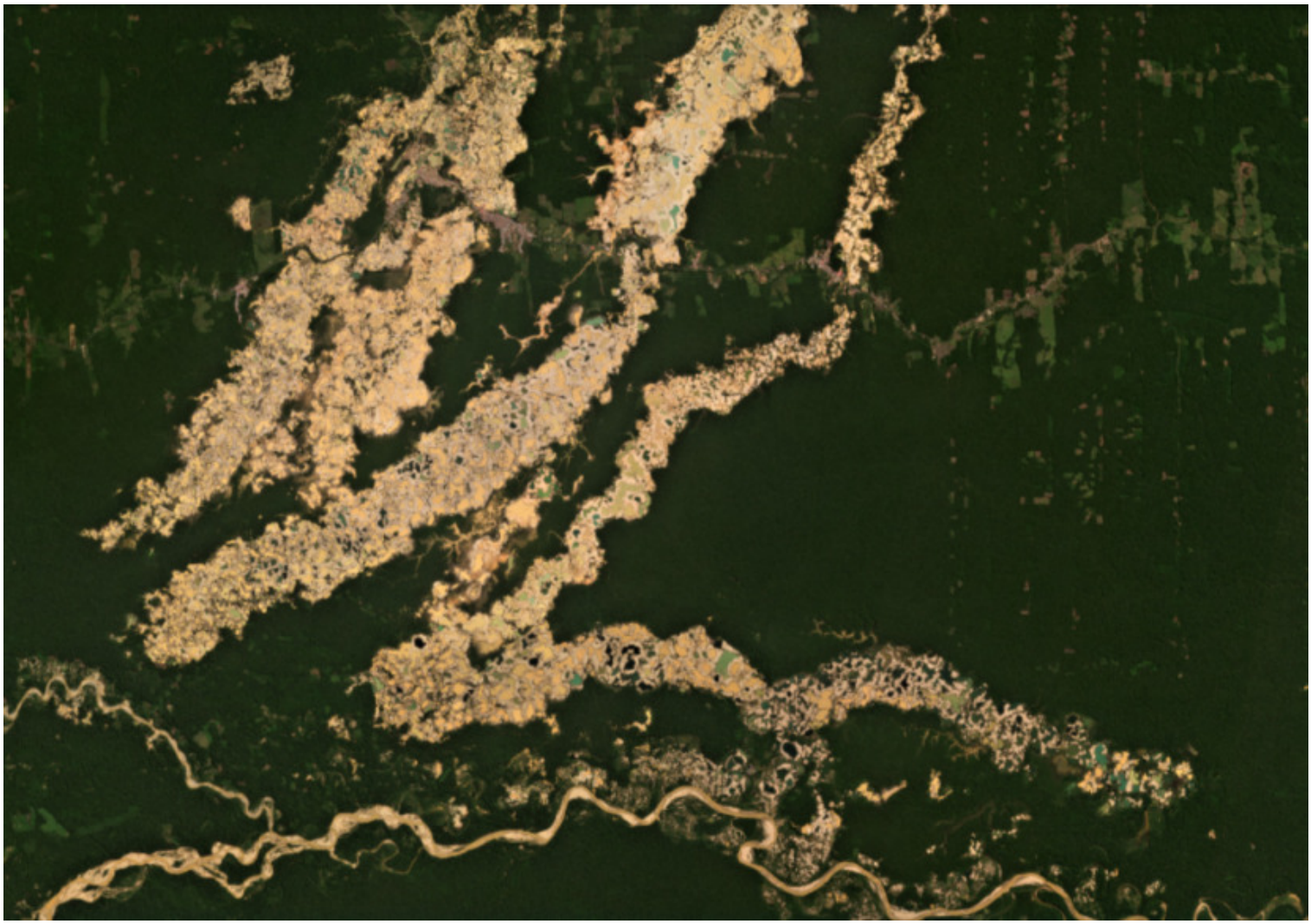
MAAP #197 : Illegal Gold Mining Across the Amazon



Example of major gold mining zone in the Peruvian Amazon.

Illegal Gold Mining continues to be one of the major issues facing nearly all Amazonian countries.

In fact, following the recent high-level summit of the Amazon Cooperation Treaty Organization, the nations' leaders signed the **Belém Declaration**, which contains a commitment to prevent and combat illegal mining, including strengthened regional and international cooperation (Objective 32).

Illegal gold mining is a major threat to the Amazon because it impacts both **primary forests and rivers**, often in remote and critical areas such as **protected areas & indigenous territories.**

That is, illegal gold mining is both a **major deforestation driver** and **source of water contamination** (especially mercury) across the Amazon.

Previously, in MAAP #178, we presented a large-scale overview of the major gold mining deforestation hotspots across the entire Amazon biome. We found that gold mining is actively causing deforestation in nearly all nine countries of the Amazon.

Here, we update this analysis with two important additions. First, we add to the overview major gold mining operations taking place in **rivers**, in addition to those causing deforestation (see **Figure 1**). Second, a present a new map of likely **illegal** gold mining sites, based on information from partners and location with protected areas and indigenous territories (see **Figure 2**).

Updated Amazon Gold Mining Map

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Figure 1 is our updated Amazon gold mining map. The **orange** dots indicate areas where gold mining is currently causing deforestation of primary forests. The **blue** dots indicate areas where gold mining is occurring in rivers. Combined, we documented **58** active forest and river-based mining sites across the Amazon.

The dots outlined in **red** indicate the mining sites that are likely illegal, for both forest and river-based mining. We found at least **49** cases of illegal mining across the Amazon, the vast majority of the active mining sites noted above.

Note the concentrations of illegal mining causing deforestation in southern Peru, across eastern Brazil, and across Ecuador. Similarly, note the concentrations of illegal mining in rivers in northern Peru and adjacent Colombia and Brazil.

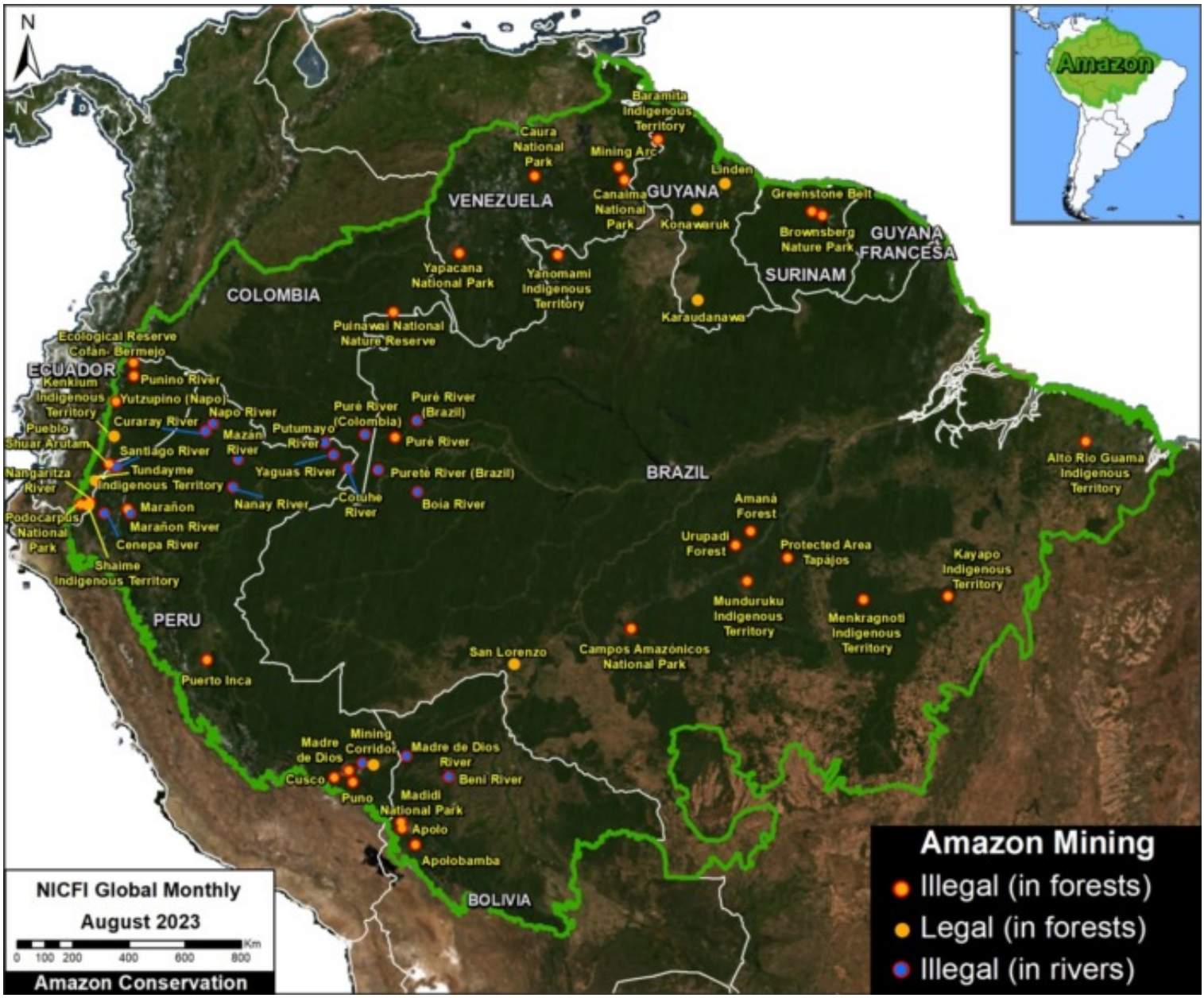

Figure 1. Updated Amazon gold mining map. Data: ACA/MAAP. Click to enlarge.

Protected Areas & Indigenous Territories

Figure 2 adds protected areas and indigenous territories. We found at least **36 conflictive overlaps**: 16 in protected areas and 20 in indigenous territories. We also found an additional two conflicts with Brazilian National Forests.

We highlight a number of high-conflict zones. For **protected areas**: Podocarpus National Park in Ecuador; Madidi National Park in Bolivia; Canaima, Caura, and Yapacana National Parks in Venezuela. We note that the Peruvian government has been effectively minimizing invasions in protected areas in the southern region of Madre de Dios (Tambopata National Reserve and

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Amarakaeri Communal Reserve). For **indigenous territories**: Kayapo, Menkragnoti, Yanomami, and Mundurucu in Brazil; Pueblo Shuar Arutam in Ecuador, and a number of communities in southern Peru.

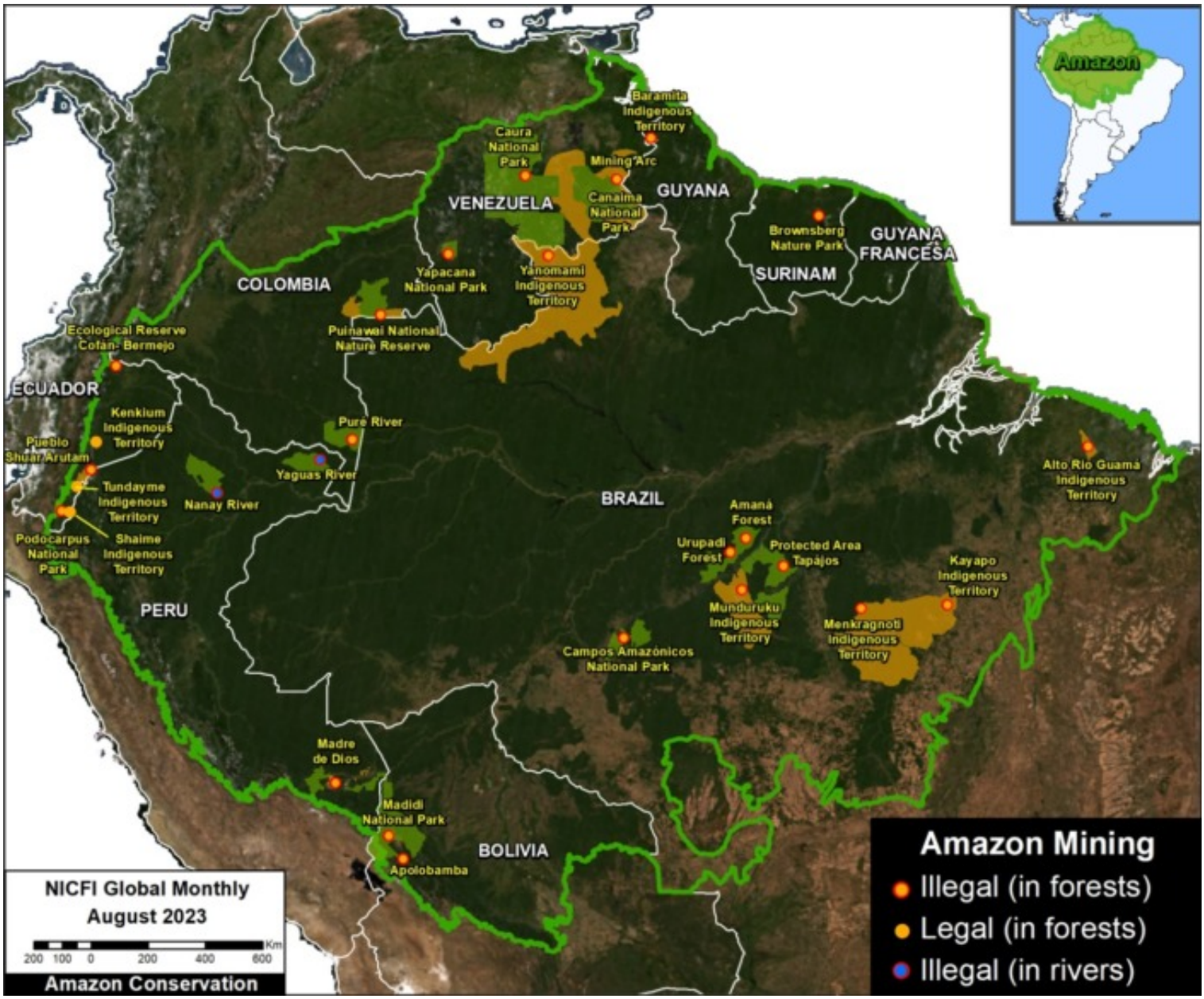

Figure 1. Amazon gold mining map., with protected areas and indigenous territories. Data: ACA/MAAP, RAISG. Click to enlarge.

Methods

The forest-based mining sites displayed in Figure 1 are largely based on information obtained over the last several years of our deforestation monitoring work. The river-based sites are largely based on information obtained from partners in country and on the ground.

We complemented this information with automated, machine-based data from Amazon Mining Watch, and data from RAISG. For these sources, we checked recent imagery and only included sites that appeared to still be active.

Classification as an illegal mining site is largely based on location within protected areas or indigenous territories, or clearly outside of an authorized mining zone.

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Citation

Finer M, Mamani N, Arinez A, Novoa S, Larrea-Alcázar D, Villa J (2023) Illegal Gold Mining Across the Amazon. MAAP: 197.

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