(214)T US 95, Rifle Range Road to Wellton Mohawk Canal

1 message

Transportationconformity - AZDEQ <transportationconformity@azdeq.gov> Tue, Sep 28, 2021 at 2:01 PM
To: Beverly Chenausky <bchenausky@azdot.gov>

Hi Beverly,
I hope all is going well!
ADEQ does not have comments on the **US 95, Rifle Range Road to Wellton Mohawk Canal** Project Level PM Quantitative Hot-Spot Analysis - Project of Air Quality Concern Questionnaire.
Thank you for providing the opportunity to comment.

Amanda Luecker

On Thu, Sep 16, 2021 at 4:15 PM Beverly Chenausky <bchenausky@azdot.gov> wrote:

> ADOT is presenting the following project, **US 95, Rifle Range Road to Wellton Mohawk Canal**, for interagency consultation per 40 CFR 93.105 as a potential project that is **not** a project of Air Quality Concern and thereby will not require a PM10 hot-spot analysis. If through interagency consultation it is determined that this project will not require a hot-spot analysis, other conformity provisions apply and will be addressed in the air quality section of the environmental clearance. ADOT is requesting responses to the attached PM questionnaire within **10 business days**; a non-response will be interpreted as concurrence that the project is not a project of air quality concern and does not require a hot-spot analysis. If any consulted party believes this project should be treated as a project of air quality concern that requires a Quantitative PM hot-spot analysis, please document the appropriate section under 40 CFR 93.123 (b) that applies to the project and describe why the project should be treated as a project of air quality concern.
>
> Please let me know if you have any additional questions or need additional time to review. All other project details, upcoming events, and additional information on how to subscribe to project updates can be found on the project website at:
> https://azdot.gov/projects/southwest-district-projects/us-95-corridor-widening-and-reconstruction

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ADOT Environmental Planning

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THE ADOT WAY

Appendix B – FHWA Conformity Determination Letter

U.S. Department of Transportation
Federal Highway Administration

ARIZONA DIVISION

4000 North Central Avenue
Suite 1500
Phoenix, Arizona 85012-3500
Phone: (602) 379-3646
Fax: (602) 382-8998
http://www.fhwa.dot.gov/azdiv/index.htm

October 19, 2021

In Reply Refer To:
095-B(214)
095 YU 035 F0359 01C
US-95, Rifle Range Rd. to Wellton-Mohawk Canal
Air Quality Conformity Determination

Paul O'Brien, P.E.
Environmental Planning Administrator
Environmental Planning Group
Arizona Department of Transportation
205 South 17th Avenue, MD 612E
Phoenix, Arizona 85007-3212

Dear Mr. O'Brien:

The Federal Highway Administration (FHWA) received the request from the Arizona Department of Transportation (ADOT) dated October 19, 2021, for a project-level air quality conformity determination for the US-95 Rifle Range Road to Wellton-Mohawk Canal project [095-B(214), 095 YU 035 F0359 01C]. The purpose of the project is to accommodate increasing traffic volumes by providing greater roadway capacity. The project scope is to widen the existing two lane highway to a five lane section with two lanes in each direction and a center continuous left turn lane.

The project is located in the Yuma Metropolitan Planning Organization (YMPO) planning boundary, which is an area designated nonattainment for Particulate Matter (PM10). The project is located outside of the Ozone nonattainment boundary. PM10 is subject to project-level conformity requirements under the National Ambient Air Quality Standards. A regional conformity determination analysis was completed as part of the YMPO 2022-2045 Regional Transportation Plan and the FY 2022-2026 Transportation Improvement Plan (TIP) which was approved by FHWA and Federal Transit Administration (FTA) on August 30,2021.

Based on our review of the air quality analysis and interagency consultation information provided by the ADOT, regarding this project and scope of work, FHWA is making the determination that this project is not a project of air quality concern and meets the air quality

conformity requirements. If there are any questions on this determination, please contact Alan Hansen at 602-382-8964 or alan.hansen@dot.gov.

Sincerely,

Karla S. Petty
Division Administrator

By: Alan R. Hansen

ecc:
AHansen, FHWA
RYedlin, FHWA
KUtley, FHWA
Beverly Chenausky, ADOT
Julia Manfredi, ADOT