



How does EPA use EJScreen?

EPA uses EJScreen to identify areas that may have higher environmental burdens and vulnerable populations. A few examples of what the tool supports across the Agency include:

- Informing outreach and engagement practices
- As an initial screen in permitting and NEPA reviews and prioritizing enforcement work
- Retrospective reporting
- Enhancing place-based activities
- Incorporating EJScreen data into other tools

What is EJScreen?

EJScreen is the EPA’s environmental justice (EJ) screening and mapping tool that utilizes nationally-consistent data to highlight vulnerable communities overburdened by pollution. The tool provides summarized and detailed information at high resolution for both socioeconomic and environmental indicators.

An important first step to ensuring EJ for all people is to identify the areas where people are most likely to be exposed to different types of pollution. For this reason, EPA developed EJScreen to help aid in efforts to ensure programs, policies, and resources consider the needs of communities most burdened by pollution.

EJScreen provides 13 EJ and supplemental indexes, which combine socioeconomic information with a single environmental indicator (ex: proximity to traffic) to help identify communities that may have a high combination of environmental burdens and vulnerable populations. The tool displays this information in color-coded maps, bar charts, and standard reports on an easy-to-use web interface. The information can be used to assist efforts to protect human health and the environment in communities disproportionately impacted by pollution.



Proximity to traffic is one of the 13 environmental indicators.

What’s new in EJScreen 2.3?

EJScreen 2.3 makes important improvements to better meet the needs of users, including new environmental indicators and map layers, interface improvements, and updated demographic and environmental data. The new environmental indicators, with corresponding EJ and supplemental indexes, will map noncompliance of drinking water systems and satellite measured nitrogen dioxide levels in the air. EJScreen 2.3 will also feature new map layers on extreme heat, modeled drinking water service areas, private drinking water wells, and EPA environmental justice grants. This new version of EJScreen will make interface changes aimed at helping users better understand the data and modernizing aspects of the tool. The main purpose of these annual EJScreen updates is to incorporate the newest available demographic and environmental datasets. The update will use the 2018-2022 American Community Survey demographic data from the U.S. Census and refreshed EPA data for the environmental indicators.

How can the public use EJScreen?

EJScreen is a useful tool to help communities and others identify areas with higher environmental and economic burdens, so they can participate more meaningfully in decision-making processes that impact their health and environment.

The tool helps users identify areas with communities of color and/or low-income populations, potential air and water quality issues, and other factors that may be of interest. EJScreen can also support educational programs, grant writing, community awareness efforts, and more.

What are the limitations of the tool?

- EJSCREEN does not cover all environmental or EJ issues
- Environmental indicators are screening-level proxies for exposure or risk
- Indicators vary in vintage
- Census data has limitations and can obscure small communities
- Results should be verified on the ground when possible
- EJSCREEN does not label “EJ communities”

What kind of data does EJScreen use?

EJScreen features a variety of nationally consistent environmental and socioeconomic data at a very fine level of geographic resolution. The demographic data featured in the tool comes from the U.S. Census Bureau American Community 5-year Summary Survey (ACS).

Socioeconomic Indicator	Description (Source: 2018 - 2022 ACS Estimates)
People of Color	All people other than non-Hispanic white-alone individuals
Low-Income	Population at or below twice the federal “poverty level”
Unemployment	Population without a job at all during the reporting period
Limited English Speaking	Households in which all members over age 14 years speak English less than “very well”
Less than high school education	People age 25 or older without a high school diploma
Individuals under age 5	People under the age of 5
Individuals over age 64	People over the age of 64

The 13 environmental indicators are based on information developed from direct measurements, proxy estimates of pollution exposure, and facility location information.

Environmental Indicator	Year of Data
Particulate Matter (PM 2.5)	2020
Ozone	2020
Nitrogen Dioxide (NO2)	2020
Diesel Particulate Matter	2020
Toxic Releases to Air	2021
Traffic Proximity	2020
Lead Paint Indicator	2018 - 2022
Proximity to Superfund (NPL) Sites	2024
Proximity to Risk Management Plan (RMP) Facilities	2024
Proximity to Hazardous Waste Facilities	2024
Proximity to Underground Storage Tank (UST) and Leaking UST (LUST)	2023
Wastewater Discharge	2021
Drinking Water Non-Compliance	2023

EJScreen puts each indicator or index in perspective by reporting the value as a percentile as compared to the state or nation. For a place at the 80th percentile nationwide, that means 20% of the US population has a higher value.



For More Information

Visit the EJScreen at: <https://www.epa.gov/ejscreen>

For questions, feedback, and issues, contact: ejscreen@epa.gov