# DISSECTING THE ENVIRONMENTAL-FINANCIAL CRIME NEXUS: A SPOTLIGHT ON THE ILLEGAL WILDLIFE TRADE

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This report contributes to the Environmental Crimes Financial Toolkit being developed by WWF and Themis, as part of the **Climate Solutions Partnership**, a collaboration between HSBC, the World Resources Institute, and WWF.

The Environmental Crimes Financial Toolkit (ECFT) is an online platform that assists financial institutions in monitoring risks related to deforestation and land conversion – and, more broadly, environmental crimes – that could be linked to financial operations. By highlighting red flags and risks associated with various types of environmental and financial crimes, the Toolkit helps financial institutions (FIs) strengthen their screening processes when reviewing existing clients, onboarding new ones, and assessing sectoral risks.

This report focuses on the intersectionality between Illegal Wildlife Trade (IWT) and financial crimes, which undermines global sustainability and conservation efforts. It dissects the complexity of the IWT and financial crime nexus by analysing evidence, perceptions, and risks for Financial Institutions (FI). Led by WWF and Themis, this work benefits from a series of real-world case studies from guest contributors, with global experts and organisations working at the frontline sharing unique insights and potential solutions.


# ACKNOWLEDGEMENTS


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# 1. Executive Summary

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The Illegal Wildlife Trade (IWT) affects thousands of species of animals and plants across more than 160 countries and territories, disrupting and unbalancing multiple ecosystems and economies the world over. With nature disappearing at an unprecedented rate – the average size of wildlife populations has fallen by 73% between 1970 and 2022 – the importance of tackling IWT cannot be overstated. The economic impact of IWT must not be underestimated either. Even by conservative estimates, the annual value of IWT surpasses the individual GDPs of almost a third of countries worldwide, and it is, therefore, unsurprising that it has been recognised by international organisations such as INTERPOL and the United Nations Office on Drugs and Crime as a serious crime.

Financial institutions can be exposed to IWT directly and indirectly through a variety of business activities and third-party relationships along the value chain. The risks span the physical, reputational, regulatory and legal, not to mention the environmental, social and governance (ESG) impacts of exposure to a crime that can foster ecosystem disruption, animal cruelty, violence and conflict, and the spread of zoonotic diseases in regions across the world. Furthermore, and in common with other criminal activities, IWT rarely exists in isolation but is frequently enabled by and converges with an array of other financial and predicate crimes – including money laundering, tax evasion, bribery and corruption, fraud, terrorist financing, drug trafficking, sanctions evasion, modern slavery, and human trafficking.

It is important to understand, therefore, the drivers and contemporary trends as well as the environmental, social and economic impacts of IWT, its significant convergence with other financial and predicate crimes, and the key areas of risk exposure for Financial Institutions (FIs), so that they can better map and design effective responses to this serious crime.

This report aims to support this endeavour and is one component of the Environmental Crimes Financial Toolkit (ECFT) project, undertaken by WWF and Themis. The Toolkit is an open access digital platform that helps FIs identify and mitigate their exposure to environmental crime risk – especially in relation to deforestation, land conversion, and IWT – and to the associated illicit financial flows and predicate offences. This work builds on WWF and Themis' 'Financial Crimes and Land Conversion: Uncovering Risk for Financial Institutions' report and is part of an effort to broaden the scope of the ECFT project to cover other environmental crimes, namely IWT – a pressing crime with devastating environmental and human impacts that is often driven by a financial motive.

This report draws on desk-based research, invited contributions from world renowned experts and organisations, and original data from an extensive survey launched specifically for this project, with responses from 829 professionals working in FIs across 22 countries. The survey investigated the latest trends, red flags, and financial crime typologies relating to environmental crime and IWT, as well as organisational attitudes towards these issues across the financial sector, to provide a snapshot of where the industry currently stands in terms of exposure to, understanding of, and responses to IWT.

Data from the survey highlighted a high level of industry exposure to IWT, with **81% of respondents indicating that their organisation operates in at least one high-risk business area for IWT**, with risk exposure predominantly related to the transit of goods rather than the sourcing of the wildlife itself – a key threat when taken in tandem with the fact that 90% of global trade is seaborne, where less than 2% of containers undergo inspection.

Results also showed that **while there is a significant awareness of environmental crime and specific actions to address IWT, concrete risk mitigation action is lagging behind compared to the risks that FIs are aware of and exposed to.** Indeed, 40% of the respondents who indicated exposure to a high-risk sector represented organisations that do not screen for these risks.

Furthermore, **while FIs demonstrated broad general knowledge of environmental crimes, they lacked precise insights into key IWT risk typologies and red flags.** In particular, respondents' knowledge of IWT appeared to be limited to a few high-profile areas, such as the ivory trade, leaving out a large number of other high-risk wildlife species and products. To address this issue, we included in this report several case studies, expert contributions and 'in focus' boxes that help to unveil the many faces of IWT and its linkages with financial crimes and human rights violations.

Encouragingly, most FIs recognised the potential risks posed by environmental crime, with only 8% of respondents stating that it is not a major concern to their organisation. However, **nearly 50% of respondents from FIs with self-reported high awareness of environmental crime also reported having no policy on IWT in place. It is concerning that nearly half of organisations are purportedly highly aware of environmental crime risks, yet are not combining this awareness with policies which would both externally signal their commitment to addressing related risks and provide an internal framework for staff to abide by.**

While FIs can strengthen their efforts to close the existing gap between awareness and action, they are not the only actors that need to act. Indeed, **more than one in two respondents found that improved guidance from their FIU or regulator was the most useful tool for assisting their organisation in addressing IWT risks**, demonstrating the critical role of public-private forums in facilitating concerted action across key stakeholders.

This report and the Environmental Crimes Financial Toolkit provide FIs with a set of practical resources to address such gaps and mitigate their risk exposure to IWT, contributing to global efforts to reduce the illicit financial flows associated with this devastating crime, so that people, nature and business around the world can all thrive.

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# 2. Introduction: Framing Environmental Crime

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## Definitions

Environmental crime: Activities that breach environmental legislation and cause significant harm or risk to the environment, human health, or both. The term covers a wide range of unlawful activities such as illegal logging, IWT, Illicit Mining (IM), Illegal, Unreported and Unregulated (IUU) fishing, illegal deforestation and land conversion, waste trafficking and illegal waste dumping, among others.

Ecocide: Unlawful or wanton acts committed with the knowledge that there is a substantial likelihood of severe and either widespread or long-term damage to the environment as a result.

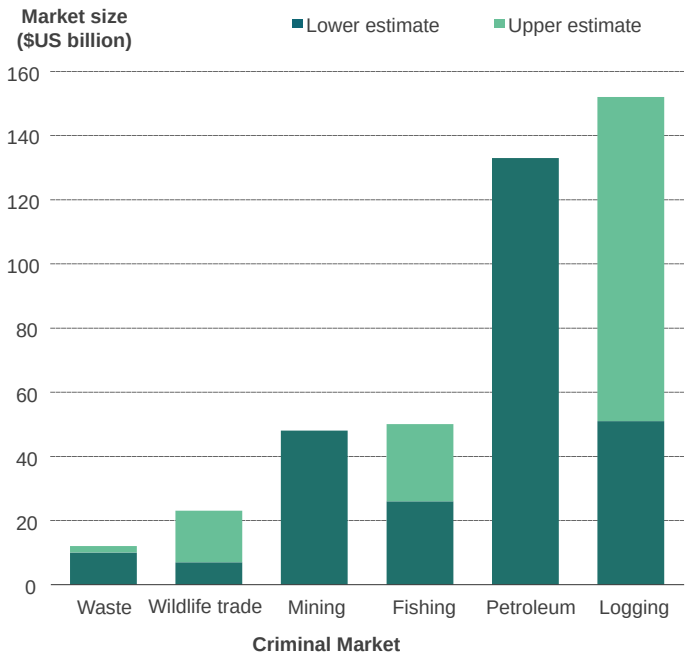
Environmental crime is one of the key pillars of the international illicit economy – with environmental crime generally cited as the third or fourth largest global criminal industry.[1] INTERPOL estimates that its growth rate, at 5-7% per year, outstrips that of the licit economy by two to three times, with devastating and far-reaching impacts. Environmental crime affects communities and economies across the globe, involving human rights violations, biodiversity loss, death and violence, hampered economic development, and even national security threats.

While estimates vary – by its very nature, illicit activity is difficult to put an exact figure on – the size of the environmental crime industry is generally put in the hundreds of billions. Estimates value the size of the environmental crime market as between US$275 billion and US$481 billion every year.[2]

1 Environmental crime and human trafficking tend to be ranked third and fourth interchangeably after drugs and arms trafficking.

2 These figures combine estimates from the Transnational Alliance to Combat Illicit Trade on the annual value of the five 'extraction' categories of environmental crime activity (IWT, illegal logging, illegal mining, the illegal petroleum trade, illegal, unregulated and unreported fishing) from 2022 and 2021 FATF report concerning the value of waste crime.

Figure 1: Market size of environmental crimes (sources: TRACIT; FATF)




Since the United Nations (UN) General Assembly adopted its first resolution recognising environmental crime as part of other transnational organised crimes in 2017, international bodies have given the issue their increasing attention. The FATF, EUROPOL, and INTERPOL have all listed environmental crime as a key area of focus, and the latter two have led numerous operations tackling environmental crimes since 2015. Moreover, the European Union's (EU) new Environmental Crime Directive entered into force in May 2024, requiring Member States to publish a national strategy on combating environmental criminal offences by May 2027.

Landmark legislative changes have also been occurring at the state level, with France, Chile and Belgium recognising ecocide as a federal crime in 2021, 2023 and 2024, respectively. More countries are expected to follow suit: for example, the Pacific islands submitted a proposal to the international criminal court for recognition of ecocide as a crime in September 2024.

**Environmental crime also frequently converges with an array of financial crimes, including bribery and corruption, money laundering, tax evasion, fraud, sanctions evasion, terrorist and conflict financing, and human and drug trafficking.** Indeed, in 2016, the United Nations Environment Programme and INTERPOL warned that 84% of countries saw a convergence between environmental crime and other serious crimes.

Financial institutions (FIs) can be exposed to IWT and other environmental crimes – defined as predicate crimes to money laundering by the Financial Action Task Force (FATF) – through myriad business activities, leaving them vulnerable to regulatory, legal, reputational and environmental, social and governance (ESG) risks. It is more important than ever that FIs fully map, understand and, where possible, mitigate their exposure to environmental crime – not only to protect themselves from associated risks, but also to contribute to global environmental and societal goals. Addressing environmental crime is particularly critical as progress towards the Paris Agreement and the United Nations Sustainable Development Goals (SDGs) continues to be insufficient, with current global climate policies expected to result in 2.7C warming above pre-industrial levels and only 17% of SDG targets projected to be met by 2030.

The financial sector, alongside law enforcement and Financial Intelligence Units (FIUs), bears a regulatory obligation to investigate the illicit financial flows behind environmental crime. FIs, with their access to unique data like transaction records and client profiles, are well-positioned to play a more active role in combating environmental and related financial crimes. As the Council of Europe has noted, "parallel financial investigations […] are one of the effective tools to identify larger criminal networks", including those behind environmental crimes. Failing to 'follow the money' may lead to cases where low-level perpetrators are prosecuted while higher-level operatives remain under the radar, making financial investigations a critical tool in tackling environmental crimes on a holistic scale.

Despite the existence of an untapped potential, financial information is currently not comprehensively collected and disseminated, and regulatory bodies are not receiving sufficient suspicious transaction or activity reports to regularly initiate or identify cases of environmental crimes. According to a 2024 report from the US-based Financial Accountability and Corporate Transparency (FACT) Coalition, over the past decade, only one in three environmental crimes in the Amazon region included a parallel financial investigation (a financial investigation undertaken contemporaneously with a criminal investigation). These numbers reflect similar studies conducted elsewhere: a 2021 report by the Egmont Group of Financial Intelligence Units estimated that 78% of FIUs had not conducted parallel financing investigations into wildlife crime, for example. This may be attributed to lack of knowledge in FIs on the nature of IWT convergence with financial crimes, the ease of presenting illegal activity as legitimate, the prevalence of corruption, difficulties in pursuing money trails overseas, and the high use of cash in criminal activity.

Consequently, **there are opportunities for financial data to be more effectively collected and utilised to detect and disrupt such activities – with FIs in a crucial position to contribute**. When FIs better understand the convergence between environmental and financial crimes and are encouraged to flag relevant suspicious transactions, law enforcement can gain an advantage over criminals exploiting vulnerabilities and loopholes in the financial system. Additionally, firms can protect themselves from the physical, legal, reputational, and other risks associated with links to environmental crime activities, including those related to IWT.

To assist FIs in this goal, the following chapters of this report provide an in-depth look at IWT – its drivers, impacts, key trends, and convergence with other financial crimes – to better equip FIs in identifying and addressing IWT risks and associated financial flows.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# 3. The Issue: IWT

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## Definitions

Legal wildlife trade – The exchange of animals (including aquatic species), plants, and fungi by humans. The legal trade in flora and fauna is often overshadowed by the illegal trade but provides a source of income for millions of people around the world and raw materials on which a vast array and number of businesses depend. It plays a fundamental role in regional, national, and international economies.

Illegal Wildlife Trade (IWT) – Trade in wildlife and wildlife products in contravention of environmental regulations, other government legislation, or international agreements put in place to prevent over-exploitation.

Legal grey areas – Laws governing the wildlife trade are complex, geographically contingent, rapidly evolving, and not always catered or adequately communicated to local communities. Regulations can sometimes rely on different – and sometimes even conflicting – texts and statues governing the same area of wildlife trade and often contain regional exceptions, making it difficult to effectively monitor and enforce international laws. Species can enter or leave endangered lists, and in areas that have historically relied on hunting or poaching for subsistence needs, local communities can be unaware of regulations around the wildlife trade. Consequently, there are many grey areas that can be exploited or inadvertently contravened. Legal uncertainty and loopholes coupled with poor enforcement can facilitate grey markets, for instance where legal wildlife products (such species that can be legally traded if captive-bred) are mixed with illegal specimens (poached and captured from the wild) and sold in the marketplace.

Research has shown that about US$44 trillion of economic value generation – more than half of the world's total GDP – is moderately or highly dependent on nature. Many of these activities rely on flora and fauna, ranging from agricultural production for food and supplements, to timber used for furniture and musical instruments and to ivory for decorations. While obtaining, processing, and consuming plant and animal matter is often legal, concerns with overexploitation have led to an increasing raft of national and international laws that regulate and protect certain species and their use. However, ongoing demand for these products has fostered a lucrative illegal trade in wildlife, which is now considered among the most profitable illegal industries in the world.

Currently, over 40,900 species are protected by CITES – the Convention that governs the trade in endangered wildlife. CITES covers well-known species such as tigers, sharks, rhinos and elephants, as well as plants such as orchids and cacti. The vast and diversified demand for endangered wildlife means that export, transit, and import operations take place – both legally and illegally – in most countries of the world, and not just in highly biodiverse countries.

In focus

### The Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES)

CITES is "an international agreement between governments […] to ensure that international trade in specimens of wild animals and plants does not threaten the survival of the species". First mooted in 1963, negotiated and adopted 1973, and entered into force in 1975, CITES subjects international trade in certain species to controls, with all import, export, re-export and introduction from the sea of species covered by the Convention having to be authorised through a licensing system. Countries that have ratified the Convention – known as Parties to the Convention – must designate domestic authorities to administer the licensing system.

CITES species can be listed under three appendices. Appendix I includes species threatened with extinction. Appendix II includes species that are not necessarily threatened with extinction but could become so if trade is not regulated; it also ensures that look-alike species are protected to prevent illegal trade under the guise of legal species. Appendix II includes vulnerable species that are not necessarily threatened with extinction, and Appendix III includes species that are protected in at least one country that has requested assistance from other CITES parties to control its trade.

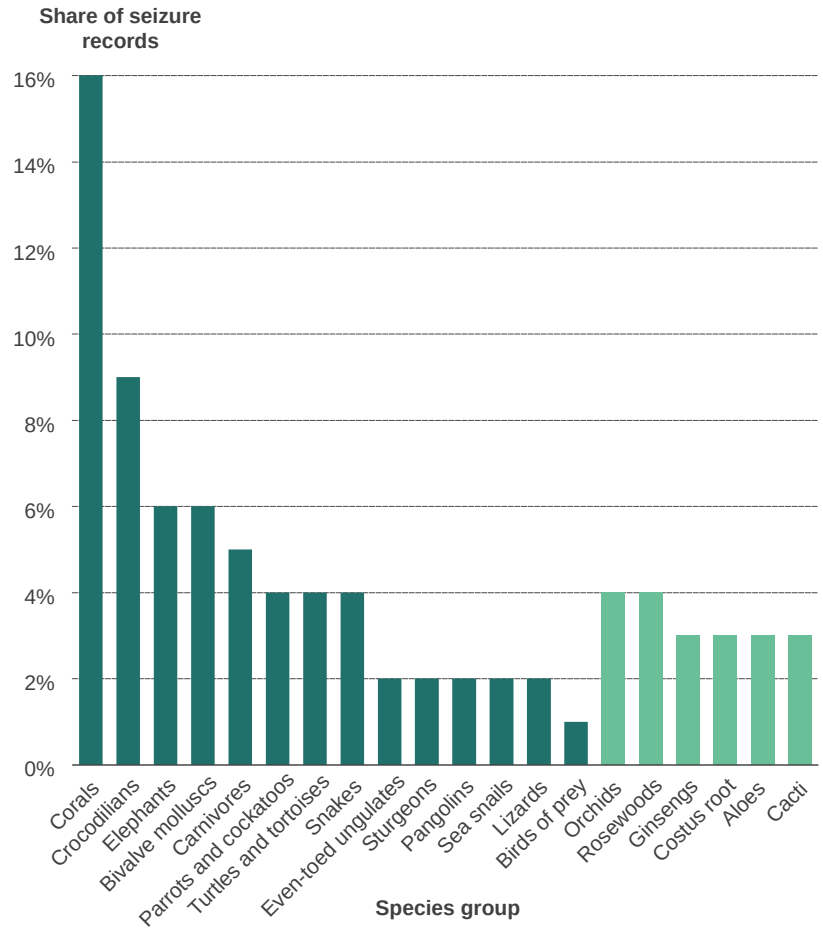
All Parties to CITES need to ensure that their domestic law is aligned with the provisions of the Convention, including when it comes to combating illegal wildlife trade in CITES-listed species. For instance, in the United Kingdom (UK), failing to hold a valid permit for moving or trading CITES listed species into or out of the country is a criminal offence and could lead to a prison sentence of up to seven years. In China, the maximum penalty is up to 10 years, and many other jurisdictions impose fines for wildlife trafficking. Consequently, FIs that invest in – or do business with – organisations involved in the wildlife trade should be aware of the CITES provisions and appendices to avoid inadvertently facilitating violations.

According to INTERPOL, the black market for illegal wildlife products is worth up to US$20 billion per year, and the loss of resources due to IWT is estimated by researchers to range from US$48-153 billion, though the illicit nature of the trade makes it difficult to accurately assess. Nonetheless, even by conservative estimates, IWT surpasses the individual GDPs of almost a third of countries worldwide, and international organisations such as INTERPOL and UNODC have recognised it as a serious crime.

In the US alone – thought to be one of the world's largest consumers of illegal wildlife products – the IWT market is estimated to be worth US$2 billion. Between 2015 and 2021, over 140,000 IWT seizures were recorded, covering about 4,000 different species – over 80% of which were CITES listed. The actual volume of IWT is likely to be much higher than seizure data alone suggests. FIs should therefore understand that exposure to IWT can take many forms and isn't simply limited to well-known products like ivory or pangolin or trade routes like Africa to Asia. While certain products are particularly high-profile, no single species accounts for more than 16% of all confiscations.

IWT is certainly not a 'victimless' crime, and the associated declines in wildlife populations and heightened risk of extinction of particular species is a problem that is greater than the sum of its parts. By driving the overexploitation of vulnerable or scarce resources, IWT contributes to the biodiversity crisis, which may have catastrophic consequences for global ecosystems and the vital services they provide to people and economies. It has also been linked to the spread of zoonotic diseases and invasive species, animal cruelty, species' population collapse, organised crime, corruption and violence. On top of these direct impacts, IWT also undermines good governance and the rule of law and leaches tax revenue from governments.

Figure 2: Diversity of species recorded in seizures from 2015-2021 (Source: UNODC)




Although IWT represents a significant threat to FIs, which may inadvertently facilitate or sponsor illegal transactions, it also presents them with an opportunity to assist in dismantling the illicit trade.

Since many criminals engaging in IWT are profit-driven, disrupting the illicit financial flows resulting from it and therefore precluding criminals from realising their profits is one of the key means to tackle IWT.

## 3.1 IWT Key Trends

Wildlife markets are extremely complex and dynamic, combining many species, products, transport routes, and actors, across multiple ecosystems and jurisdictions. The concealed and illicit nature of IWT make it even more difficult to accurately assess the volume and the value of goods being traded, the key trends, and the impacts on conservation.

Authoritative sources such as CITES and UNODC rely on seizure data, which is not reported comprehensively in all parts of the world and does not perfectly reflect the nature and the volume of the illegal trade in general, as it may be an indicator of law enforcement activity instead of criminal activity. For instance, authorities struggle to identify whether more seizures reflect an actual increase in traded volumes, or an enhancement in detection and enforcement.

Furthermore, assessing the full scale of IWT is made more challenging by knowledge gaps on biodiversity, particularly around population numbers and threats. The IUCN Red List of Threatened Species, which serves as the standard reference for extinction risk, is based on the assessment of about 166,000 species out of as much as 10 million species populating our planet.

These factors combine to form a shifting landscape of uncertainties that significantly complicate efforts to fully comprehend, and thus effectively combat, IWT. Nonetheless, it is possible to identify some key trends in IWT over the past few years, which are worth considering to frame the best possible responses.

### 3.1.1. Perceptions of the most heavily trafficked species

While high-profile, charismatic species such as elephants, rhinos, tigers, and pangolins tend to dominate public concern and understanding of IWT, plants and corals accounted for more seizures in 2020/21. Elephant and rhino seizures have, comparatively, declined significantly over the past five to ten years.

Figure 3: Key IWT commodities by region


*Source: based on ECOFEL 2021 and updated with suggestions from IWT experts, reviewers and contributors. This list is indicative and non-exhaustive, and the profiles of IWT species in different regions change constantly over time.*

Just under 40% of plants globally are threatened with extinction, up from around the 20% estimated in 2016. However, a distinct 'plant blindness' – the relative "inability to see or notice plants in one's own environment" – still permeates wildlife conservation conversations, which remain focused on animals. With plant species such as succulents, timber, and fungi all under threat from IWT, there is a need to pay attention to how significant demand for these endangered species is fuelling extinction events, and design appropriate policy interventions in response

Figure 4: Approximate market share of seized animal products from 2015-2021 (Source: UNODC)

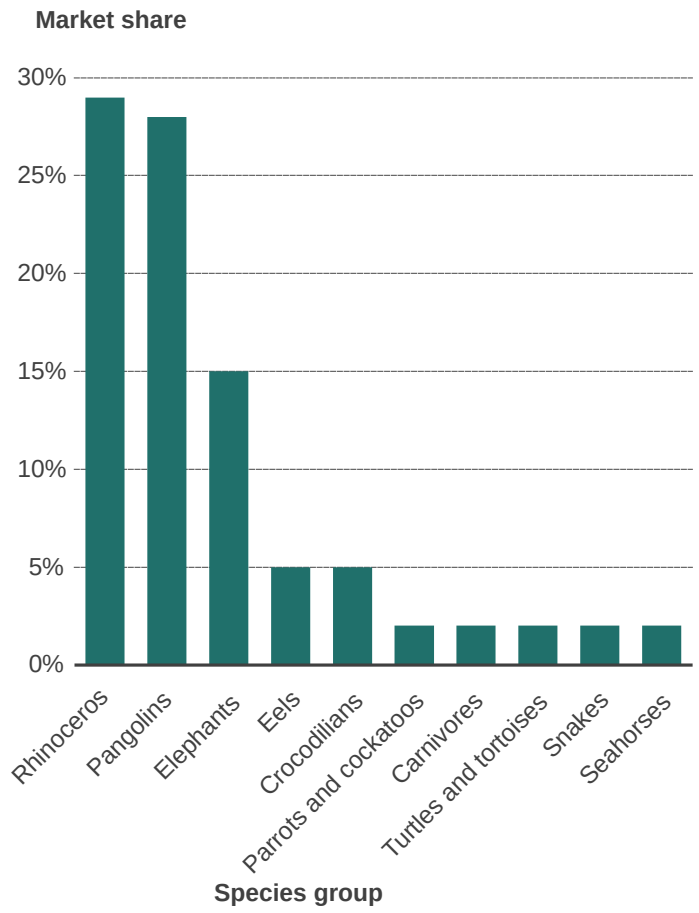
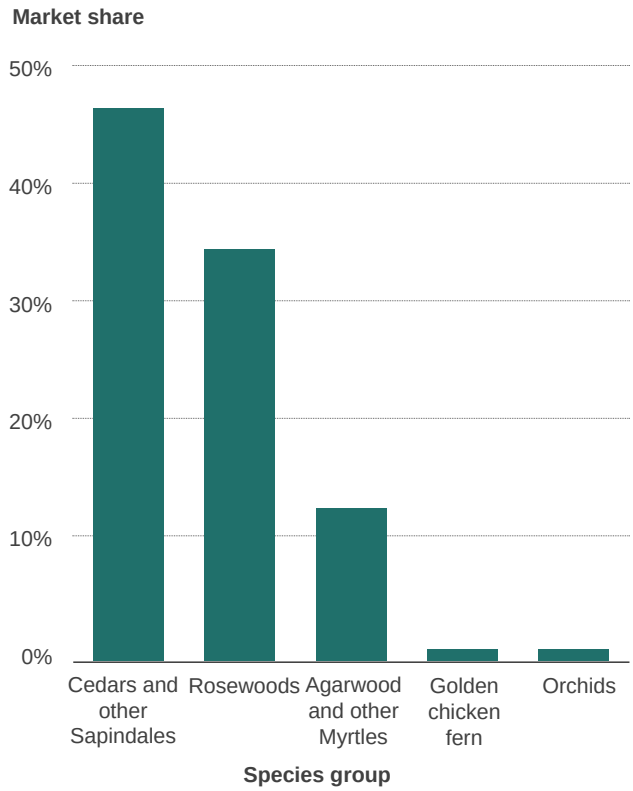



Figure 5: Approximate market share of seized plant products from 2015-2021 (Source: UNODC)




Case study

### Trafficking of illegally harvested succulents in southern Africa

Succulents are a significant emergent IWT market – an issue that has been recently covered by the Financial Times. Since 2019, more than one million illegally harvested succulents representing 650 different species have been seized during their transit through southern Africa. Despite trade in succulents being increasingly regulated, trafficking continues to be driven by growing demand for them as ornamental plants, particularly in Asia. This has threatened biodiversity in regions such as the Succulent Karoo biome, an area covering zones in South Africa and Namibia where more than 6,000 succulent species are found, with 40% unique to the region. In recognition of the critical biological importance of this region, the Critical Ecosystem Partnership Fund (supported by national and international government bodies) has developed an investment strategy for the Succulent Karoo biome, aiming to ensure sustainable use of the area.

## 3.1.2 Seizure trends: Shifts in species

From 2009 to 2018, rosewood accounted for the highest volume of seizures by market value (approximately 30-40%). From 2015, however, corals began to represent a higher share of total seizures, and were the dominant species between 2017 and 2020. Notably, the total number of coral seizures reported for 2020 and 2021 was around half of the average number for the four preceding years. This may be due to any number of factors, such as a reduction in enforcement action, lower trafficking levels, shifts to new modes of marketing and trade, or the broader impacts of the COVID-19 pandemic (for example, on consumption trends).

Researchers have also found evidence of species extinction being linked – at least partially – to their illegal trade, with 294 reports of global extinctions, 192 local ones, and 25 extinctions in the wild. Consequently, extinction events may also be a factor explaining the decline in trade, both legal and illegal, of certain species.

In focus

### 'Squeezing the balloon' - the shifting geography and type of IWT seizures

IWT hotspots – both in terms of geography and trafficked species – have shifted over the past decade, responding to changes such as the global crackdown on illegal trade in certain species and new trade patterns that emerged during the COVID-19 pandemic.

Ivory seizures, for example, have become increasingly concentrated in East Africa, particularly since 2023. Despite West and Central Africa being hotspots for ivory trafficking operations in 2020, seizures in West Africa have declined since 2023, potentially due the intensification of law enforcement operations in major ports such as Lagos, incentivising illegal traders to find new routes. Over the past five years, there also appears to be a shift in trade flows from ivory to pangolin scales, especially between Africa and China. Since the 2018 ban on ivory sales in China, ivory prices dropped more than two-thirds and ivory shipments into China fell by 80%. Although it is difficult to demonstrate a direct link, at about the same time, there was a dramatic increase in pangolin seizures, which was listed into the CITES Appendix I in January 2017, making illegal for any CITES party to trade pangolin scales for commercial purposes.

In recent years, Latin America has gained increasing attention as a significant source, transit, and destination for IWT. The growing investment from China in infrastructure across the region has opened new opportunities for the exploitation of wildlife, particularly for use in Traditional Chinese Medicine. This includes the trafficking of jaguars, shark fins, and fish maws, such as the endangered totoaba. Coupled with the presence of well-established transnational criminal networks operating in the region, Latin America has emerged as a key hotspot for IWT, amplifying the need for urgent action.

It is difficult to identify the exact reasons why traders shift from region to region, since observed geographic changes in seizure hotspots may reflect a number of factors, such as a shift in law enforcement presence, regulatory crackdowns, or decisions made by traffickers in response to other factors. Sometimes these shifts are referred to as 'squeezing the balloon'; when conditions for traffickers become harder in particular circumstances, they simply move to other regions, products or transit routes, rather than ceasing all activities.

## 3.1.3 Shifts in transit methods

Over the past five years, and particularly since the COVID-19 pandemic, the scale and nature of IWT has shifted. Overall, seaborne cargo shipping – which has traditionally been the preferred bulk transport method for IWT– has largely remained constant during the pandemic, while air freight decreased by 15% and air travel by 60% in 2020. Nonetheless, stricter border controls during COVID-19 may have dissuaded traffickers from operating on a bulk scale, favouring a shift towards different smuggling methods and smaller wildlife commodities with a high value-to-weight ratio, such as coral or dried seahorses. For instance, there is evidence of increased trafficking through mail and post in the EU, where 36% of seizures happened at mail centers in 2022, making it the most frequently reported location for seizures.

In 2020 and 2021 there was a significant reduction in wildlife trafficking in personal baggage – the decline in coral seizures is a good example – due to restrictions on movement and a fall in air passenger numbers. An increase in live animal seizures over the same period may be attributed to an increased concern on the part of authorities with the spread of zoonotic diseases. The reduction in air travel may also have impacted the overall volume of live animal trafficking, as shorter travel times allows for animals to remain alive through the journey.

The pandemic may also have contributed to a rise in local consumption of wildlife products for sustenance, as the availability of imported goods decreased. In the Amazon region, for example, concerns with the spread of zoonotic diseases during COVID-19 led to the closure of markets selling wild animals, but trade continued undercover in the rainforest as local communities relied increasingly on bushmeat for sustenance.

## 3.1.4 Shifts in trade platforms

Online forums are becoming an increasingly significant facilitator of IWT, with the internet increasing both species exposure and potential market venues. This has been particularly noticeable for wild plants, notably during the COVID-19 pandemic. Furthermore, social media is used to publicise images and videos of exotic species, often as pets, which normalises the idea of possessing these species, consequently fuelling demand for wild – sometimes endangered – animals to be sold into the illegal pet trade.

Social media also provides a platform for consumers to contact content creators and find out how to obtain these animals, and illegal wildlife traders sometimes openly advertise their products online, despite the trade being nominally banned. On Facebook, for example, researchers have found songbirds, ivory, pangolin scales, tigers, leopard cubs, and shark fins for sale with ease. While social media companies are seeking to crack down on IWT on their platforms, for example by forming the Coalition to End Wildlife Trafficking Online, regulators found that illegal wildlife activity on Facebook has actually increased since 2019. Traders also evade official or automated detection by using codewords such as 'bovine bone' or 'carved bone' instead of ivory.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## 3.2 Drivers of IWT

### 3.2.1 Poverty and income generation

While demand arguably remains the main driver for IWT, there is also a correlation with poverty in many cases. Traffickers and crime groups often target impoverished communities, leveraging the lack of economic opportunities to meet the lucrative demand for protected plants and animals.

According to CITES, regions with higher levels of poverty also observe higher levels of elephant poaching – with levels decreasing as rates of food security increase. Rural areas with ready access to valuable wildlife and lack of employment activities are particularly vulnerable, as local communities may engage in illicit trade to generate quick income. In Namibia, for example, a legal case revealed that poaching syndicates offer up to three times the mean annual household income in return for a single set of rhino horns.

In focus

#### The IWT supply chain

IWT often involves three key stages. Firstly, poaching, where animals or plants are acquired. This is often carried out by local populations that are familiar with the area and recruited by traffickers or larger organised groups. At this stage, profits tend to be low whilst the risk of capture or physical harm tends to be higher. Secondly, the products are trafficked to a retail market, typically by middlemen traffickers involved in larger scale operations. This stage also often involves complicitly and assistance from border control and law enforcement officials. Thirdly, at the retail phase, products are sold to consumers, often at extremely high profit margins that are not passed on to the poachers, who are typically the poorest and most vulnerable group involved in IWT.

Figure 6: The IWT supply chain

## 3.2.2 Wildlife as a food source

IWT provides a source of food across the world, from wildmeat to luxury caviar. On the one hand, it is linked to poverty. Research in Western Africa has demonstrated that bushmeat hunted by farmers is not only used for trade but can also be a cheaper source of food in times of economic distress. Correspondingly, rates of hunting and household wildmeat consumption tend to decline during times of peak agricultural activity, when individuals are occupied with employment and have more lucrative and stable sources of income. Wildmeat consumption is a key contributor to food security for millions of people. There is also an important cultural element, as wildmeat is part of traditional diets in many parts of the world.

On the other end of the spectrum, consumption is tied to luxury. IWT supplies wealthy consumers with extravagant and exotic food items such as caviar and songbirds, with an estimated 90% of caviar coming from illegal sources.

## 3.2.3 Consumer demand

One of the most significant drivers of IWT is demand, particularly from wealthy consumer countries. In Asia, for example, increased disposable income was linked with an increased demand for ivory over the past two decades. Similarly, the high fashion industry generates substantial demand for reptile skins (hotspots in Europe, the US, and China), and there is significant trade in live animals to be kept as exotic pets, such as cheetahs in the Gulf States, tigers in unlicensed US zoos, or parrots traded from Latin America and South Asia to Europe.

**An in-depth case study on the luxury pet trade can be found in section 7.1.**

Demand for endangered wildlife can drive up prices to exorbitant levels, particularly in luxury markets, which incentivises continued criminal involvement in wildlife trafficking. In Western Europe, for example, caviar tends to retail between €2,000 and €6,000 per kilo, ranging up to €25,000 per kilo for extremely rare varieties. Following the ban on sturgeon fishing in the Lower Danube Region, demand-side pressures simply increased due to ongoing demand for caviar, long-term and high investments needed to farm sturgeons, and the rarity of wild sturgeons, leading prices to skyrocket and driving the trade underground.

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Case study

### Cycad poaching and laundering in South Africa

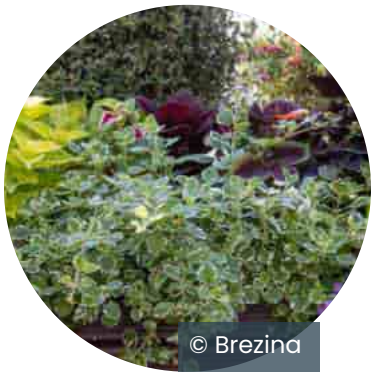
Cycads – the world's oldest seed plants, sometimes referred to as 'living fossils' – are one of the most endangered plant groups on earth. The ever-growing demand is often driven by wealthy plant collectors interested in planting rare cycads in their gardens – some of whom may misconceive their actions as 'protecting' these plants rather than contributing to their endangerment. While there is a legal market for cultivated cycad varieties, rare cycads – particularly those that are scarce in the wild and thus under threat – remain a desirable, expensive status symbol. Some specimens have sold for millions of pounds each. Notably, every single cycad confiscated by police in the Eastern Cape province of South Africa was on the IUCN Red List, indicating a clear demand for endangered species.

For a cycad of around a metre high, a collector could pay up to US$100,000. However, the risks associated with the illegal trade in plants tend to be comparatively low, with less media attention and protection from armed rangers, attracting dedicated 'cycad syndicates' to the illicit trade. The profit margins made by such criminals are lucrative; they may pay a local villager less than US$6 to extract a plant from the wild, subsequently selling it for thousands of dollars.

## 3.2.4 Medicinal goods

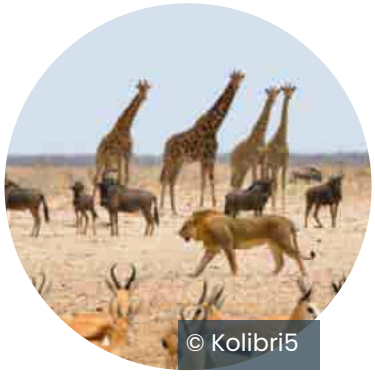
While estimates vary, approximately 50,000 plant species, 700 fungal species, and over 500 animal species are used for medicinal purposes globally, either in the form of basic herbal remedies or to develop modern pharmaceuticals – a quarter of which are adapted from traditional herbal medicines. While the consumption of flora and fauna for medicinal purposes is not always illegal, demand for some traditional medicines has contributed to IWT in endangered species.

~ 50,000 plant species



© Brezina

> 500 animal species



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~ 700 fungal species

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In focus

## Traditional medicine

Traditional medicine is defined by the World Health Organization (WHO) as "the sum total of the knowledge, skill, and practices based on the theories, beliefs, and experiences indigenous to different cultures [...] used in the maintenance of health as well as in the prevention, diagnosis, improvement or treatment of physical and mental illness". It has been an integral resource for many cultures for hundreds of years and continues to be recognised as a valuable source of evidence-based healthcare.

The critical medicinal benefits derived from plant genetic resources is well established; for instance, in the Convention on Biological Diversity. For example, Moderna used Digital Sequence Information – genetic information sequences from the natural world made available online for research – from respiratory viruses to develop its COVID-19 vaccine, which generated US$30billion in vaccine sales. While traditional and herbal medicines are often seen as separate, and in some cases antithetical to modern pharmaceuticals, around 40% of pharmaceutical products today have a basis in natural products, and many landmark drugs derive from traditional medicine and knowledge. Aspirin, contraceptive pills, malaria control drugs, and the smallpox vaccine all have roots in traditional medicine.

The vast bulk of traditional medicine treatments use plants and animals, of which endangered species and illegally trafficked wildlife products are only a small component. However, some high-profile industries such as Traditional Chinese Medicine (TCM), have been criticised for the use of products derived from pangolins, tigers, leopards, bears, and rhinos. There is increasing guidance from the authorities and within the industry on how to practice TCM without using products from endangered species. Elsewhere, 40% of illegal wildlife product seizures in Europe were of a medicinal nature – increasingly, derivatives of costus root, ginseng, seahorses, and king cobra – illustrating the global scale of the issue.

FIs are often caught up in enabling these practices. In 2023, for example, the Environmental Investigation Agency published a list of 62 banks and other FIs – many of them high profile Fortune 500 companies – that had invested in pharmaceutical groups manufacturing products that contain leopard or pangolin. Notably, many of these investors are public signatories to initiatives such as the Principles for Responsible Investment, which has publicly expressed concerns about issues such as biodiversity loss and species extinction.

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## 3.2.5 Enabling factors

### 3.2.5.1 Inconsistencies in regulation and weak governance frameworks

Illegal activities such as IWT are enabled when there is a lack of appropriate governance and regulation. In many jurisdictions, IWT is a low-risk activity, especially compared to other illegal contraband such as drugs or weapons, and is in some cases only punishable by a fine that is often a mere fraction of the potential profit. The proliferation of legal grey areas, grey markets and loopholes, facilitate the use of criminal concealment, fraud, and other techniques where illegal products can be easily passed off as legal. This provides further opportunities for IWT to thrive and increases the risks for FIs operating with international and regional markets, in a globalised society. Regulatory gaps are further exacerbated by corruption in many cases, with a 2016 UNODC report arguing that corruption is the most important enabling factor behind IWT.

In focus

#### The grey market

The term 'grey market' is used to refer to an area where legal and illegal commodity streams intertwine. Contraband goods are often disguised as and concealed within legal ones on the marketplace. While these practices often constitute criminal offences in many jurisdictions, they can be exacerbated by exploiting regulatory loopholes and legal grey areas. Authorities across the world are faced with tough decisions on how best to tackle IWT, but prohibition alone can force wildlife trade into underground markets where exploitation is rife, sustainable regulation is non-existent and dangerous conditions are prevalent. Yet legalising aspects of the trade, as much of the world has done, can also contribute to creating these grey markets, allowing criminals to blend legal and illegal trade, making it even harder to detect contraband goods, and exposing FIs to related risks.

The caviar economy provides a prime example. Caviar is harvested from sturgeons, which are classified as the most critically endangered group of species by the IUCN. There have been concerted national and international efforts to curb wild caviar harvesting. Over the last quarter of a century, sturgeon aquaculture facilities have boomed, providing a legal source of caviar for ongoing demand, while seizures of contraband caviar have declined dramatically. However, this does not mean that caviar harvesting from wild sturgeons has ceased, as cases of sturgeon poaching and caviar trafficking continue to be reported. It is difficult to distinguish wild caviar from farmed caviar, and the existence of a legal caviar market allows wild caviar to be labelled as farmed and thus legally sold. Consequently, poorly harmonised and enforced regulatory systems designed to protect wild animals can unintentionally provide avenues for criminal activity.

## 3.2.5.2 Enforcement difficulties

Even where there are clear regulatory guidelines and governance frameworks regarding IWT, they may be difficult to enforce due to issues such as a lack of capacity and resources, with IWT often seen as a low-priority issue. For example, despite enormous volumes of illegal goods travelling by sea, less than 2% of shipping containers are inspected. Furthermore, even where vehicles and ships are inspected, illegal wildlife may be hidden among other legitimate products, concealed in hidden compartments, or even mixed with look-alike species, which officers may not have the expertise to identify. Building the capacity to collect, collate, and analyse intelligence on IWT requires extensive investment and resources, that many agencies and countries do not have. These difficulties are exacerbated by the increased involvement of organised criminal groups in IWT, with armed groups reported to torture and kill park personnel that attempt to prevent wildlife poaching or illegal logging.

Furthermore, there may be exploitable loopholes that authorities have difficulties regulating (and FIs have difficulty mitigating against); for example, while eBay has banned ivory selling from its platform, many simply bypass the ban by listing genuine ivory as fake. On social media, wildlife traffickers have developed 'codewords' for illegal wildlife that make it difficult for moderators to identify and flag cases of IWT on online platforms. Correctly identifying criminal tactics and responding to them is thus a difficult and time-consuming task, especially given the agility of criminal operations, but such enforcement gaps further enable IWT.

## 3.2.5.3. Opportunism

IWT is enabled in situations where opportunistic hunters or traders can easily obtain valuable wildlife, for example where farmers find lucrative animals in traps set to protect their harvest, or where there is increased contact between human communities and wildlife, such as when illegal miners or loggers penetrate dense or protected areas of forest. This has been actively exploited by organised crime groups, with the emergence of online tutorials and videos explaining how to easily capture valuable species. Notably, in such cases, the poachers tend to receive the smallest share of the profits, with the product being marked up significantly towards the end of the supply chain.


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## 3.3 Impacts

### 3.3.1 Environmental impacts

#### Loss of biodiversity and ecosystem damage

By contributing to the overexploitation of certain species, IWT has significant negative impacts on global biodiversity. According to the Intergovernmental Science-Policy Platform on Biodiversity and Ecosystem Services (IPBES), species overexploitation – that is the unsustainable use and trade of wildlife – is the second biggest driver of global biodiversity loss, and it is estimated to affect 5,209 animal species classed as 'threatened' or 'near threatened' in the IUCN Red List. IWT may lead to the loss of genetic diversity in flora and fauna, behavioural adaptations in species, population decline and, in some cases, threats of extinction, drastically altering ecosystems. The economic reality of IWT is that it is frequently a self-perpetuating cycle: as numbers of illegally traded species deplete, prices balloon, which in turn incentivises traders to continue sourcing these high-reward species. Furthermore, the trade in wildlife – especially on the black market – serves as a key introduction pathway for invasive species that compete with, and sometimes decimate local populations – costing at least US$160 billion annually.

IWT is also a serious driver of illegal deforestation and associated biodiversity decline in the world's remaining forests. Wild rosewood – which accounts for 30-40% of global IWT in plants – has declined by around 90% in Southeast Asia, for example, and logging can dry out forests, leaving them vulnerable to fires and desertification. Furthermore, poaching has led to declines of 58% in bird populations and 83% in mammal populations in hunted forests, with significant negative impacts for forest ecosystems.

Case study

#### Poaching and ecosystem alteration

Animal poaching can have dramatic effects on ecosystems. The 'Empty Forest' phenomenon, for instance, refers to the extinction of large animals in forests where the vegetation still appears intact. The removal of species – particularly keystone species that have outsized impacts on their local ecosystems – has the potential to completely reshape how existing ecosystems function. Beavers, for example, were hunted to extinction in the UK for their fur and its natural secretion, castoreum, leading to the loss of boggy landscapes that were created by beaver dams, which help to reduce downstream flooding, increase water retention, and filter out water pollutants.

On the other hand, the (sometimes accidental) introduction of species from IWT can also wreak havoc on local ecosystems. IWT has a high risk potential for releasing invasive species: an estimated 18% of illegally traded reptiles in Australia are likely to become invasive if they escape. In the US, the introduction of the Burmese python – suspected to be linked to the illegal pet trade – has been associated with the decline of several native and endangered species. The risks of catalysing potentially catastrophic ecosystem alterations should be considered by FIs that either host or finance activities that may be exposed to IWT.

### Animal cruelty

IWT is associated with high levels of mortality as well as cruel poaching or transportation practices. If only parts or derivatives of animals are desired, poaching methods tend to be more ruthless, as poachers have little need to keep the animal alive. Rhinos, for example, are sometimes tranquilised by poachers before their horn is hacked off, leaving the animal to die from blood loss or infection in the wound. Shark finning and the extraction of bear bile – just to cite a few – are other notable examples of animal cruelty linked to IWT.

**An in-depth case study on the bear bile trade can be found in section 7.2.**

Even for live animal trading, mortality rates in illegal trade are exceedingly high, reflecting poor conditions during trapping, transportation, and in captivity. For instance, mortality rates of up to 90% have been recorded for African grey parrots during transportation and 75% of exotic reptiles die within their first year of captivity. This also incentivises poachers to capture larger numbers of animals than required to account for this expected loss further down the line, increasing population pressures on these species even more. The poaching process often results in collateral death or injury to animals beyond those being targeted, especially in social animals that operate in packs, flocks, or herds. For every baby chimp that becomes a victim of illegal trade, an average of 10 chimps are killed in the process.

### Zoonotic diseases

The WHO locates the origin of an estimated 61% of known human diseases – and 75% of emerging infectious diseases – in animals, with notable examples including Ebola, SARS, anthrax and bubonic plague. Lack of regulation over the legality of wildlife trade results in very few, if any, veterinary screenings, quarantines, or hygiene standards, meaning that diseases and pathogens can easily spread from trapped wildlife. Consequently, IWT can inadvertently introduce emerging infectious diseases in humans, with potentially catastrophic and widespread health impacts. While IWT does represent a risk of zoonotic disease transmission, it should be noted that 99% of all human cases of disease from zoonotic disease come from domestic animals and their products within human-dominated environments (for example, through contact with livestock).

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## 3.3.2 Social impacts

### Violence and conflict

While authorities are increasingly cracking down on IWT, the trade remains lucrative. This has led to violent encounters between wildlife officers and poachers across the world, with a recorded total of 2,351 wildlife ranger deaths between 2006 and 2021, over 80% of which were in Africa and Asia. Of these deaths, homicide is the leading cause, and rangers have been reported to experience higher degrees of post-traumatic stress disorder than the average population. Furthermore, the increasing militarisation of both poaching and conservation efforts can potentially risk the endangerment of local communities, although rangers and park staff are often armed out of necessity for their own protection, rather than for offensive measures.

Case study

#### Physical risks to wildlife protectors in Sri Lanka

In an analysis of wildlife ranger fatalities in Sri Lanka between 1949 and 2020, researchers recorded 80 deaths – at least one a year. They found that most casualties occurred in protected areas, with homicides accounting for 64% of total deaths. Excluding a terrorist massacre in 1985 that led to 24 casualties, the most significant current risk to rangers aside from encounters with wildlife – namely elephants – are poachers. Notably, attacks by wildlife criminals engaged in IWT have been slowly but steadily increasing since 2010.

## 3.3.3 Economic impacts

### Loss of resource base

According to the World Economic Forum, US$44 trillion of economic value globally relies on nature and its services. Exploitation of natural resources for the purposes of IWT can undermine the long-term sustainability of the natural resource base upon which many local communities and regional economies depend, diverting revenue away from legitimate channels (approximately 800 million people in the rural tropics are dependent on wildlife for long-term food and livelihood security, for example). Loss of wildlife populations can also limit opportunities for local economies to develop wildlife tourism industries.

### Governance harms

The World Bank estimates that on average, governments lose US$15 million of tax revenues annually due to IWT. This diversion of resources perpetuates poverty and instability, weakening both the rule of law and long-term economic prospects. IWT can also indirectly play a part in destabilising governments via the willingness of organised crime groups to use violence, extortion, and corruption to gain economic benefits. This compromised governance environment can undermine investor confidence and deter investment by signalling an unstable or high-risk business climate, further hampering economic growth and development, especially in the vulnerable areas that may need it most – thereby also impacting FIs' business activities in such regions.

# 4. IWT – A View From The Financial Sector

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The financial sector has a key role to play in tackling environmental crimes such as IWT. FIs have the power – and, indeed, are widely obliged – to monitor, identify, and report suspicious transactions. Consequently, they have the distinct ability to hold entities to account, and to assist law enforcement in detecting and disrupting criminal activity. However, FIs continue to play a relatively under-realised role in tackling environmental crime. As such, it is important to better understand the landscape for the financial sector in relation to IWT, in terms of awareness, risks, controls and governance, so that this vast potential can be better harnessed.

## 4.1 Methodology

This report contains results from an original survey on environmental crime with a specific focus on IWT. The questionnaire – which was built using the insights from a previous survey included in the 2024 joint report by WWF and Themis (hereafter the land conversion report) – examines organisational approaches, perceptions of risks, and responses. A total of 829 professionals from FIs in 22 countries responded to the survey.[3] The geographical scope and the sampling were informed by desk-based research, giving priority to well-known financial hubs and main source, destination or transit regions for IWT. Following a preliminary round of quality control, 647 responses were considered valid and used for data analysis.

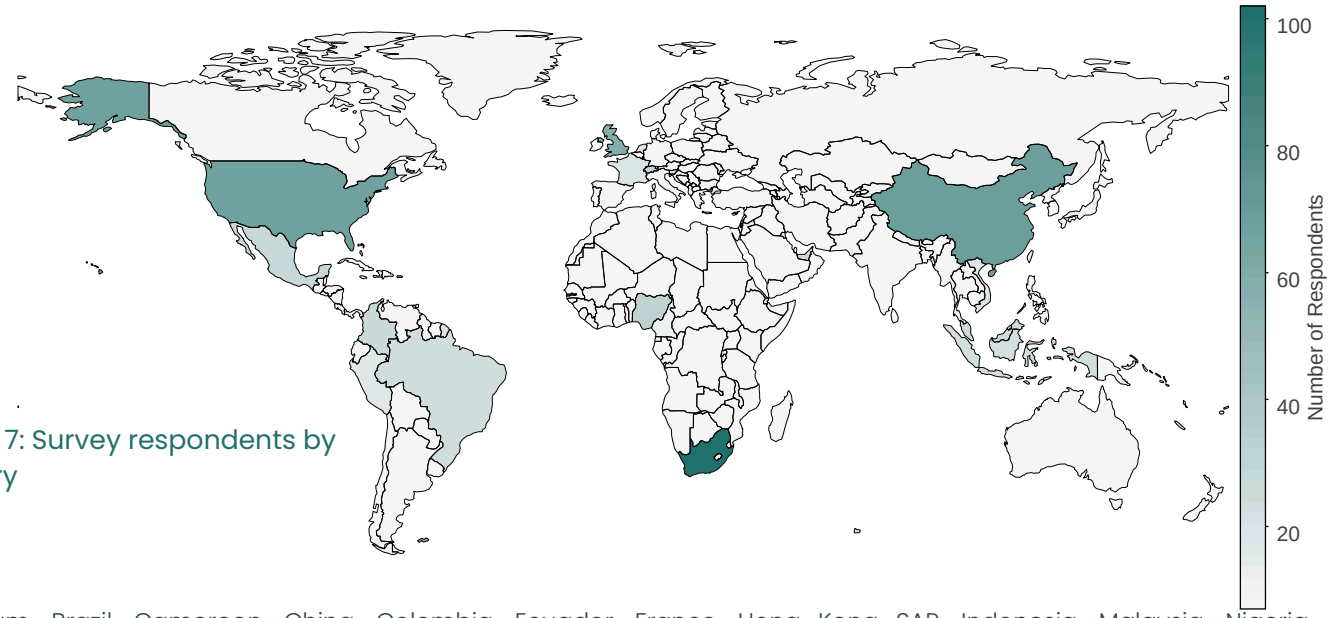


Figure 7: Survey respondents by country

3 Belgium, Brazil, Cameroon, China, Colombia, Ecuador, France, Hong Kong SAR, Indonesia, Malaysia, Nigeria, Singapore, South Africa, Switzerland, The Netherlands, the United Arab Emirates, the United Kingdom, the United States, Vietnam, Peru, Mexico, Taiwan.

## 4.2 The landscape: Financial institutions' exposure to risk

To understand the role of FIs in the landscape of environmental and financial crime, it is important to first understand their exposure to risk. This section outlines respondents' business activities in sectors widely understood to be high risk for IWT, **finding a significant FI presence**.

**Overall, 81% of respondents indicated that their organisation operates in at least one high-risk business area for IWT**, with travel and ecotourism and transportation at the top, listed by over a third of respondents as business activities for their organisation. FIs' overall exposure to transit-related risks is exacerbated by the prominence of FI activity in sectors that are secondarily linked to the transit of IWT products,[4] which were selected by 32% of respondents. Furthermore, the risks faced by FIs extend beyond the transit sector, including industries that deal directly in with live animals, which were listed by 27% of respondents, as well as a wide range of other business areas nominated by between 10% and 20% of respondents. **The data suggests that surveyed FIs' risk exposure is predominantly related to the transit of goods, but exposure to wildlife sourcing end-use activities is not negligible either**.


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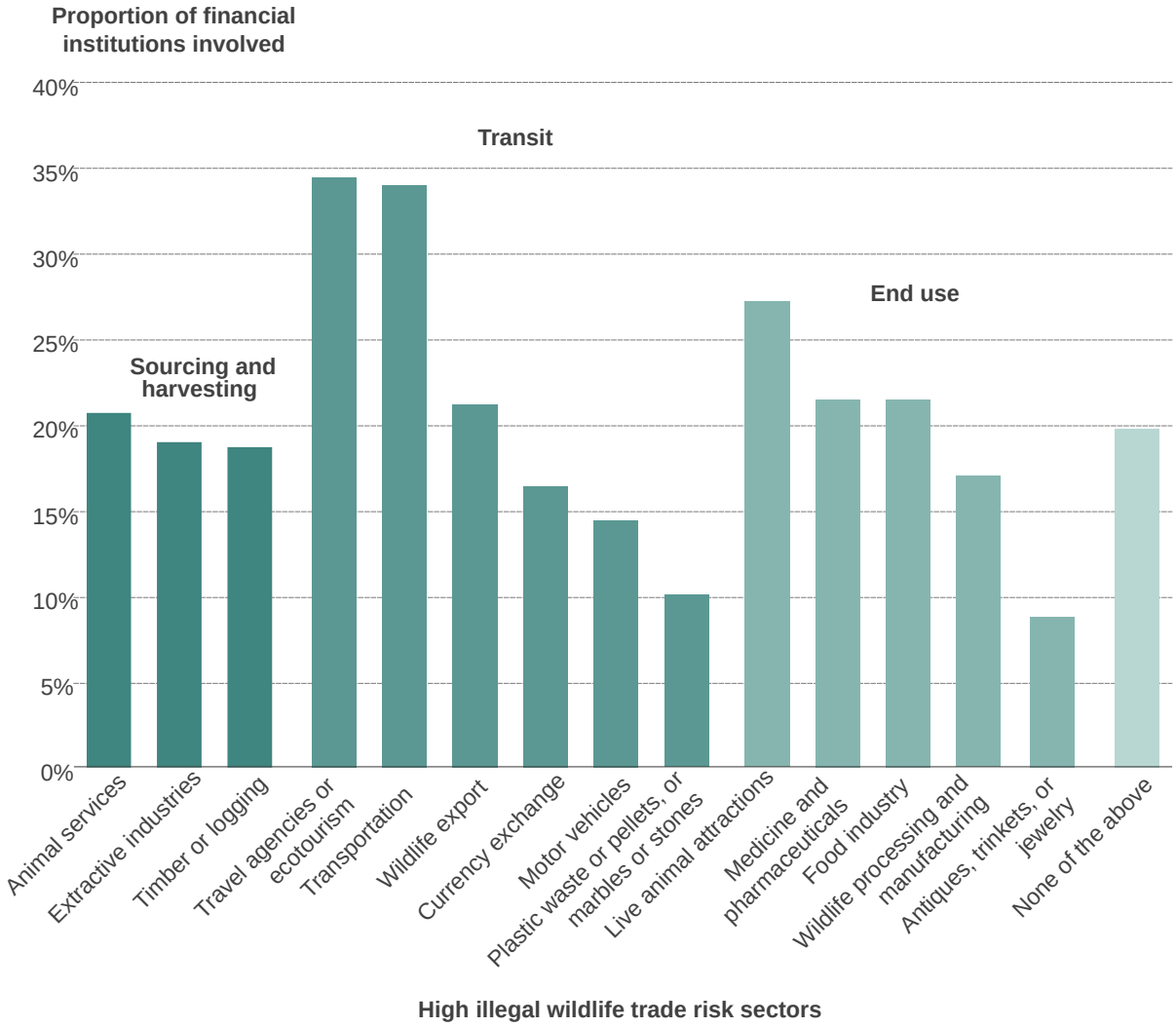
[4] E.g. timber or logging; plastic waste or pellets; marbles and stones; motor vehicle spares or second-hand car parts.

Figure 8: Respondents' business activities in high risk IWT sectors[5]

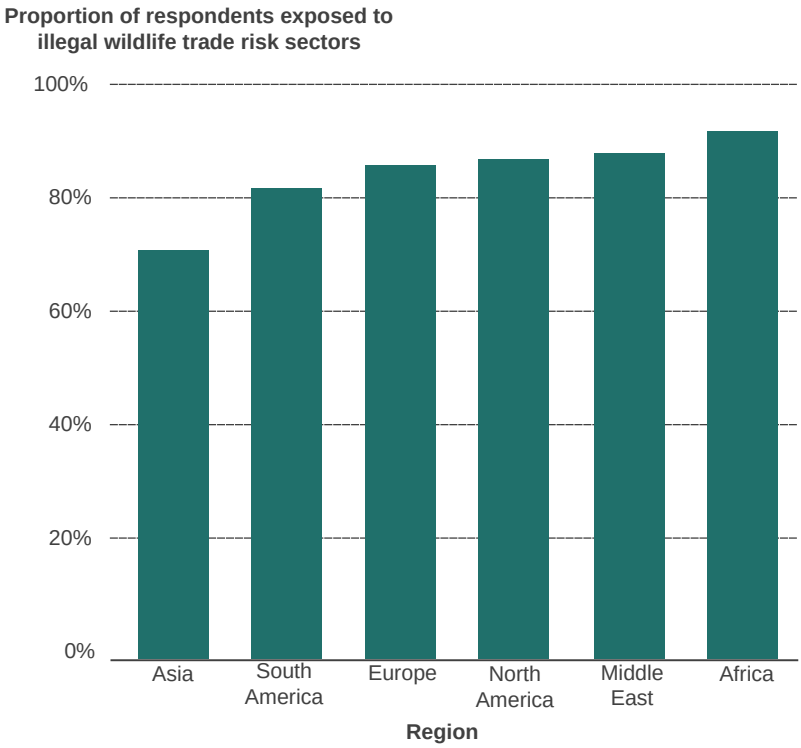



The high levels of FI involvement in the transportation and transit sectors constitutes a key risk given the high mobility of IWT products – especially when combined with the estimate that 90% of global trade is seaborne, where less than 2% of containers undergo inspection. Despite these low levels of oversight, seizure volumes are still vast; seizure data from 2015 to 2021 documents IWT in 162 countries, seizures of around 4,000 plant and animal species (approximately 3,250 of which were CITES-listed), and the confiscation of 13 million individual items, weighing over 16,000 tons.

[5] '**Transportation and transit**' includes import-export companies, freight forwarding, customs clearance, cargo, shipping or logistics providers, companies dealing in wood or plastic pallets, etc.
'**Medicine and pharmaceuticals**' includes: medical testing facilities or pharmaceutical/medicine products, traditional medicine providers/manufacturers or clinics, companies involved in sourcing, importing or exporting traditional medicinal herbs or animal products for pharmaceutical use, research institutions studying the integration of traditional medicinal herbs into modern pharmaceuticals, etc.
'**Live animal attractions**' includes: game lodges, wildlife reserves, safari parks, zoos, exotic pet providers or traders, etc.
'**Animal services**' includes breeding farms, ranches, veterinary services, etc.
'**Wildlife processing and manufacturing**' includes: furniture production companies, fashion and furniture companies that deal in fur, leather manufacturers, producers or importers.
'**Motor vehicles**' includes: Companies dealing in motor vehicles spares or second-hand car dealerships.

The combination of the high mobility of IWT products and low oversight in the transportation sector means that FIs operating in or with this space are inevitably exposed to IWT risks. Indeed, this sea trade represents a high risk for FIs providing shipping insurance. During a focus group held for the Land Conversion Report, participants from FIs discussed the risk of deforestation-related products – which can also include IWT products – transiting on ships of companies they insured or provided credit for. They highlighted that they are rarely privy to what cargo these ships are carrying, exposing them to the possibility of insuring the transit of illegally derived products of environmental crime. There were slight differences in regional exposure to IWT risk. Respondents from Asia reported the lowest rates of IWT risk exposure, with 72% of respondents stating that their organisation was exposed to at least one high risk IWT sector. This number rose to 93% for Africa.

Figure 9: Financial institutions' exposure to high-risk IWT sectors by region



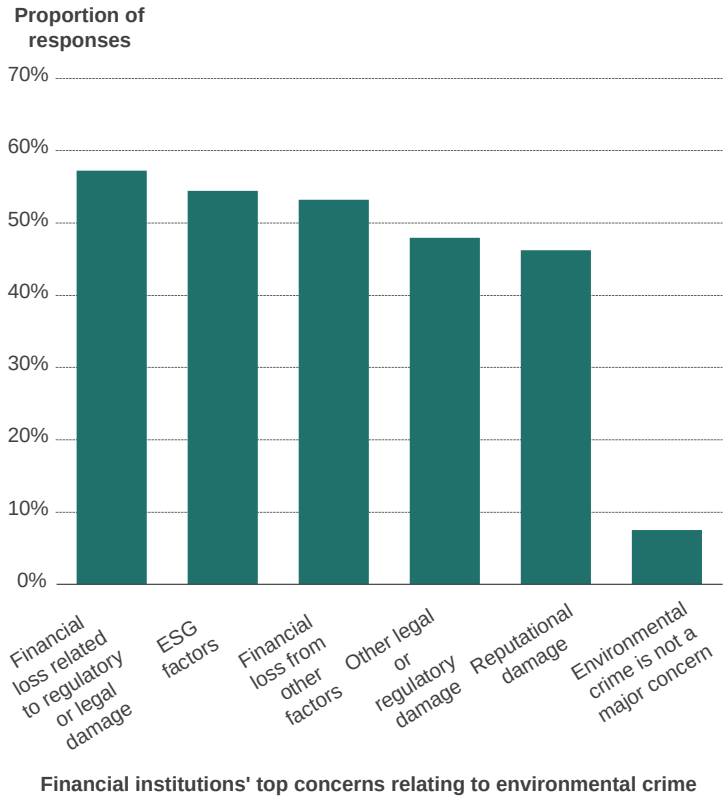

## 4.3 Understanding of risk

FIs face significant exposure to IWT risks through their business activities, but this exposure does not always correspond directly to levels of recognition, understanding, or action. This section examines respondents' perceptions of their exposure to IWT risks, finding that while most respondents have a broad awareness of the risks posed by exposure to environmental crime, many lack specific understandings of targeted IWT risks and regional risk profiles, and their perceptions of key risks do not always align with broader understandings of typologies and red flags.

### 4.3.1 Recognising and characterising risk

**Encouragingly, most FIs recognised the potential risks posed by environmental crime, with only 8% of respondents stating that it is not a major concern to their organisation.** In terms of specific concerns, the material risk posed by the potential financial loss due to regulatory or legal fines was most prevalent for FIs (57%). Although reputational damage was indicated as a lower concern in and of itself (46%), it can also lead to financial losses due to stock depreciation, shareholder revolt or consumer boycotts. The high percentage of FIs also expressing concern over 'financial loss related to other factors' beyond regulatory/legal fines (53%) suggests that many are aware of the indirect financial impacts of being linked with environmental crimes.

Figure 10: Respondents' top concerns about environmental crime




FIs' high levels of concern with financial loss can be read alongside an increasingly strict regulatory environment regarding anti-financial crime controls more widely, with the volume of fines levied by global financial regulators rising every year. Indeed, in the first half of 2024 alone, regulators across Europe, the Middle East, Africa, North America, and the Pacific fined FIs over US$260 million for non-compliance with AML regulations – a US$59 million increase on the same period the previous year. Banks were by far the most sanctioned type of institution, receiving a US$136 million portion (52%) of the fines.

This trend was particularly pronounced in the Asia-Pacific region, which saw a 266% year-on-year increase in fines as well as in penalties for transaction monitoring and SAR breaches, which increased five-fold from H1 2023 to H1 2024 to US$30.5 million. While Africa and South America – notable environmental crime hotspots – are yet to see the same volume of fines levied upon FIs, there have been some notable outliers, such as South Africa, which was grey listed by the FATF in 2023 and consequently increased regulatory pressure upon FIs.

The impacts of these fines stretch beyond the immediate penalty. A 2021 academic study of 308 FIs in the US examined how AML enforcement actions and economic sanction violations affect a firm's value, and found that FIs' operating efficiency or governance is unable to fully compensate for the adverse valuation effect of a civil money penalty violation.

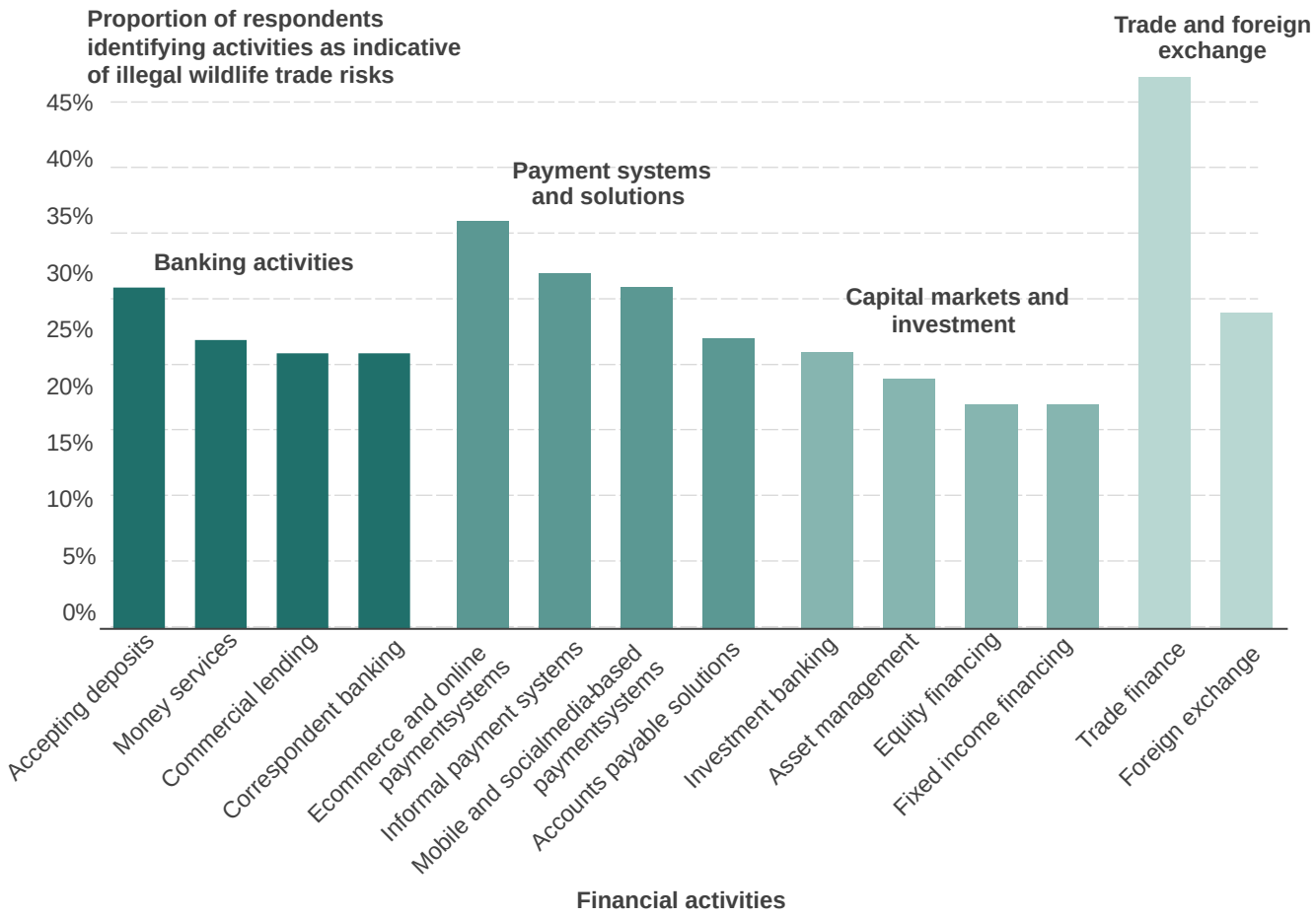
While environmental crime penalties remain low – IWT violations, for example, are often capped at approximately US$10,000 – their common convergence with financial crimes means that the material risks for FIs are much higher than those posed by environmental penalties alone. **This suggests that financial loss is a powerful motivator that can encourage FIs to tackle environmental crimes**.

Furthermore, firms might also be motivated by financial gain rather than simply the avoidance of financial loss. Research findings increasingly suggest that strong ESG frameworks – for example, having a comprehensive environmental crime policy in place – are strongly correlated with profitability. With governments and regulatory bodies around the world increasingly mandating ESG disclosures and consumers prioritising ESG factors in their purchasing choices, FIs' approaches to environmental crime issues are likely to become ever more entwined with their financial performance.

## 4.3.2 Perceptions of high-risk business activities

Corresponding with FIs' exposure to transport-related risks, respondents highlighted trade finance as the perceived highest risk business activity for IWT by a comfortable margin. This is shown in Figure 10, which outlines the activities that respondents consider most vulnerable to financial crimes linked to IWT. **Notably, while all options can be considered high risk for IWT, no single option attracted more than 55% of responses, suggesting that respondents may not have a comprehensive understanding of high-risk IWT business activities and that multiple risks and vulnerabilities may coexist at the same time.**

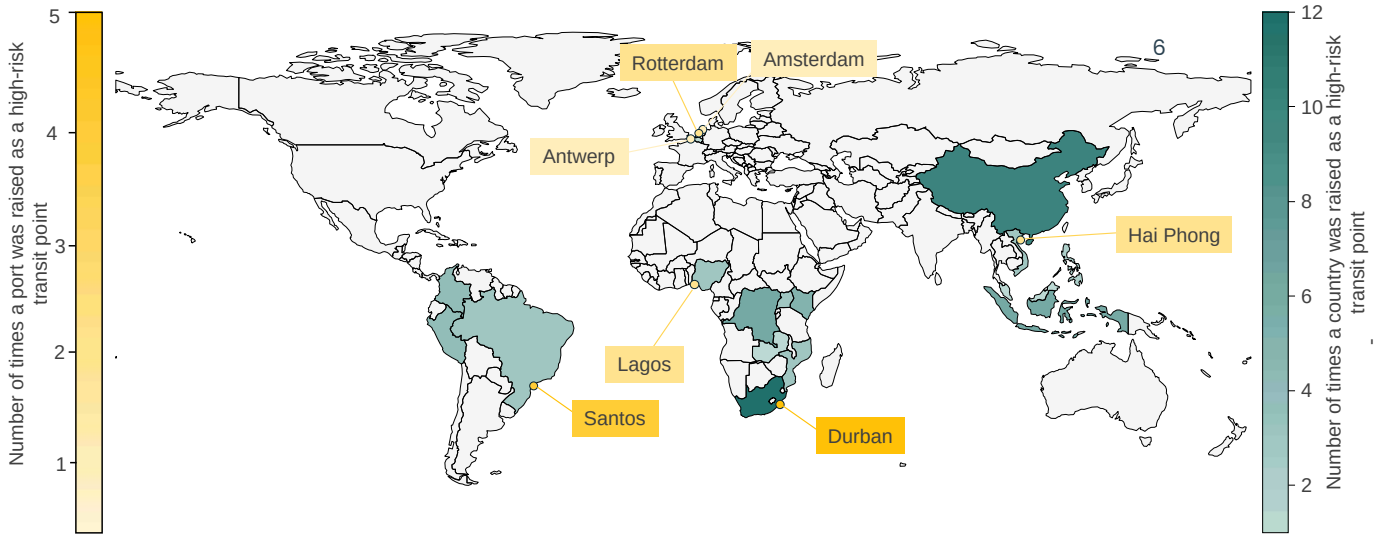
Figure 11: Financial activities indicative of IWT risks as perceived by financial institutions




## 4.3.3 Perceptions of high-risk routes, hubs, and regions

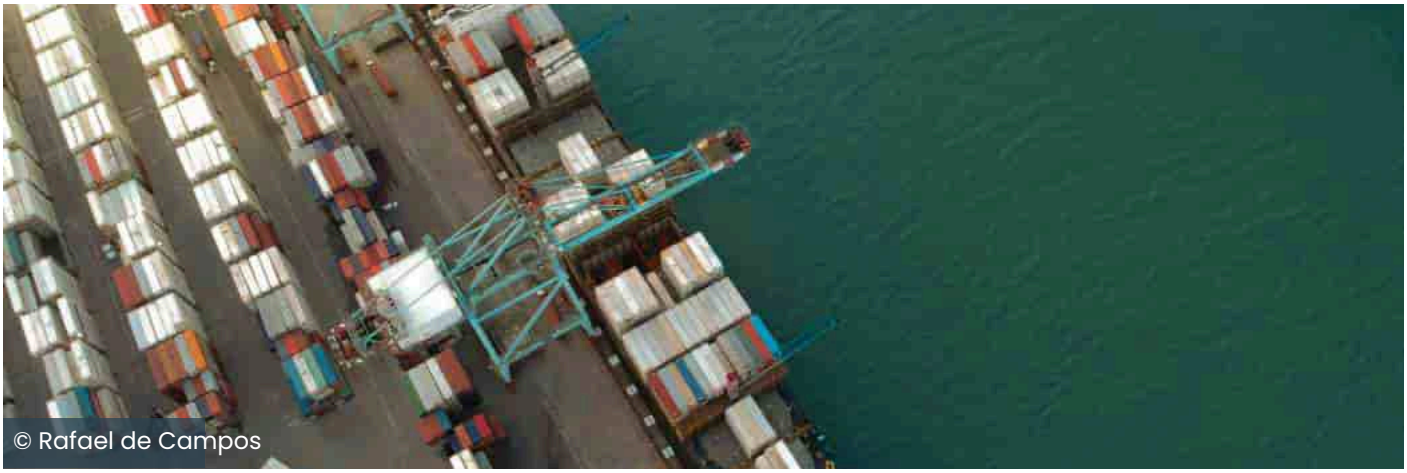
The following map presents respondents' perceptions of high-risk transit hubs and hotspots for IWT.

Figure 12: High-risk IWT transit ports and countries as perceived by financial institutions[6]




Respondents identified some of the key transit points for IWT products that are detailed in existing literature, for example, southern Africa, southeast Asia, and western Europe. It is encouraging that some respondents listed specific ports, reflecting deeper understandings of the precise transit points through which illicit commodities may travel.

However, while all responses correspond with current research around the trafficking of wildlife products, just two specific African ports, and a single Asian port were listed.[7] This may be due to the geographic distribution of respondents and/or the geographic distribution of their business activities. **However, it might also suggest that FIs may require a deeper knowledge of specific trafficking and transit routes, particularly given their high levels of exposure to transit-related risks.**[8]

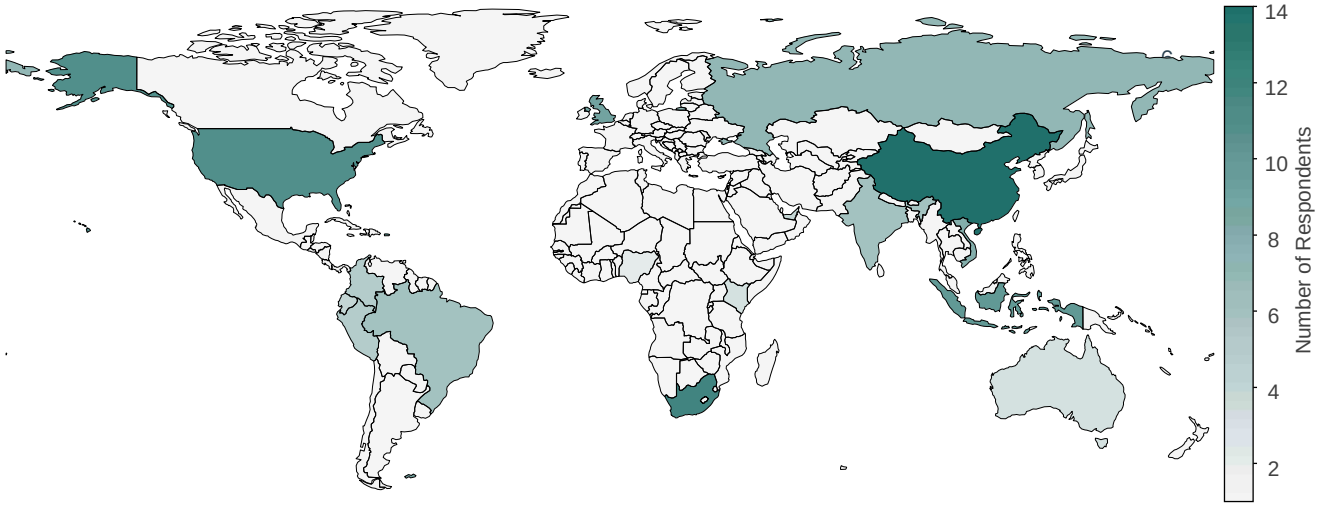

© Rafael de Campos

6 Survey respondents answered this question with both IWT and illicit mining risks in mind.
**Countries listed included:** Belgium (1), Brazil (3), China (10), Colombia (4), DRC (6), Indonesia (6), Kenya (5), Malaysia, Mozambique (3), Nigeria (3), Peru (4) Philippines (2), Singapore (3), South Africa (12), Tanzania, (5) Vietnam (3), Uganda (3), Zambia (1).
**Ports listed included:** Amsterdam (1), Antwerp (1), Durban (5), Hai Phong (2), Lagos (2), Rotterdam (2), Santos (4)

7 Noting that FIs were invited to submit their thoughts on high-risk routes, hubs and regions but that this was an optional rather than a required field.

8 Noting that the survey was not targeted specifically at teams or roles within FIs that might be expected to have this higher knowledge of trade routes and ports (e.g. compliance teams). Respondents were selected as working in the financial sector more widely, as the survey aimed to understand general awareness and approaches across the industry.

Figure 13: High risk IWT regions as perceived by financial institutions [9]

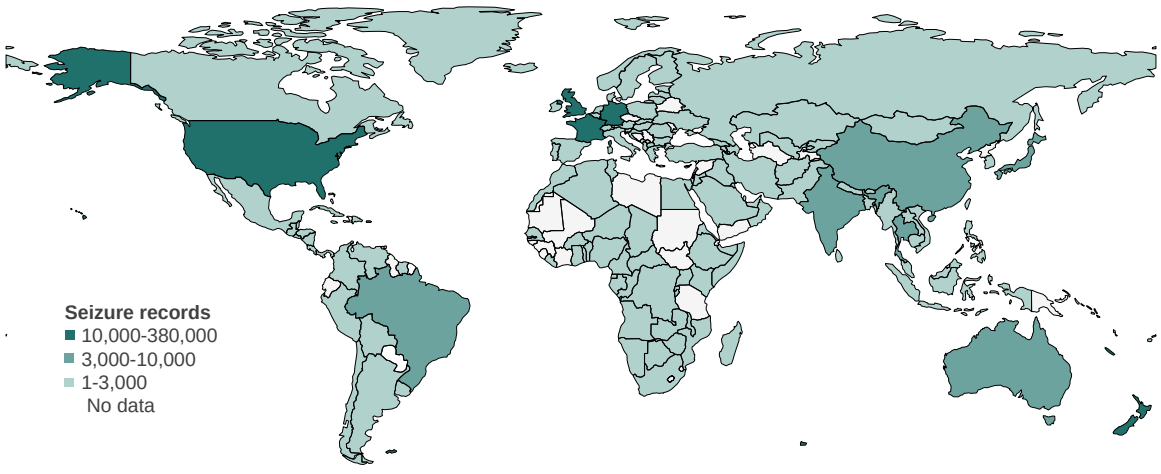



Multiple respondents broadly identified Africa, Asia, and Latin America as high-risk areas for IWT, as well as some notorious hotspots such as Indonesia and South Africa. However, some well-documented countries for IWT were conspicuous by their absence. Kenya, for example, is a notable omission as both a key source and transit point in east Africa, though nearby countries with similar risk profiles, such as South Africa and Tanzania, were identified by respondents. **Respondents appear to be aware of IWT risks for broader regions and continents, but they lack a more in-depth knowledge of IWT dynamics at the national and subnational level.**

**Respondents' perceptions of high risk IWT regions appear in-line with existing reports, for example, from the UN and TRAFFIC. Overall, respondents' awareness relates strongly to the high-profile ivory trade, with many respondents identifying countries in Africa and Asia as both transit hubs and high-risk regions.** Similarly, hotspots in the substantial illegal rosewood trade – for example, Mozambique and China – were identified by respondents.

There are, however, some notable omissions: New Zealand, the US, Japan, and Western Europe are all IWT seizure hotspots, as illustrated in below, and Western Europe is a large consumer of IWT products. **The perception of high-risk regions for IWT is predominantly associated with highly biodiverse source countries, with less recognition of the regions that drive demand and consumption.**

Figure 14: Number of seizure records per country/territory 2015–2021 (Source: UNODC)




[9] Countries listed included: Australia (3), Bangladesh, Brazil (3), Cambodia (2), China (12), Ecuador (2), India (5), Indonesia (6), Malaysia, Mozambique (2), Nigeria (2), Peru (2), South Africa (5), Tanzania (3), Vietnam (7).

## 4.4 Financial institutions' responses to IWT risks

This section looks at the measures taken to address IWT risks. As previously noted, 81% of respondents represent organisations that are exposed to at least one high-risk IWT business activity. However, many FIs surveyed have not taken a corresponding level of action to address these risks.

None of the risk mitigation actions shown in the figure below were implemented by more than 60% of risk-exposed FIs, despite the vast majority of respondents being exposed to high-risk sectors. Indeed, 40% of the respondents who indicated exposure to a high-risk IWT sector represented organisations that do not screen for these risks, 52% do not have policies on IWT, and 50% do not have internal training on IWT.

This indicates a vulnerability across the financial sector, if around half of FIs operating in high-risk business areas are doing so without the corresponding and proportionate level of risk controls, governance or mitigation. This is in line with findings in from the land conversion report which found that almost half of FIs sampled reported operating with or in high-risk sectors or areas for land conversion and deforestation, yet over a quarter said they did not undertake specific related due diligence.

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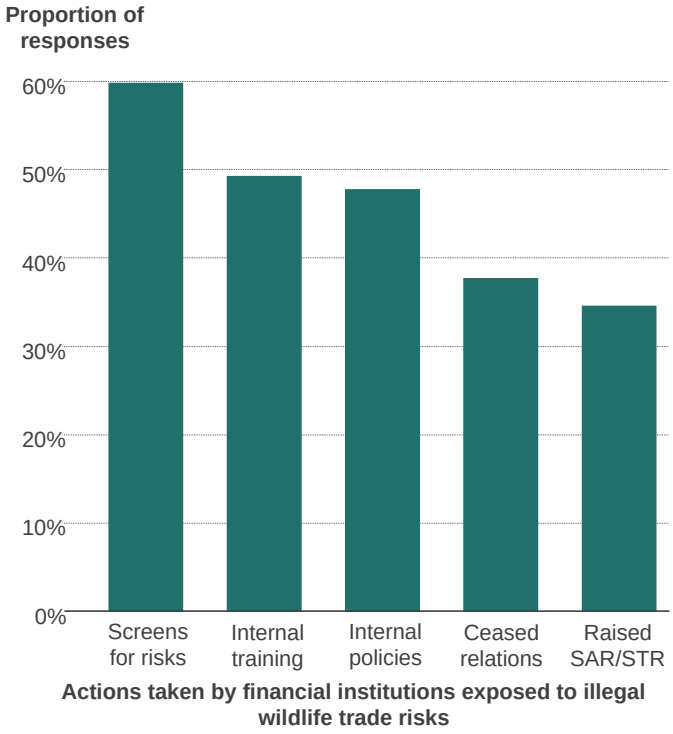
Figure 15: Actions taken by financial institutions in response to IWT




It's possible that this is attributable to organisational barriers. Data collected from a focus group for the same report, for example, suggested that departmental silos and a lack of clarity over where the risk sits within an organisation, combined with insufficient internal prioritisation, can contribute to a lack of investment into responsive governance frameworks.

When compared with findings from the land conversion report, there are some interesting differences between respondents' approaches to different environmental crimes. For example, the results of this survey found that approximately 50% of respondent FIs had implemented internal policies or trainings for IWT. However, in the land conversion report, only a quarter of respondents had internal policies, and only a fifth had training on land conversion and deforestation. While these results were gathered from different samples, it may suggest FIs are more concerned with, or aware of, IWT.

## 4.5 Factors that shape financial institutions' responses to IWT risks

The following sections delve into the different factors that may influence organisational action.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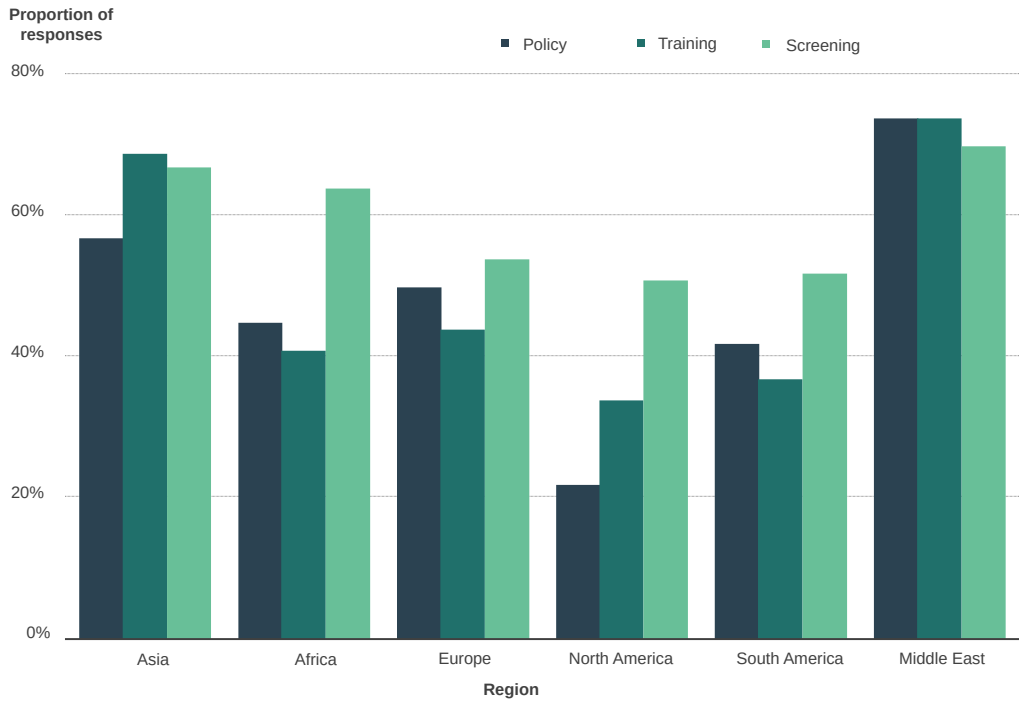
## 4.5.1 Regional risk profiles

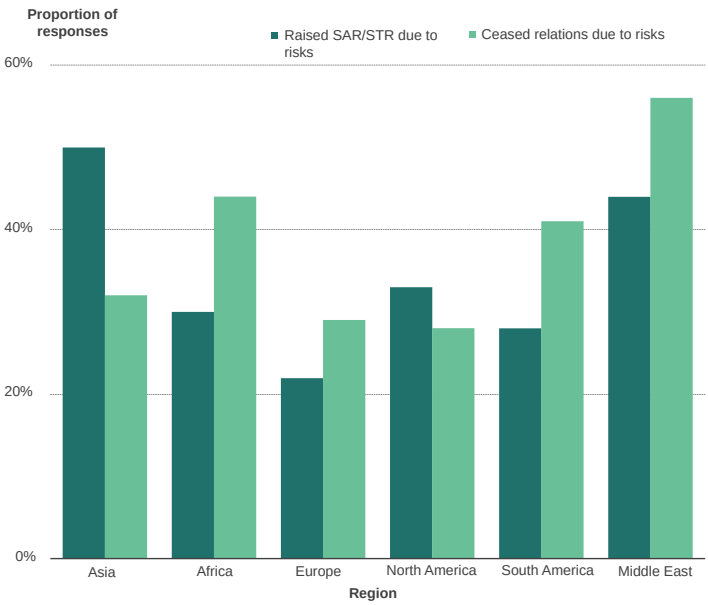
Figure 16: Risk mitigation actions taken by financial institutions in response to IWT by region




The number of respondents that reported their organisation as having raised a Suspicious Activity Report (SAR) or a Suspicious Transaction Report (STR) in response to IWT risks varied across regions. Africa, Europe, North America, and South America all had fewer than 35% of respondents reporting that their FI had raised a SAR or STR in response to IWT risks, which rose to 44% for the Middle East and 50% for Asia. Europe reported the lowest rates of SAR/STRs raised, and the second lowest rate of ceasing business relations due to IWT risks – despite being a hotspot for IWT imports (comparable to Asia, for instance, in terms of seizures).

Notably, respondents from some regions were more likely to state that their FI had raised SARs/STRs in response to IWT risks (Asia, North America), while others were more likely to report having ceased business relations (Africa, Europe, South America, Middle East). This may reflect different preferences in different regions, or the relative administrative ease or burden of filing reports.

Figure 17: Actions taken by financial institutions in response to IWT risks by region

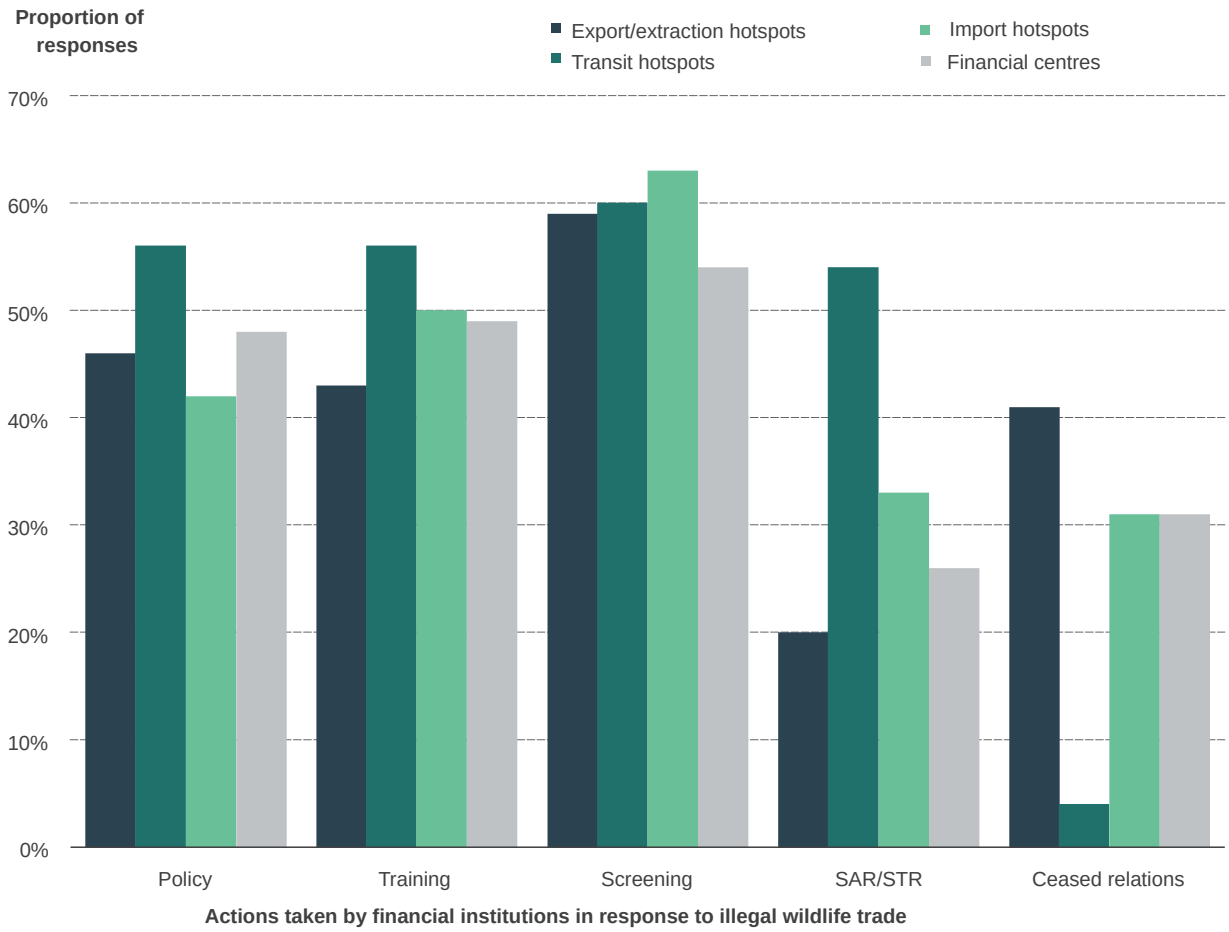


When broken down further into the type of region as regards IWT – export hotspots, transit hotspots, import hotspots, and financial centres – additional trends can be seen. **Rates of filed SARs/STRs were significantly lower in export and source hotspots, for example, potentially because these regions have less capacity to conduct financial investigations or monitor risky transactions. Existing data suggests IWT source countries tend to be poorer than IWT destination countries**.

Financial centres and import hotspots reported overall lower rates of action in response to IWT risks. **Financial centres and import hotspots, despite being exposed to IWT, may perceive themselves as being lower risk, as they are further away from high-profile poaching and hunting activities characteristic of source countries**.

Another notable result is that respondents situated in transit hotspots were extremely unlikely to report ceasing business relations due to IWT risks, despite having relatively high rates of internal policy adoption, screening, and submission of SAR/STRs.

Figure 18: Actions taken by financial institutions in response to IWT by regional risk profile [10]

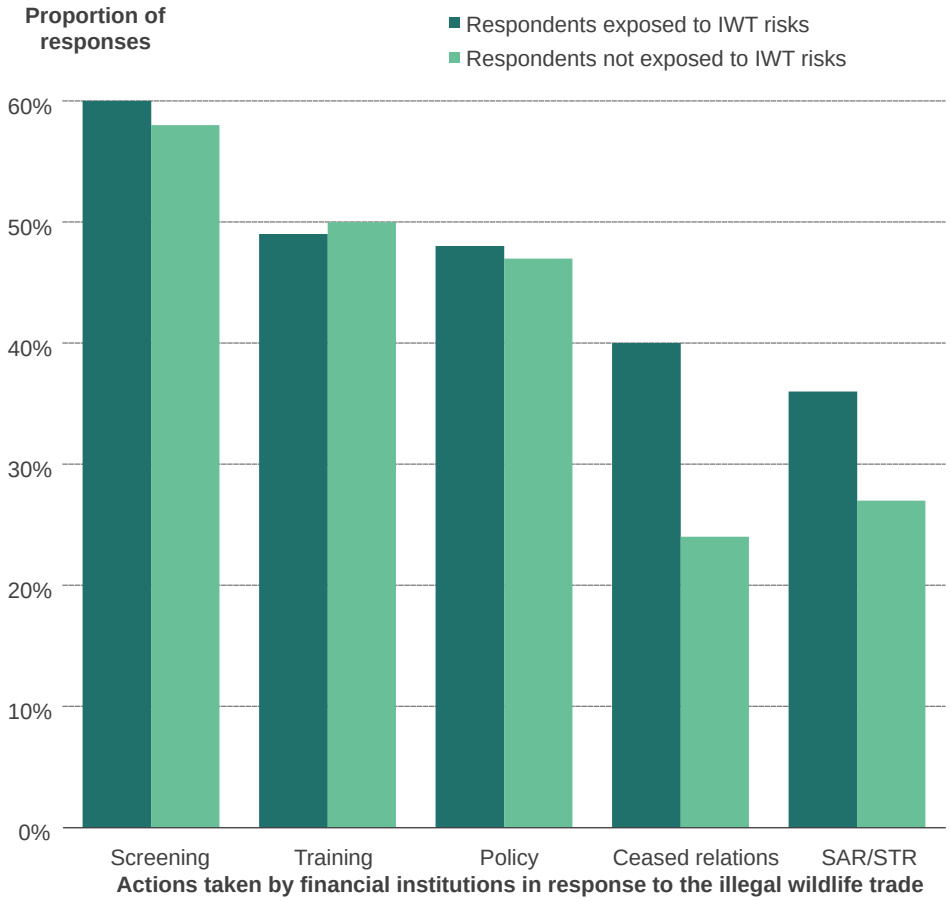



[10] **Export/extraction hotspots:** Brazil, Cameroon, Colombia, Ecuador, Indonesia, Malaysia, Mexico, the Netherlands, Nigeria, Peru, South Africa.
**Transit hotspots:** Brazil, Hong Kong, Indonesia, Singapore, Vietnam.
**Import hotspots:** China, France, UK, US.
**Financial centres:** Hong Kong, Singapore, Switzerland, UAE, UK, US.

## 4.5.2. Risk exposure

**FIs' responses to IWT risks overall are incommensurate with their risk exposure, but there remains a correlation between risk exposure and action**. While FIs screen for IWT risks and implement internal policies and training at roughly the same rates regardless of risk exposure, those that are exposed to at least one high-risk IWT industry are more likely to take responsive action to IWT risks - for example by ceasing business relations or raising SARs/STRs. **Given that the adoption of internal preparedness measures – screening, training, and policy implementation – is roughly similar across FIs surveyed, it is possible that the higher rates of action from more highly exposed FIs is due to them being faced with a higher volume of IWT risks, rather than due to them being better prepared to identify and respond to them**.

Figure 19: Actions taken by financial institutions in response to IWT by risk exposure




**Overall, at least 40% of respondent FIs surveyed are not implementing internal actions to bolster their internal capacity to address these risks, regardless of whether they are exposed to high risk IWT industries.**

## 4.5.3 Awareness

Overall, FIs self-reported a high level of awareness of risks linked to environmental crime,[11] with only 25% of respondents stating that their organisation's awareness was moderate or weak.[12]

Figure 20: Financial institutions' awareness of financial crime risks linked with environmental crime

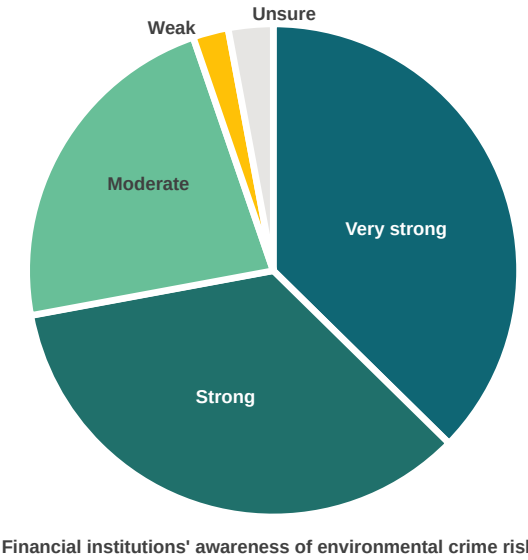
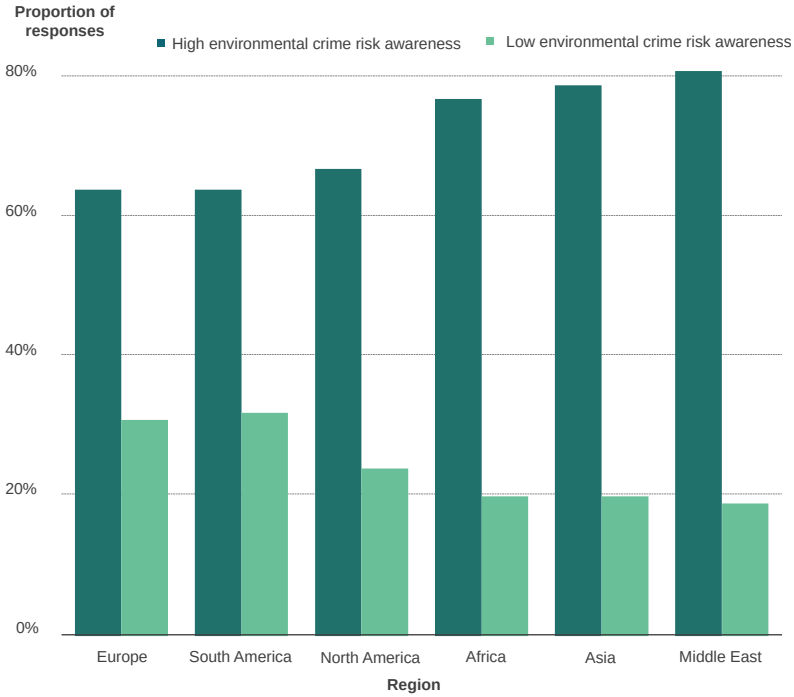



Figure 21: Financial institutions' awareness of financial crime risks linked to environmental crime by region[13]




There are subtle regional differences in risk awareness, with only 64% of respondents in Europe and South America stating that they had a strong or very strong awareness of financial crime risks linked with environmental crime. At the other end of the spectrum, this ratio rises to 81% of respondents in the Middle East.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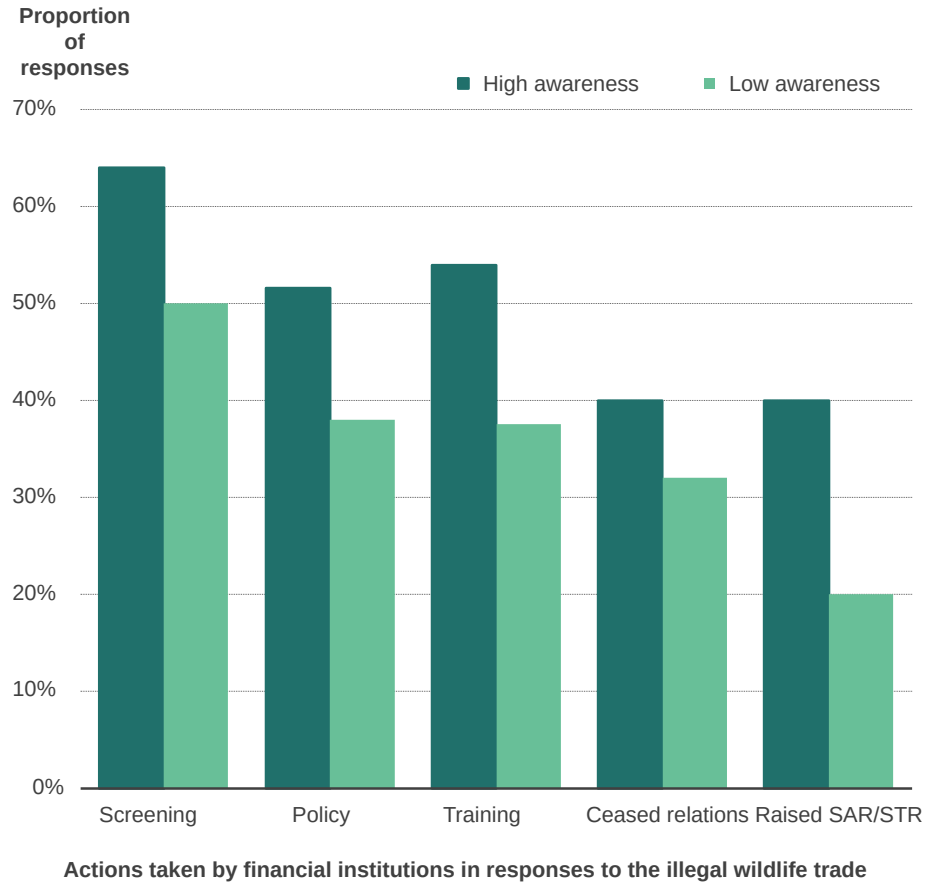
11 Participants were specifically asked about their awareness of risks related to environmental crime as an overarching category rather than IWT and IM specifically.

12 These responses are based on subjective self-assessments by survey respondents and should not be taken as a) objective or b) a reflection of all FIs' levels of awareness.

13 Respondents who answered 'strong' or 'very strong' levels of awareness of financial crime risks linked to environmental crime are categorised as 'high', and those who answered 'moderate' or 'weak' are categorised as 'low'.

Figure 22: Actions taken by financial institutions in response to IWT by awareness levels




**Data here consistently shows that FIs with higher levels of awareness[14] of environmental crime risks are more likely to have implemented internal policies and training to address these risks compared to those with lower levels of awareness.[15]** This suggests that responding to environmental crimes like IWT requires a holistic approach that encompasses both knowledge and practice and that training may be an effective tool to increase staff awareness of risks.

It is, however, worth noting that nearly 50% of respondents from FIs with self-reported high awareness of environmental crime nevertheless reported having no policy on IWT in place.

**Despite these organisations purportedly being highly aware of environmental crime risks, they are not combining this awareness with policies which would both signal externally their commitment to addressing related risks and provide an internal framework for staff to abide by.** It is possible that policy implementation is simply lagging behind awareness raising, a prerequisite for understanding the need and advocating for the development of such a policy.

The 38% of respondents who reported a low level of organisational awareness of environmental crime also claimed to have an IWT policy in place. This indicates, perhaps, that policies may be insufficient in isolation to increase organisational awareness of specific IWT and that continuous training is necessary to improve understanding levels. Only less than 10% of respondents with high awareness of environmental crime had no relevant training, suggesting that indeed dedicated training generates awareness.

**Organisations with higher awareness levels are consistently more likely to screen for IWT, to raise a SAR/STR and to cease relations with a customer in relation to IWT issues, suggesting a direct relationship between the knowledge of specific IWT risks and the capacity to identify and address them.** Furthermore, higher levels of awareness may reflect investment in technology, data management, and training for the teams facing these issues.

14 Defined as those who reported 'very strong' or 'strong' levels of organisational awareness of financial crime risks linked with environmental crime.

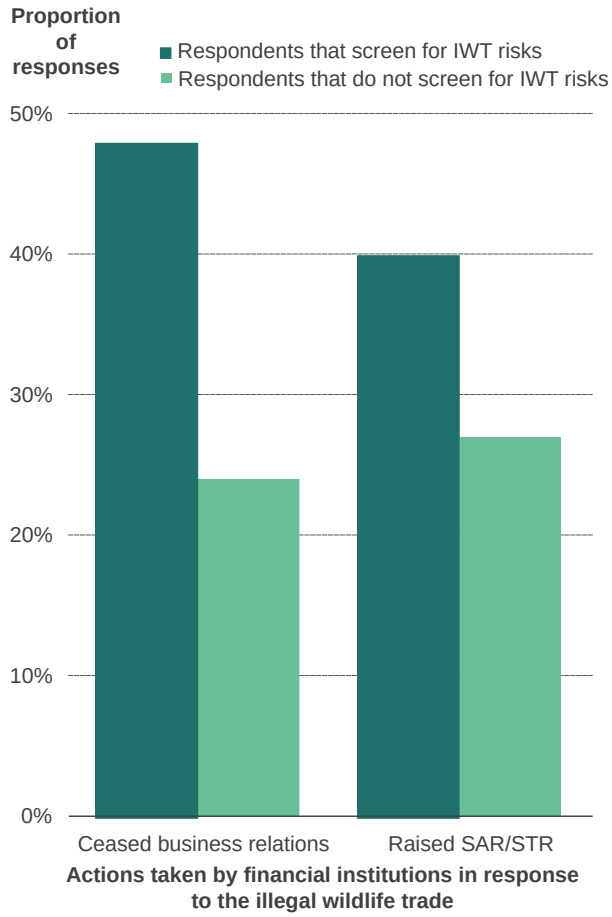
15 Defined as those who reported 'moderate' or 'weak' levels of organisational awareness of financial crime risks linked with environmental crime.

## 4.5.4 Screening

Screening is also strongly associated with an organisation's likelihood of taking action in response to materialised risks. As seen in Figure 23, organisations that screen for these specific risks are also more likely to act on the issue of IWT by ceasing business relations or logging a SAR/STR.

**In addition, firms that screen for risks are more likely to cease business relations than to raise a SAR/STR**. This may be because they feel insufficiently educated to raise SARs/STRs (as has been noted by the FATF in relation to IWT) – or insufficiently motivated (perhaps due to time and resource constraints). It might also signal that with high levels of uncertainty over the severity of the alleged crime and the time and outcome of the investigation, FIs prefer to act as risk adverse actors, with their best strategy to cease relations completely. Feedback from participants in the focus group conducted for the land conversion report indicated that FIs would feel more motivated to submit SARs/STRs on environmental crimes if they received more feedback from the FIUs on the usefulness of their financial intelligence.

Figure 23: Impact of screening on financial institutions' responses to IWT risks

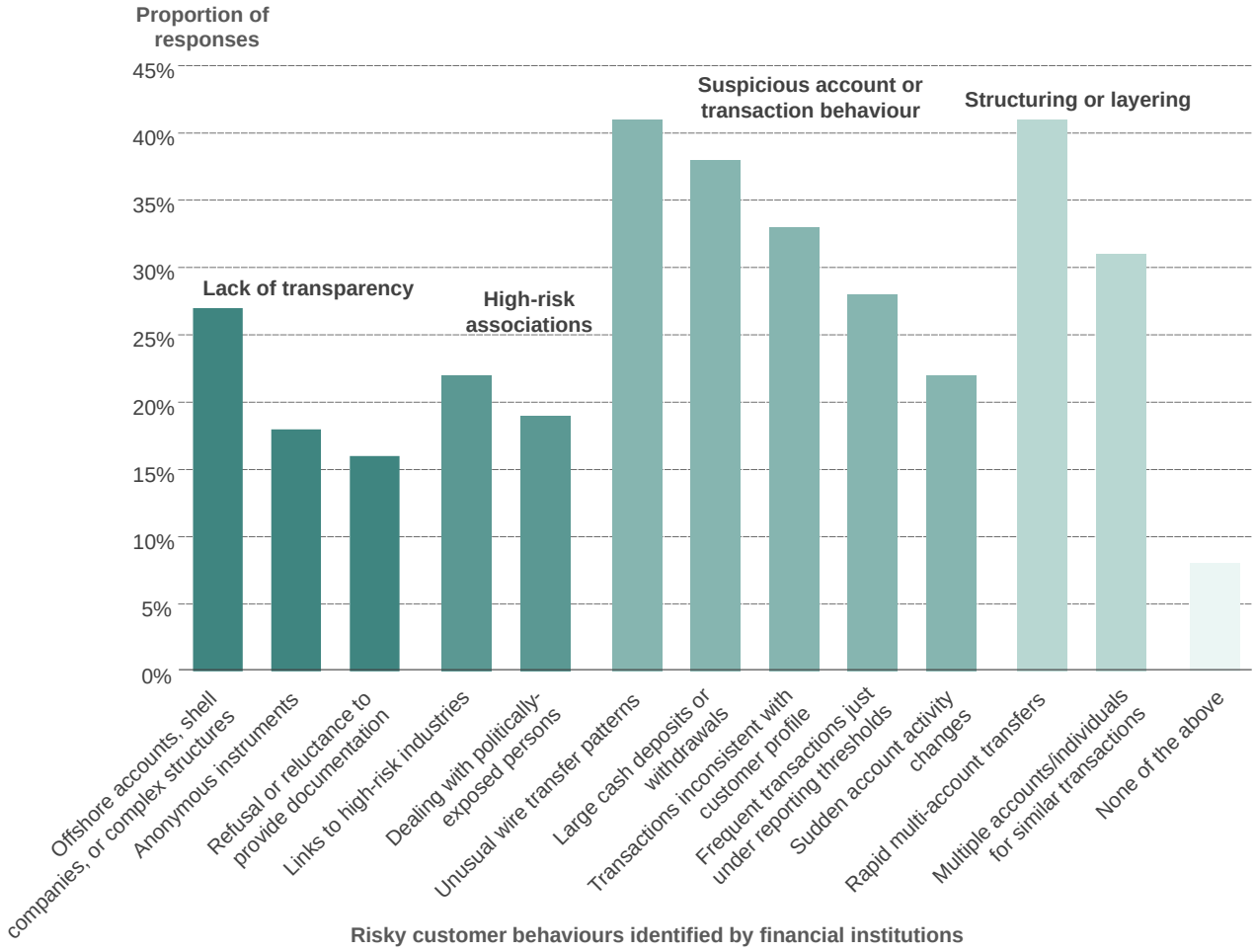



## 4.5.4 Red flags that prompt action

In cases where organisations have ceased activity with a client in response to concerns over IWT, respondents also identified the high-risk behaviours that they interpreted as potential indicators of illegal activity. Some of these red flags were reiterated by respondents that have raised SARs/STRs in response to IWT risks. For example, one participant noted that "unusual payment patterns, shell companies, high risk jurisdictions and vague documentation" combined to paint a highly suspicious picture that they further investigated.

Of the respondents surveyed, most reported flagging cases of unusual wire transfer patterns, rapid fund movement through multiple accounts, large cash deposits or withdrawals, and uncharacteristic transactions as a basis for ceasing business relations. **Noting that these typologies are all generally widely accepted indicators of financial misconduct, this may suggest that FIs tend to act on financial crime risks more generally rather than responding to IWT-specific red flags. This highlights the importance of developing IWT-specific red flags and indicators which can be easily integrated into firms' screening systems and controls**. It may also reflect – at least to some extent – FIs' knowledge that a range of other financial crimes commonly converge with environmental crimes like IWT.

Figure 24: Risky behaviours identified by financial institutions that have raised SARs/STRs for IWT [16]



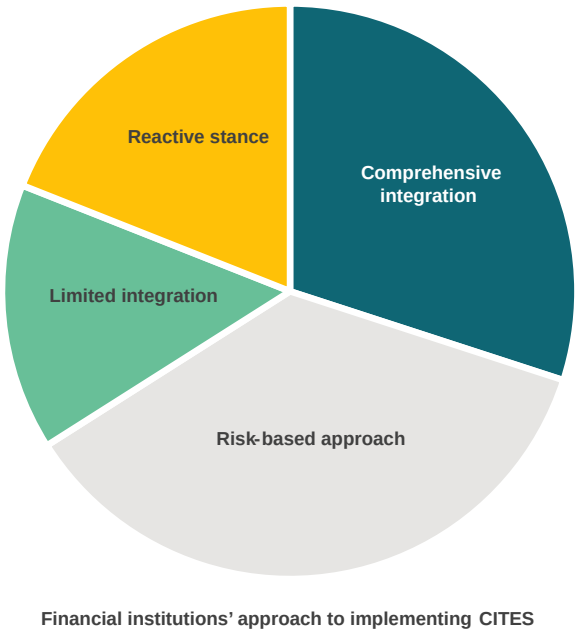


[16] Anonymous instruments' includes cashier's checks, money orders, etc

## 4.5.6 Linking CITES implementation with IWT action

CITES provides a comprehensive international framework for identifying endangered species for which trade is prohibited. As an international convention, however, its implementation depends on national governments and individual organisations. The figure below demonstrates the diverse approaches taken by FIs as regards CITES implementation.[17]

Figure 25: Financial institutions' approaches to CITES implementation




Over 80% of the illegally traded animal and plant species seized between 2015 and 2021 were CITES-listed, indicating the importance of implementing CITES into risk controls. Currently, there are 185 Parties to CITES. This not only indicates near universal acceptance and adoption of its contents, but also informs the way individual countries define IWT, as parties to CITES must regulate wildlife trade according to the CITES appendices. Consequently, FI approaches to CITES integration are good reflections of broader progress towards tackling IWT in general.

Just over a third of respondents reported that their organisation takes a '**risk-based approach**' to CITES integration; that is, listing the wildlife trade as a specific risk factor in their internal risk assessment procedures, with the highest risk ratings given to species listed in the CITES Appendices. Under this approach, clients in industries that intersect with IWT must undergo enhanced due diligence. This approach aligns with FATF recommendations to FIs, which include requiring them to identify and assess their exposure to money laundering risks relating to IWT and to take appropriate mitigation measures.

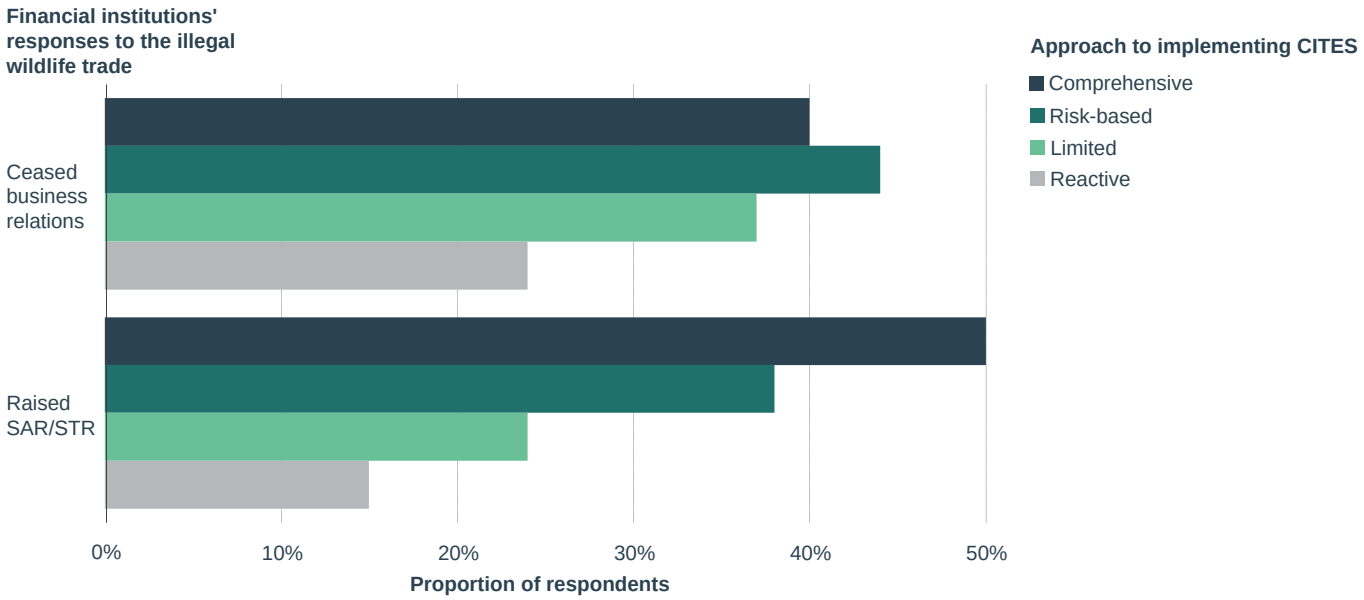
Just under a third of respondents reported that their organisation has '**comprehensively integrated**' CITES considerations into due diligence and risk assessment frameworks. This involves not just subjecting high-risk clients to enhanced due diligence but embedding IWT considerations into all due diligence process. On top of the requirements of a risk-based approach, this entails, for example, including specific questions about the trade in wildlife in Know Your Customer (KYC) processes, requiring additional documentation for businesses dealing in animal products, and employing third-party experts to conduct enhanced due diligence on clients in sectors known to intersect with wildlife trade.

About 20% of respondents reported that their organisation takes a '**reactive stance**' to integrating CITES considerations. While these organisations do not have CITES-specific processes in place, they rely on general AML and KYC procedures to flag any potentially suspicious activities. Should concerns about IWT arise during those processes, the organisation then conducts ad-hoc investigations as needed.

About 15% of respondents represent organisations that have integrated CITES considerations into internal operations in a '**limited manner**'. These organisations do not have CITES-specific protocols but have general environmental risk assessments which include some considerations for wildlife trade, with clients in higher risk industries subject to additional scrutiny.

Further research is necessary to evaluate the efficacy of these approaches, but survey results in Figure 26 show that organisations with comprehensive or risk-based approaches to CITES are more likely to cease activity with a client or raise a SAR/STR due to IWT-related risks.

Figure 26: Actions taken by financial institutions in response to IWT risks by approach to CITES implementation




As emphasised by FATF, STRs are a crucial source of intelligence to initiate and support financial investigations into IWT. Brazil, for example, was able to uncover a case involving the illegal trade of rare Black Arowana fish eggs on through financial intelligence provided by STRs. However, STRs remain disproportionally low compared to the levels of IWT risk exposure. Indeed, in a 2020 FATF study, only 13 of 45 jurisdictions surveyed reported receiving any STRs relating to IWT over the past five years. This may be attributed to low levels of awareness around specific red flags for IWT, and to limited guidance from law enforcement agencies.

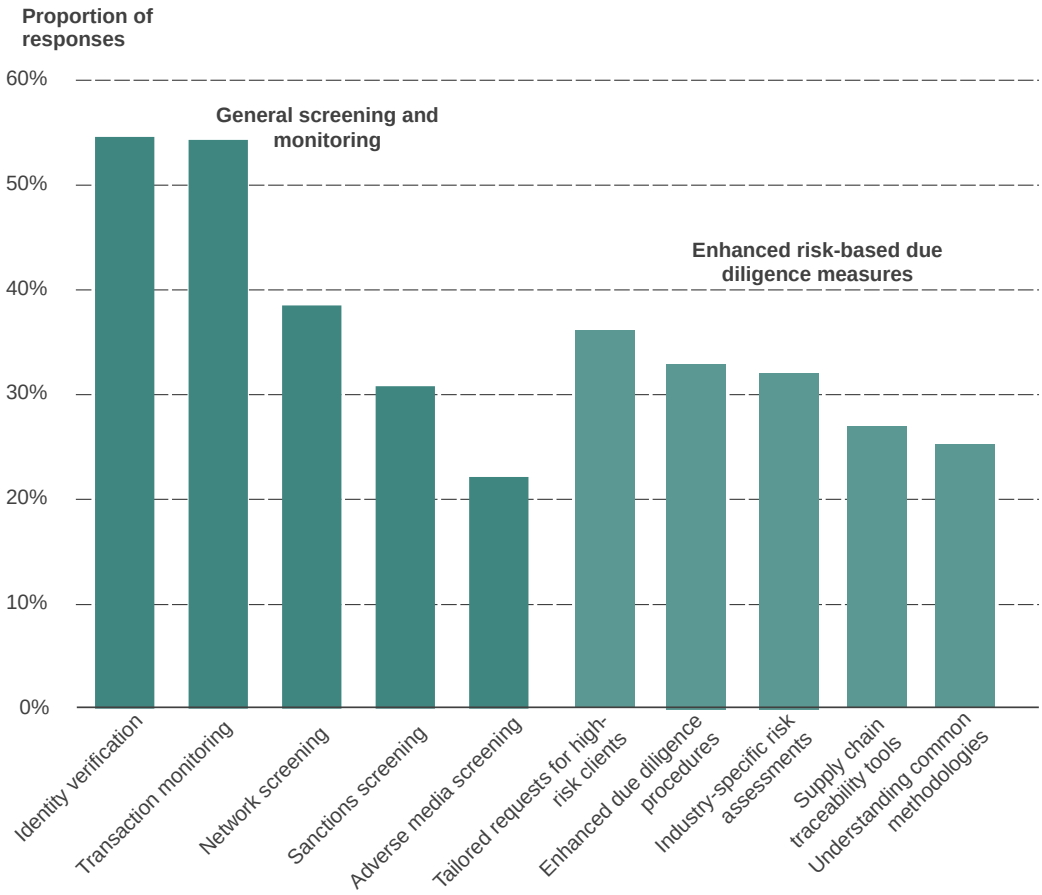
**Since IWT frequently converges with a vast array of other financial crimes that FIs may be more familiar with and may consider more 'serious' (for example, tax evasion, corruption or fraud), it is also possible that suspicious activity where IWT is involved are being flagged but reported only under another predicate crime**. Given the comparatively lower penalties for environmental crimes compared to other predicate crimes in most regions, this approach may result in more effective investigations and ultimately convictions and sentences for criminals engaged in a range of activities including IWT. However, it may also contribute to a continued dearth of effective financial intelligence relating to IWT, which may perpetuate the misconception of it being perceived as a less 'serious' or damaging crime and therefore reduce the amount of available effective red flags and indicators in circulation which could further help FIs to detect and disrupt this crime.

## 4.6 Lessons learned and best practice

### 4.6.1 Useful tools/procedures

Figure 27 outlines the tools and procedures that respondents found most useful for identifying potential links to IWT. Identity verification and transaction monitoring were by far the most popular options – both selected by over 50% of respondents. Options such as adverse media screening were selected to a lesser extent (by roughly half as many respondents); however, at least one participant explicitly stated that "adverse news related to environmental crimes" was used as part of their organisation's approach to screening clients.

Figure 27: Helpful processes for identifying potential links to IWT as nominated by financial institutions





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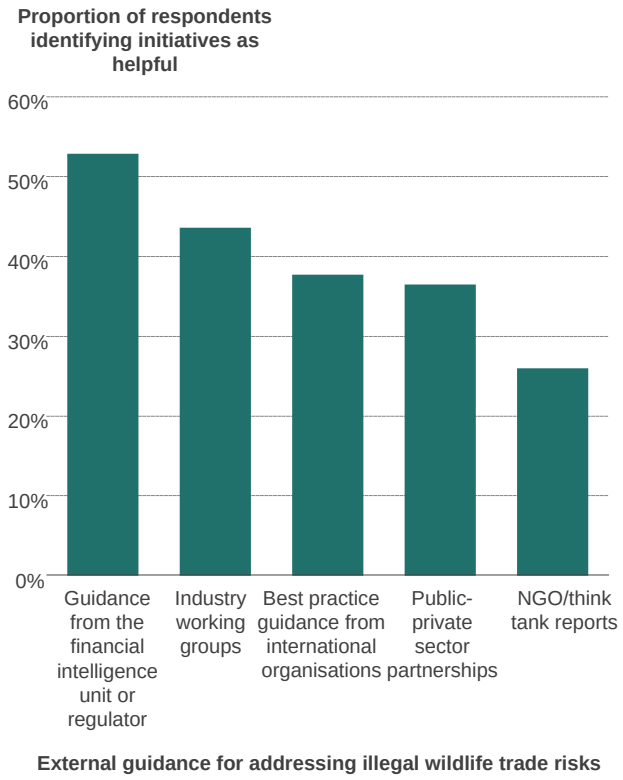
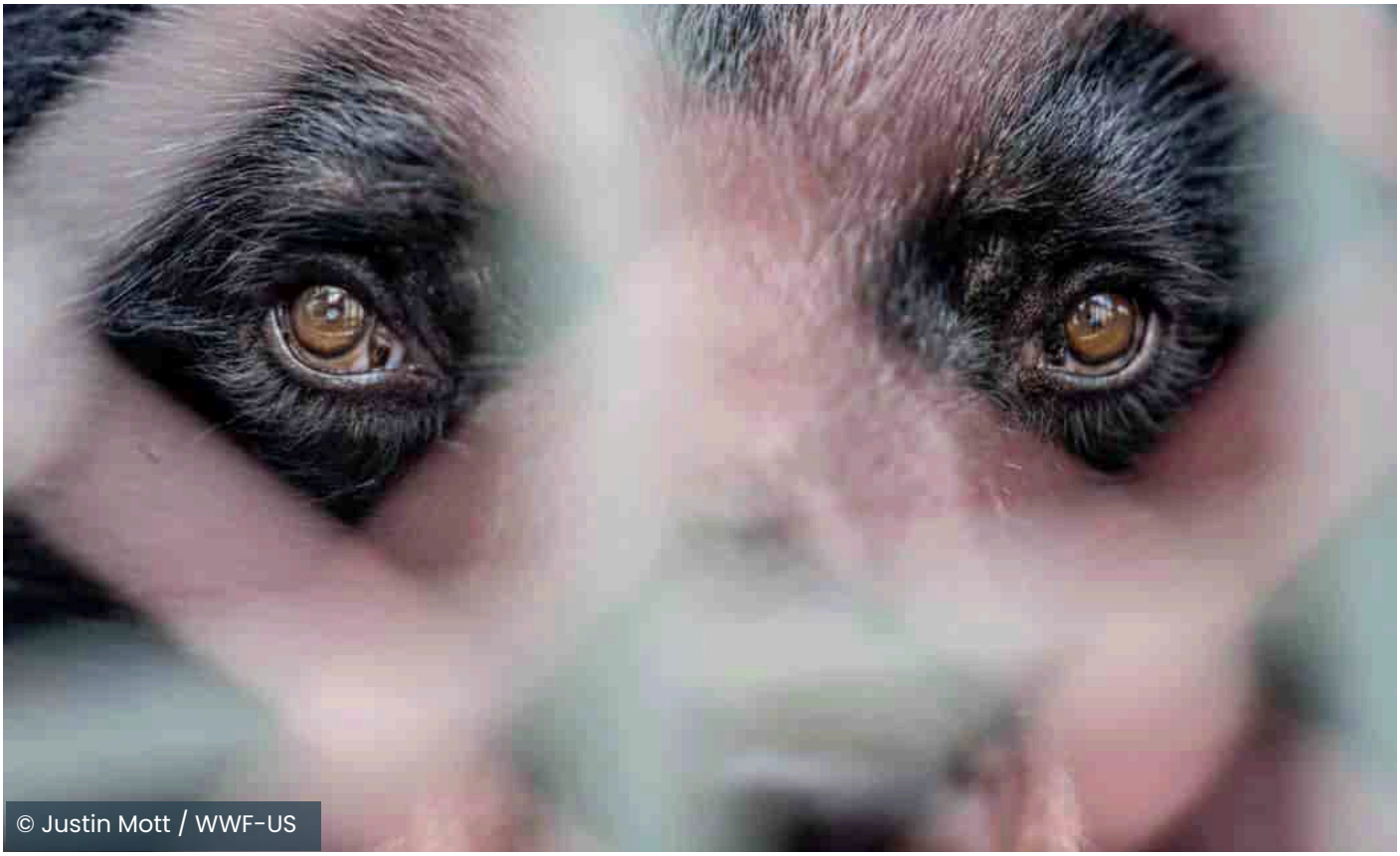
## 4.6.2 Helpful initiatives

Figure 28: Helpful external initiatives for addressing IWT as nominated by financial institutions




Respondents across the board found that guidance from their FIU or regulator was the most useful tool for assisting their organisation in addressing IWT risks, demonstrating the critical role that these bodies play in shaping domestic readiness to tackle environmental crimes. Similarly, industry working groups were listed as a prominent helpful source of guidance, which potentially reflects their status as trusted organisations composed of FIs themselves, that therefore understand the specific risks, pressures, constraints and motivators felt by the industry. Fewer respondents nominated NGO and think tank reports as helpful sources, which may suggest that existing resources are insufficiently tailored to FIs' perspectives or needs, or that they are not properly circulated within FI circles.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# 5. Financial institutions' exposure

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## 5.1 Exposure to environmental crimes

The risks that FIs face from exposure to environmental crime activity are manifold. While some risks are common across crimes, others – including unique techniques and factors highlighted in this report's case studies – are specific to IWT. Risks can be direct and indirect, and include:

**Regulatory and legal risk** – As organised crime groups become increasingly involved in environmental crime, supply chains across the globe are becoming longer and more complicated. FIs face significant legal risks if found to be implicated in activities such as IWT and illicit mining in contravention of legislation, with specific species and minerals now subject to a growing raft of national and international laws. FIs are specifically subject to anti-money laundering laws such as the Bank Secrecy Act 1970 (US) and the Anti-Money Laundering Directives (EU), both of which legally require FIs to submit Suspicious Transaction Reports (STRs) when they identify financial transactions that may relate to the proceeds of illegal activities. Companies that unwittingly facilitate illegal trade have also been penalised: in 2022, for example, Brazil's environmental regulatory agency fined Meta, the parent company of Facebook and WhatsApp, US$2 million for failing to remove thousands of online posts that had been flagged for selling illegal wildlife. This sort of regulatory action indicates an increasing willingness to hold entities liable for facilitating environmental crimes, even if inadvertently or indirectly.

**Reputational risk** – As public awareness of environmental crimes grows, FIs risk reputational damage if they are seen to be contributing to or complicit in illegal resource exploitation and environmental degradation. This may lead to adverse media attention, a loss of customer trust, and share value decline. For example, in the first 100 days following the BP Deepwater Horizon oil spill, the company's market cap value dropped 59%. Investigations are increasingly publicising evidence of corporate complicity in illicit mining of minerals like gold, cobalt, and coltan. Similarly, wildlife trafficking of rhinos, elephants, and tigers generates substantial outrage from the public, press and non-governmental organisations (NGOs). This risk is exacerbated in cases where environmental crime intersects with human rights abuses. Illicit mining, for example, is often linked with child labour and violence. Indeed, Apple, Google, Dell, Tesla, and Microsoft were taken to court in 2019 over their role in the deaths of children mining for cobalt in the DRC. Regardless of the outcome, litigation draws public and press attention to corporate conduct.

Case study

### Financial institutions' complicity in environmental crimes

FIs can face public backlash for being linked to high-profile mining companies. For example, it was recently revealed that banks have provided US$37.7 billion in credit to mining companies that have been accused of causing forest destruction, water contamination, and human rights violations across Southeast Asia, Central and West Africa, and Latin America. Furthermore, as of 2022, investors hold US$61 billion in shares and bonds issued by these same companies.
The issue of financial complicity in environmental crimes is drawing increasing attention. The NGO Forests and Finance has launched a public dataset listing the financiers behind mining companies linked to environmental and social misconduct, raising reputational risks for these institutions.

**Physical and operational risk** – Most FIs and businesses are, ultimately, directly or indirectly reliant on natural resources (according to the World Economic Forum, at least 50% of global GDP is reliant on nature) and, as such, face risks like supply chain disruptions, non-performing loans, asset damage, and stranded assets as a result of environmental crime. Crimes such as wildlife trafficking accelerate resource depletion and undermines sustainable development. Since economic activities and financial assets depend on natural resources, FIs face significant risks if the access to these resources is reduced or compromised, with cascading impacts from reduced productivity and resilience of businesses they finance.

## 5.2 Exposure to IWT

IWT generates billions in criminal proceeds each year – as such, it inherently poses significant risks to the global financial system. FIs can be exposed to IWT-related risk directly or indirectly:

**Direct exposure**: FIs face direct risk by providing financing (such as debt or equity) or other financial services to companies exposed to or involved in wildlife trafficking.

**Indirect exposure**: FIs face indirect risks via investment chains, for example when investing in banks that lend to companies with exposure to IWT, or in funds holding shares in such entities.

Particularly high-risk business activities include:

**Shell companies and offshore accounts** – The proceeds of IWT may be funnelled through shell companies that mask the true nature of business. These entities may present themselves as legitimate import/export businesses whilst being involved in the trafficking of protected species or derived products. Criminals often use offshore accounts and complex ownership structures to disguise the source of their wealth. Offshore banking services are at higher risk for these purposes.

**Tax havens** – Crime syndicates profiting from land conversion may make use of companies domiciled in tax and secrecy havens to further evade taxes. and to conceal the identity of the true beneficial owners of these companies.

**Nominees and trust services** – Criminals may use networks of intermediaries – including nominees, custodians and trust companies – to disguise the beneficial ownership of a bank account, investment fund, or asset, to avoid detection and prevent such accounts from being linked back to individuals or companies with criminal history and involvement in IWT.

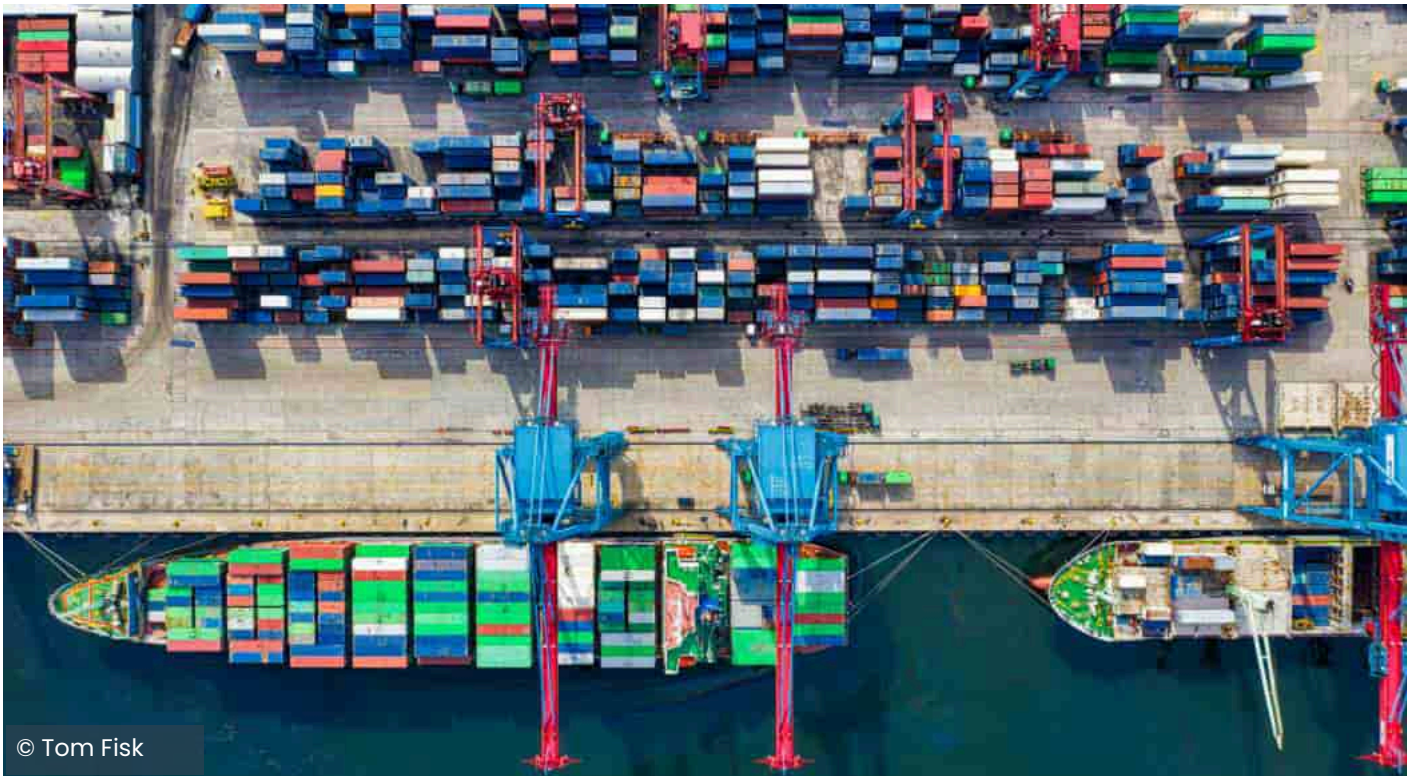
**Use of cash** – Wildlife traffickers, like many other criminals, often rely on large volumes of cash transactions to avoid detection. FIs that fail to report suspicious activity or to meet AML standards may be implicated when large cash deposits or withdrawals are made by individuals or entities involved in wildlife trafficking, especially in regions where wildlife crimes are prevalent.

**An in-depth case study on wildlife criminals' reliance on cash can be found in section 7.3.**

**Insurance** – Provision of insurance to companies in or related to high-risk sectors for IWT or in shipping, transport and logistics can expose FIs to IWT risk. For example, when providing insurance for ships, FIs are rarely aware of what physical goods are in transit; these may include commodities like illegally sourced wildlife.

**High risk clients** – The exotic pet trade, traditional medicine, the fashion industry and many more are at risk of using or selling products derived from illegally sourced wildlife. If FIs have clients in these sectors, they should have screening and monitoring systems in place to detect potential links to IWT.

**Trade and export financing** – FIs that provide financing to industries such as shipping, logistics, and retail could be exposed to IWT risks if the businesses they finance are involved in or unknowingly support wildlife trafficking activities through their supply chains. This is exacerbated by the continued reliance on paper documentation. For instance, bills of lading – essential legal documents issued by carriers to shippers detailing the quantity, type, and destination of the goods in transit – are sometimes hand-written and susceptible to alterations obscuring the illicit nature of the commodity in question (for example, by changing the area of origin). Although FIs are typically not expected to review bills of landing, they must be able to demonstrate that they undertook reasonable controls to prevent money laundering, fraud and other predicate offences.



Case study

### The Shuidong Group

In 2017, Chinese officials sentenced a number of individuals for wildlife trafficking crimes. The Shuidong Group – so called due to many of their members hailing from a town called Shuidong in China's Guangdong province – was convicted for smuggling ivory and pangolin scales from Southern Africa to China. Following an in-depth investigation from the Environmental Investigation Agency, researchers found that the Shuidong Group utilised a network of informal money changers, front companies, complicit freight agents, and circuitous shipping routes to cover up their activities. Payments were made to local poachers in cash in US dollars by local money changers, who were paid in Chinese renminbi by bank transfer. Although Tanzanian officials had carried out a financial investigation into the group for illegal possession of ivory in 2013, it did not appear to lead to any money laundering charges, despite revealing the group's use of front companies and large cash deposits without being flagged by the banks concerned.

The Shuidong Group also deliberately chose commercially inefficient shipping routes to obscure the origin of their contraband from Chinese shipping officials, for example by shipping ivory (concealed alongside plastic pellets) from Mozambique through Kenya, Singapore, South Korea, Hong Kong SAR and finally to China, approximately five months later. The original bill of lading issued in Mozambique covered the journey to South Korea, where traffickers repacked the shipment and used a new set of shipping documents for the onward shipment. Consequently, upon arrival in China, the shipment would appear as though it came from the low-risk jurisdiction of South Korea.

Circuitous shipping routes continue to be widely used in IWT. For example, the Environmental Investigation Agency found that 300 containers of rosewood were shipped between Mozambique and China between October 2023 and March 2024, stopping en route via ports in Comoros, India, and the UAE before reaching Shanghai. In recognition of the significant volume (72-90%) of IWT being carried out via the shipping industry, the World Shipping Council announced in 2024 an initiative explicitly aimed at fighting wildlife smuggling by sea, providing sector-specific guidance to shipping companies.

**Luxury assets** – At the high end of the spectrum, IWT profits may be laundered through the purchase of luxury assets such as real estate, art, yachts, and high-end vehicles. FIs offering loans or financing for such assets may therefore be unwittingly aiding in the laundering of proceeds from wildlife crimes.

**Online marketplaces and e-commerce** – Many illegal wildlife products are sold through online marketplaces or e-commerce platforms. FIs that process payments for these platforms could be exposed to IWT if they fail to detect transactions involving the sale of illegal wildlife products.

**Online/digital payment platforms** – Wildlife traffickers may use online payment platforms to purchase and sell illegal wildlife products (often disguised as legal good) and to move money internationally. The speed and convenience of such platforms appeals to criminals, as does the fact that often adequate transaction monitoring systems are yet to be implemented. FIs offering real-time and digital payment services may be exposed to these transactions.

**Asset and wealth management** – FIs offering asset management services may manage portfolios containing stocks, bonds, or funds that invest in companies with ties to IWT.

**Correspondent banking** – Correspondent banking relationships, where one bank provides services to another bank (including facilitating wire transfers, conducting business transactions, accepting deposits, or gathering documents to unknown 'end clients'), can expose FIs if they engage with foreign banks in high risk regions and sectors for IWT. Inadequate due diligence on correspondent banks may allow transactions linked to IWT to flow through the international financial system.

**Commodity trading** - FIs can be directly exposed to IWT risks through the buying and selling of soft commodities like timber or other wildlife.

**Personal and commercial bank accounts** – FIs can unwittingly process or hold funds linked to IWT, including those of criminal groups wishing to launder their profits. FIs are particularly vulnerable if they fail to detect the illicit origin of the funds.

**Investments, pensions, investment banking, private equity investment and venture capital** – FIs may inadvertently directly invest client – or their own – funds into companies exposed to IWT (like the medicinal or fashion industries), particularly in jurisdictions with weak regulatory oversight. They may also offer access to private equity or venture capital funds that invest in companies linked to IWT indirectly via supply chain businesses.

**Money transfer systems and foreign exchange services** – Criminals may launder the proceeds of IWT through money transfer services – especially informal value transfer systems like 'hawala' – which are particularly susceptible to money laundering, since many are unregulated.

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Figure 29: Financial institutions' exposure to IWT – high-risk industries/sectors

## 5.3 Convergence with predicate crimes: The risk to financial institutions

**Definitions**

Predicate crimes: Illegal activities that are components of a larger crime; in a financial context, they serve as the underlying criminal act that generates proceeds or funds for the subsequent illegal activity. The term is generally used in relation to money laundering.

As part of global efforts to combat serious crime, the Financial Action Task Force (FATF) lists a number of predicate offences (or 'designated offences') in its 40 Recommendations to tackle illicit financial flows, alongside standards and guidelines for countries to implement legislative measures and regulatory frameworks related to Anti-Money Laundering (AML) and Countering the Financing of Terrorism (CFT). Countries codify predicate offences into their own national legislation; for example, the EU's Fifth Anti-Money Laundering Directive adopted in 2018 lists 22 predicate offences, and the Bank Secrecy Act 1970 (US) – further expanded by the Patriot Act 2001 (US) – covers over 2000.

Tracing back the proceeds of crime and understanding the link between predicate offences and money laundering is key to authorities' efforts to dismantle criminal networks and the financial infrastructure that supports them. Identifying predicate offences and recognising underlying crimes provides crucial insight into the nature and scope of criminal activities, and allows law enforcement to trace associated illicit financial flows and establish connections. It further enables law enforcement agencies to anticipate emerging trends and adapt their own approaches accordingly by way of preventive measures to mitigate the risks posed by these crimes.

**An in-depth case study on this topic can be found in section 7.4.**

### 5.3.1 Money laundering and trade-based money laundering

IWT is deeply intertwined with money laundering activities. While legislation differs between countries, money laundering refers to the concealment of the origins of illegally obtained money – such as via IWT – often through transfers involving FIs.

**In-depth case studies on money laundering in IWT can be found in sections 7.8 and 7.9.**

Traffickers employ sophisticated financial schemes to obscure the origins of their illicit gains – rendering the financial sector at high risk of exploitation. Common methods include mixing and concealing illegitimate proceeds into seemingly legitimate business, placing and layering funds through cash deposits masked as loans or payments, and use of electronic banking platforms, licensed money transfer systems, and third-party wire transfers. Informal money transfer systems like 'hawala' further facilitate untraceable transactions, especially in regions with limited banking oversight.

To avoid detection, criminals utilise tactics such as money mule accounts, low-value payments, and multijurisdictional shell companies with complex ownership structures. Front companies tied to import-export industries, legal wildlife businesses, or vulnerable sectors like traditional medicine and fashion are also leveraged to justify cross-border transactions and goods movement. Traffickers also launder proceeds by purchasing high-value assets like luxury real estate, vehicles, and artwork, exploiting weaker regulations in non-financial sectors.

IWT is inherently trade-related and therefore vulnerable to trade-based money laundering risks. Products of IWT are often concealed in or labelled as shipments of other goods (for example, cassia seeds, frozen fish, timber, and plastic pellets). Criminals also seek to operate in the legitimate wildlife trade (for example, through zoos and breeding facilities), allowing them to commingle illegal trade with licit transports of flora and fauna which can then be sold in grey markets.

The trade in wildlife – legal or otherwise – is also used to launder illegal proceeds from other serious crimes such as drug offences. Indeed, wildlife commodities can even become a basis of trade and a substitute for cash, becoming a form of currency for criminal groups.

Case study

### Tiger King and money laundering

Bhagavan "Doc" Antle – featured in Netflix series Tiger King – pleaded guilty to animal trafficking and money laundering in 2023 for overseeing the sale and purchase of cheetah cubs, lion cubs, tigers, and chimpanzees, all of which are protected as endangered species under both CITES and US law. He utilised bulk cash payments to hide illegal transactions, falsified paperwork, and requested that payments for endangered species be made to his nonprofit to hide the transactions as 'donations'. Furthermore, investigators found evidence that Antle was also using cash acquired by illegally transporting and harbouring immigrants, further demonstrating the frequent convergence between different crime typologies in many criminals' repertoires.

## 5.3.2 Fraud

Fraud is a key facilitator for transporting, trading in, and laundering illegally sourced wildlife or its proceeds. Fraudulent practices are utilised in various ways along the entire supply chain. The wildlife trade is regulated by license, permits, certifications, and other forms of documents – all of which can be forged, changed, or purchased from corrupt officials. Not only does false documentation lend illegally traded species a veneer of legitimacy, but it can also increase the price fetched for species.

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At different stages of the supply chain, for example, traffickers may forge or falsify:

- Transport documents.
- Import/export licenses (e.g. by falsifying data on the number of specimens, species, origin, marking system etc).
- Records of breeding, death, thefts or escapes in wildlife management control systems.
- Tagging/marking systems like seals, microchips and leg bands (e.g. by reusing, illegally manufacturing, defrauding, selling, buying, counterfeiting or tampering with them).
- Technical research on populations of wild species and the level of extinction threat.
- Declarations or registrations relating to their own identity and address or those of other traffickers in the supply chain.

When it comes to ivory, for example, ID cards and permits may falsely claim that the ivory is imitation, dates of acquisition may be edited back to pre-ban dates or it may be painted to appear like wood. Trafficked ivory has also been found disguised with black paint and hidden in consignments of cow horns.

**An in-depth case study on the fraudulent use of permits and concessions in the timber industry can be found in section 7.10.**

Case study

### Defrauding Europe's timber tracing system

Under Romania's 2021 law aimed at protecting forests, every truckload of wood or timber products must be photographed and uploaded to an electronic tracking system (SUMAL) to ensure that they are being logged with permission, so that inspectors can confirm that loggers are only harvesting wood from authorised species. However, SUMAL cannot detect fake images, and reporters have recently uncovered that some drivers, instead of submitting legitimate photos of their wood or timber, are instead uploading fake or unrelated images (including drinking parties), reusing the same photo multiple times, or taking photos of photos.

This raised significant questions on the integrity and reliability of the monitoring system, increasing the risks for companies of buying illegally logged wood, with repercussions on FIs financing timber purchases or facilitating related transactions. Further concerns were raised on artificial intelligence (AI) and visual misinformation to trick tracking systems used in the IWT arena. Generative AI is increasingly fuelling illicit activity across the full gamut of financial crime (for example, with deepfake technology fooling biometric identity verification systems or used to create convincing fraudulent documentation). Indeed, in late 2024, INTERPOL warned that AI is enabling criminal groups to undertake illegal activities on an 'industrial scale', posing significant challenges for law enforcement across the world.

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## 5.3.3 Corruption and bribery

> "Corruption is the air that wildlife crime breathes; it is one of the key enablers of widespread and large-scale wildlife trafficking and one of the biggest obstacles to effective law enforcement."
>
> The Wildlife Justice Commission, 2023

Corruption and bribery are widescale facilitators and enablers of IWT at every stage of the supply chain. They undermine law enforcement and judiciary attempts to dismantle and disrupt the activity of criminal networks. Complicit officials in positions of power utilise their authority to enable the acquisition, transit, processing, and sale of illegal goods. This can also happen early on in the process, when legislation and policies are in the making.

Bribery is widespread and commonly used to commit IWT, for instance to gain entrance into protected areas or smuggle contraband across borders and through customs, avoid detection and prosecution (e.g. via advance warning of law enforcement efforts), and even prevent convictions (e.g. when judges accept payments). In IWT court cases across four high risk jurisdictions (Kenya, Tanzania, Uganda and Zambia), police officers (32%), administrative government officials (19%), and military (17%) were the officials most often found to be corrupt. When officials do not voluntarily assist traffickers, extortion, including blackmail and threats of violence, has been observed to secure their compliance.

Corruption – which can be both 'petty' or 'grand', involving regular citizens and businesses, but also high-ranking political figures and government officials – facilitates the activities of specialist and opportunistic poachers and wildlife traffickers, for example, when authorities provide information to help them find specimens or evade law enforcement. Corrupt actions can be both active (e.g. informing traffickers about impending raids or checks) and passive (e.g. failing to perform patrols or inspections), with the latter being no less destructive than the former.

### In focus

#### Corporate gifts and bribery

Corruption has long been recognised as a key part of IWT, and corporate gifts are a crucial element of this. For example, in 2010, the Chairman of Vietnam's Hoc Mon District's People Committee was sentenced to 26 years imprisonment for accepting a bribe and a portion of rhino horn valued at US$10,000.

At the 17th CITES Conference of Parties, the Parties highlighted the need for "particular attention to corruption associated with corporate giving or accepting of CITES-listed species or products made from them and adopt efficient policies against such practices." Over the last decade, China has since embarked on a national anti-corruption campaign that has targeted the use of luxury goods in bribing officials, particularly products made from endangered species.

Corruption, collusion and protection enacted by organised crime gangs participating in IWT often span networks which covertly link private sector operatives with regulators and law enforcers at important trade bottlenecks like airports, seaports and border crossings. For example, in the Philippines, researchers found that some wildlife traffickers routinely ship contraband through airports without concealment or provision of appropriate permits. In Madagascar, officials at one checkpoint were observed systematically extorting a toll for each trafficked log of banned ebony and rosewood rather than confiscating it. In Vietnam, considering just three ivory smuggling routes, researchers estimated that between US$18,000 and 36,000 is paid in bribes each day. On a global scale, estimates suggest that between 4% and 10% of the price of a wildlife product at the end of the supply chain accounts for bribery.

## In focus

### Corruption risks in stockpile management

Law enforcement and governments across the world are faced with the same question – what to do with contraband wildlife once it has been seized? In Madagascar, for example, the government is in control of stockpiles of seized rosewood, and has plans to use the rosewood domestically. However, conservationists have warned that permitting domestic use, if not properly monitored, may allow illegal trade in rosewood outside of government controlled stockpiles to enter markets, encouraging more illegal harvesting.

Keeping stockpiles ringfenced, however, is often complicated by corrupt practices, particularly when it comes to goods like ivory and timber. The NGO TRAFFIC has documented cases of ivory stock being stolen and going missing in Cameroon, the DRC, Ethiopia, Gabon, Ivory Coast, Nigeria, Rwanda, and Tanzania, particularly during periods of civil unrest and war with the assistance of local officials. Additional cases have been also documented in Burundi and Madagascar, where timber operators colluded with government officials refraining from carrying out physical inventory of the stocks in return for large payments. As discussed in a CITES practical guidance on ivory stockpile management and disposal, managing the security of such stockpiles can be a costly and dangerous endeavour, but stockpile destruction has important limitations too and cannot be simplistically seen as a better option.

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## 5.3.4 Tax evasion

Tax is often evaded on illegally derived or trafficked goods, including wildlife, to help criminals avoid detection. According to the World Bank, governments lose an estimated 7 to 12 billion USD of tax revenue each year due to IWT. This hinders the socio-economic development of countries by leaching income that may otherwise be invested in public services or governance frameworks – including wildlife conservation and IWT legislation and enforcement.

One way in which traffickers evade tax is through export duty violations, for example by misreporting exports to avoid having to pay the full amount of tax, or in some cases avoiding the tax altogether. High-value species may be falsely declared to save Value Added Tax (VAT) and non-payment of fees may also be associated with relevant licenses and permits. Under the Lacey Act 1900 (US), importers have a responsibility to address export duty violations, by exercising due diligence and investigating whether the exporter was violating any local tax laws. Failing to fulfil these obligations could land the importer with civil or criminal sanctions.

As well as avoiding tax on the lucrative profits from illegally sourced and traded wildlife, according to the FATF, wildlife traffickers frequently rely on tax evasion, alongside corruption and fraud, to conceal the proceeds of their crime using front companies (including those incorporated in tax havens or high-secrecy jurisdictions). To maximise profits from IWT, criminals may incorporate shell and front companies in both source and destination countries, as well as in third party countries, especially financial and incorporation centres where weak regulatory environments can be exploited to establish complex company structures (e.g. those which are multijurisdictional or with multiple layers of ownership). This, the FATF suggests, indicates that trade information and that relating to company business activities and tax reporting are important data sources when it comes to identifying anomalies or suspicious behaviour in regard to IWT.

In focus

### The importance of financial investigations to combating IWT

Tax investigations provide an important – and underused – means to hold individuals engaged in IWT accountable, especially in cases where there is insufficient evidence to prosecute them for IWT offences alone. Criminals often use front companies as a deception, but such front companies may also provide an opportunity for investigators to prosecute criminals for tax-related offences or money laundering, which may result in higher penalties than a wildlife trafficking offence alone. Furthermore, these investigations may yield more information about criminal networks than targeting individual poachers or traffickers alone for their immediate activities.

However, tax investigations remain underused as a response to IWT. In Uganda, for example, no IWT cases have been prosecuted using tax, corruption, or money laundering offences following a full tax investigation – a trend reflected in many other jurisdictions. Indeed, in a survey of 59 financial intelligence units globally, the Egmont Group found that only 22% of respondent FIUs conducted parallel investigations into wildlife crime, with an even smaller number – 17% - reporting that they received training regarding financial flows linked to wildlife crime. Just 2% of respondent jurisdictions had official procedures in place for FIUs to work alongside law enforcement in wildlife investigations.

In focus

### Free trade zones

Free trade zones (FTZs) – of which there are currently over 3,500 globally – primarily aim to facilitate more efficient trade relations between countries, but also inadvertently enable IWT through their opaque legal regimes, regulatory loopholes, and lax customs policies. Goods and services that flow through FTZs are not typically subject to the same customs and taxes as those flowing through non FTZs, and regulatory standards and oversight are generally more relaxed. Consequently, there are increasing concerns that FTZs provide a haven for illegal trade, and are being used to manufacture, sell, and move illegal goods across the world while hiding contraband from tax and customs duties. FIs with links to FTZs may therefore find themselves at a higher risk of exposure to IWT and its other associated predicate crimes.

One area of particular concern is the Golden Triangle Special Economic Zone (GTSEZ), situated in Laos close to the borders of Thailand, Myanmar, and China. The CITES Secretariat has previously expressed concern with loopholes in the GTSEZ as regards the possession of wildlife specimens, wildlife farms, and timber, as well as with rife corruption in the area. In 2019, the US Treasury identified a criminal network in the zone engaged in a combination of human trafficking, child prostitution, drug trafficking, and wildlife trafficking.

## 5.3.5 Sanctions evasion

One of the mechanisms for preventing IWT under CITES is trade-related sanctions. Under this provision, the CITES Conference of the Parties and the Standing Committee make recommendations to suspend trade in certain specimens from certain countries for a period of time, during which the country can return to compliance with CITES regulations. There are currently 42 countries subject to trade suspension orders. Single countries have also exacted sanctions on individuals and corporations for wildlife trafficking. The US Treasury, for example, recently sanctioned a Malaysian wildlife trafficker for trafficking products from endangered species including rhinos, elephants, and pangolins from Africa to Vietnam and China.

**An in-depth case study on sanctioned timber from Myanmar can be found in section 7.5.**

Organisations such as the FATF and the Global Initiative Against Transnational Organised Crime have called for the increased use of sanctions to combat IWT. However, despite the proliferation of sanctions, IWT in endangered species continues to occur. Djibouti has been on the CITES sanctions list since 2004, remaining so for ongoing non-compliance. It also remains notoriously difficult to assess the actual impact of sanctions to countries and individual entities. Furthermore, traffickers frequently circumvent sanctions by rerouting their products through non-sanctioned countries or by deliberately mislabelling their products or using false tariff declarations – a technique FIs should be wary of and account for in their screening and due diligence controls.

Case study

### Sanctioned Russian timber

Russia contains over a fifth of the world's forested areas and, prior to 2022, was exporting more than US$3 billion a year worth of timber to the EU. Following the invasion of Ukraine, the EU imposed a ban on Russian timber (among other goods) but these products continue to arrive in the EU and UK.

Some techniques used to evade timber sanctions include routing timber through third countries such as China, Turkey, Kazakhstan or Kyrgyzstan, or mislabelling timber as originating from these regions. Following the sanctions placed on Russian timber, EU imports from Kazakhstan and Kyrgyzstan increased from €445,000 to over €30 million. However, both countries have relatively little tree cover, indicating the possibility of fraudulent rerouting. FIs involved in the timber industry should be aware of these illicit practices to be able to avoid them and report them, and to minimise the risk of unwittingly assisting in sanction contravention.

## 5.3.6 Terrorist and conflict financing

According to the FATF, current evidence is yet to suggest widespread links between IWT and terrorist financing. Nonetheless, IWT has been recognised as a potential national security threat, with sources and anecdotal evidence indicating that organised criminal groups, insurgent groups, military units, and some terrorist groups are directly or indirectly engaged in wildlife crimes. The wildlife trade, like trade in other lucrative natural resources such as minerals, provides a source of income for groups involved in violent conflict. Jurisdictions with high levels of biological diversity and poor governance frameworks are likely to be particularly high risk.

Many non-state armed groups and rebel factions including in Myanmar, Mozambique and the CAR, for example, are known to finance their activities through the trade of timber. This is often enabled by many conflict zones being in forested areas where governments have little reach. According to some studies, wildmeat poaching is also a key resource for rebel groups in the DRC to sustain themselves in tactical, remote regions – both in terms of food and cash received in return for wildmeat.

Case study

### Mozambique rosewood and violent insurgencies

Following a multi-year investigation, the Environmental Investigation Agency found that over 500,000 tons of timber – including large quantities of rosewood – have been exported from Mozambique to China every year since 2017, in direct violation of CITES and Mozambique's log export ban. According to BBC, which refers to the Mozambique Government's National Risk Assessment on Terrorism Finance report, violent insurgents have taken advantage of the timber trade to finance their activities, estimating that these groups generated approximately US$1.9 million every month from smuggling fauna and flora products. Trading sources estimated that 30% of the timber logged in Mozambique's Cabo Delgado region is at high risk of being linked to insurgency groups.

## 5.3.7 Other environmental crimes

IWT often converges with other environmental (especially natural resource-related) crimes when the same transportation, smuggling routes and methodologies are used to traffic illicit goods including timber, minerals, fish and other wildlife. Illegal logging also feeds into IWT when the resultant timber is traded, and many of the same syndicates engage in both forest and wildlife crime.

Timber companies are frequently used as front companies or to cover other illicit environmental crimes like IWT; South African authorities have noted, for example, that payments for illegal wildlife products – as well as the products themselves – have flowed through timber trading companies, commingling legal and illegal funds and goods. For example, there have been cases of IWT products smuggled in hollowed out logs (which can subsequently be filled with wax and resealed) or fake logs, or hidden amongst larger timber shipments.

Wildlife poaching is also exacerbated and facilitated by the construction of infrastructure associated with environmental crimes like illegal logging and mining, including roads, airstrips, river ports and settlements. Poaching may be opportunistic or strategic and planned, for the purposes of immediate consumption as well as trade (both domestic and international). Criminals involved in IWT are also often simultaneously involved in other environmental crimes, such as illicit mining, illegal logging and illegal, unreported and unregulated (IUU) fishing.

In some cases, cartels engaging in IWT are known to resell fuel stolen from state pipelines to illegal fishermen. Illegal oil spills resulting from the transportation of such illicit fuel also occur. In Cameroon, for example, data indicates that fuel smuggling using fishing vessels is a major criminal activity, with adapted canoes leaking fuel and causing pollution in the waterways.

Case study

### Jaguar poaching by illegal miners and loggers

Poaching of jaguars by illegal miners and loggers in the Amazon rainforest in Suriname has been documented, both on an opportunistic basis and 'to order' from local merchants. These merchants boil down the body of the jaguar for around seven days to make a paste which can then be traded, fetching around US$3,000 per jar as a traditional medicine remedy for joint pain and sexual potency.

© Tom Brakefield

## 5.3.8 Serious organised crime activity

Although wildlife trafficking can be an opportunistic crime committed by individuals or small groups, it has also, increasingly, entered the purview of international and transnational organised crime syndicates that operate like businesses and are capable of illegally transporting large commercial volumes of wildlife.

**In-depth case studies on organised criminal involvement in IWT can be found in sections 7.6 and 7.7.**

While these syndicates may dominate the IWT supply chain, the actual poaching of wildlife may still be undertaken by poor hunters who live within range of target animals' habitats (for example, in Africa, Asia, and Latin America), and who are paid a meagre sum by crime gangs for their bounty and more frequently arrested than those orchestrating and managing the supply chain. Profits for criminals generally increase exponentially up the supply chain as they get closer to the consumer.

Case study

### Environmental defenders caught in the crossfire of organised crime

In June 2022, Indigenous expert Bruno Araújo Pereira and British journalist Dom Phillips disappeared in the western Amazon, a remote area known as being strategically important for illegal trafficking, fishing, and mining, as well as a base for a growing number of armed gangs. Prior to their disappearance, Pereira had received threats for monitoring illegal activities in the region. Police later found that the pair were shot and buried in the forest.

In November 2024, Brazilian police formally charged the alleged mastermind behind the murders, Ruben Dario da Silva Villar, an alleged illegal fishing and poaching boss from the region where Pereira and Phillips were murdered, accusing him of arming and funding the criminal group responsible for the crime. Police confirmed that the murders had taken place because of Pereira's monitoring activities, demonstrating the measures criminal groups are willing to take to protect illegal environmental activities.

© Arthur How Wong

## 5.3.9 Drug trafficking

IWT – as a comparably lower risk area – has presented an attractive alternative to drug traffickers, with some criminal organisations moving towards the IWT in place of other illegal substances. In many cases, however, criminal organisations utilise their existing logistical infrastructure to become involved in both illegal wildlife and drugs trafficking. This may occur by camouflaging illegal drugs amidst legal wildlife (for example, transporting cocaine in hollowed out pineapples and coffee beans) or bartering illegal wildlife for drugs to avoid cash transactions – a methodology increasingly used by Chinese crime syndicates transacting with Mexican cartels. Criminals may also share smuggling routes and transportation methods, combining illegal wildlife and drugs and shared shipments.

By hiding the drugs inside animals, wildlife traffickers can not only increase their profits, but also reduce the likelihood of being stopped for drug checks along the way. Elsewhere, methamphetamine, cocaine and heroin have been found to be camouflaged inside hollowed out legal timber, utilising a legal product to conceal illegal drugs. While in some cases the drugs are hidden alongside dead animals, in others the animals are very much alive and stuffed full of drugs. The animals are then killed when the drugs are retrieved, or many die on the journey.

© Ola Jannersten / WWF - Sweden

Case study

## Mexican cartels and totoaba trafficking

Mexico has become a major hub for both wildlife and drug trafficking, especially for transnational criminal syndicates. This has likely been prompted by a combination of existing drug trafficking infrastructure, high levels of biodiversity, and the lack of strict wildlife trafficking penalties in Mexico. For example, the Sinaloa Cartel, primarily a drug trafficking group, has been linked to foreign organised crime groups. The cartel smuggles totoaba – an endangered fish endemic to Mexico – abroad, with a single swim bladder costing as much as tens of thousands of dollars.

Whereas traders in both legal and illegal wildlife commodities previously transacted directly with local poachers and fishermen, Mexican cartels have, increasingly, forcibly inserted themselves as middlemen, extorting both legal and illegal fishermen for fees, sometimes threatening violence for non-compliance, and once dominion over an area has been established, demanding that all catch be sold to them at a price of their choosing. They subsequently sell - at a hefty markup – to foreign traders and traffickers who move the product from Mexico's borders to other international markets. Not only has this put increasing pressure on the totoaba population – which is now considered endangered – it has also critically endangered the vaquita, a species of porpoise and the world's smallest cetacean, which is endemic to Mexico's Gulf of California, and which are often killed tangled up in illegal fishing nets trawling for totoaba, as by catch. Indeed, just nine vaquita are thought to be left in the wild today.

Some studies have identified a trend in which Mexican cartels illegally trade wildlife, especially higher-value marine species like the totoaba, with other international crime syndicates in exchange for chemical precursors for drug production – particularly for methamphetamine and fentanyl – which are then manufactured in Mexico and often smuggled across the border into the US. This enables cartels to forego the challenge of laundering illicit profits through other more traditional and labour intensive or convoluted means.

The practice of illegally trading wildlife for chemical precursors for drug production has been seen previously with South African gangs trading poached abalone, a marine snail which fetches high prices in Asia, where it is considered an edible delicacy, for chemical precursors for methamphetamine from national and international crime networks.

## 5.3.10 Human trafficking

As with many other forms of illicit trade, in IWT cases, the lowest level of labour – acquiring items for trade – is often performed by the poorest and most vulnerable individuals. In some cases, particularly where powerful organised crime groups are involved, such vulnerable individuals are trafficked away from their homes and coerced into poaching wildlife. Victims of human trafficking hold little power in these situations, as they are often illegally resident in the countries they are trafficked to, and dependent on their traffickers for food and housing. Highlighting the convergence between IWT and human trafficking encapsulates how the wildlife trade is mediated by complex socioeconomic issues, and the importance of attending to the specific vulnerabilities of front-line poachers and hunters. Illegal wildlife is also often smuggled over the same trafficking routes used for migrants, who frequently fall victim to traffickers along the way.

Case study

### Opportunistic convergence – trafficked labour and the tiger trade

In 2016, the Wildlife Justice Commission and the Department of Wildlife and National Parks Peninsular Malaysia conducted an investigation into the illegal trade in tiger parts in Malaysia. Investigators found an apartment in Kuala Lumpur occupied by eight Vietnamese men and seized a number of tiger skins and bear claws.

Later, officials found that the Vietnamese men had been trafficked to Malaysia to collect agarwood in the Malaysian forests, where the group also opportunistically poached tigers and collected wildlife products to earn money. Their passports had been withheld from them by their traffickers, to be returned only once they had earned enough money to cover their expenses. Further investigations revealed that the same syndicate responsible for trafficking these men had also recruited Vietnamese women to work in the sex industry in Malaysia, where they were similarly dispossessed of their passports and made to work until they had covered the costs of their transportation and housing.

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# 6. Conclusion



IWT is a serious issue that converges significantly with other crimes such as money laundering, corruption, sanctions evasion and human rights violations. Given the reputational and regulatory risks posed to firms and considering the growing scrutiny from investors, authorities, and the general public, tackling environmental crimes such as IWT is crucial. As governments and regulators seek evermore to legislate and regulate against both environmental and financial crimes, FIs have a key role to play and an opportunity to use their expertise and unique positioning within the financial system to manage exposure and aid law enforcement, protecting themselves, as well as people, nature and the economy, from converging crimes and predicate offences.

**The survey conducted for this report indicates the existence of a strong link between of environmental crime awareness and risk-mitigation responses, but concrete action still appears disproportionately low compared to perceived levels of risks and exposure to IWT**. Consequently, there is still space to reduce the gap between awareness and action.

**A productive intervention point is increased specificity of knowledge**. Survey results showed that respondents are familiar with some high profile species and broad high risk regions (i.e. continents) for IWT, but often lack specific and up-to-date information on sectoral risks for FI activity, key transit areas, supply and demand hotspots, risk typologies and CITES updates. This may be, in part, attributed to a lack of regulatory guidance and support from authorities. Nonetheless, FIs have a moral obligation as well as a number of strong economic reasons to enhance their internal capacity and procedures to better manage and reduce operational, legal and reputational risks from IWT.

Exposure to IWT-related risks can be systematically incorporated by FIs in their periodical business-wide, regional and sectoral risk assessments. Where such exposure is found amongst the client base, for example, frontline staff can be trained on the latest red flags and typologies, including transit routes, endangered and critically endangered species, so that they can identify and report these risks more readily. This should, in turn, feed into the body of environmental crime knowledge cultivated by FIUs, via the financial intelligence reported in SARs/STR. This will also assist, iteratively, the development and identification of new emerging red flags and trends and the related guidance, which will in turn aid both law enforcement and FIs in detecting and disrupting crimes like IWT more effectively.

To assist FIs in this mission, WWF and Themis have developed this report and the Environmental Crimes Financial Toolkit, as part of a suite of open access resources to enhance the response to IWT and connected financial crimes. The platform provides reporting guidance and up-to-date information on red flags, indicators and regulations, as well as a curated selection of case studies and best practices. Organised crime is constantly evolving in response to fast-changing legal, environmental and socio-economic factors. Therefore information sharing and concerted action are more vital than ever if we are to crackdown, together, on these criminal ventures.

# 7. In-depth case studies

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## 7.1 The illegal trade for Cheetahs – Luxury, social media and red-flag indicators

### Case study from our expert guest contributors

Ben Brook and Stephanie Pendry, TRAFFIC

Cheetahs are famous for being the fastest land animal and widely appreciated for their elegance and attractive coat patterns. Unfortunately, this allure and people's desire to possess them as status symbols and exotic pets is harming a species already facing serious threats from climate change, habitat loss and human-wildlife conflict. The IUCN Red List of Threatened Species classifies cheetahs as endangered, with only 6,500 mature individuals estimated to remain in the wild, and the species' overall population has fallen by 30% over the last 15 years. Research indicates that the illegal cheetah trade has been exacerbated by social media, which has promoted the association of cheetah ownership with luxury.[3]

The illegal cheetah trade was investigated in a CITES-commissioned study that found Eastern Africa, particularly Ethiopia and Somalia, had the highest number of reports, with the cheetahs transiting via the Horn of Africa and Yemen to Gulf States, where they have historic significance as royal hunting animals. At least 1,000 cheetahs are estimated to be kept as pets in Saudi Arabia, Kuwait, Bahrain, UAE, Oman, and Qatar. Furthermore, it is estimated that two out of three cubs poached from the wild die before being sold into the pet trade. Of those which do survive, most do not live past two years due to malnutrition, disease, and lack of veterinary care, as well as health issues resulting from being removed from their mothers too early. Although the exact origin and means of capture is unclear, research suggests that the animals are opportunistically collected or taken in retaliation for livestock predation and sold to animal traders who had previously made known to rural communities that they are interested in purchasing cubs.

Cheetahs are listed in Appendix I of CITES, which prohibits the international trade in wild-caught cheetah specimens for commercial purposes, except for annual quotas for hunting trophies and live specimens granted to Botswana, Namibia, and Zimbabwe.

While there are reports of 'captive bred' cheetahs from other countries, South Africa is the only country with CITES-registered captive-breeding facilities where live specimens can be legally traded internationally, primarily for zoos and safari parks. However, traders of species that are difficult to breed in captivity, such as the cheetah, will sometimes take illegal specimens from the wild. It was stated that the number of cheetahs declared for trade by the two CITES-registered South African breeding centres did not match the animal's reproductive capacity in captivity, raising questions on the legality of this trade.

Some Gulf States have reported strong progress in implementing strict legislation that prohibits the illegal import and private possession of the species with significant sanctions. However, despite initiatives to control internet-based wildlife crime, there is evidence that the issue of live trade in cheetah cubs remains a major threat to cheetah populations in the horn of Africa.

As reiterated during the COP15 of the Convention on Biological Diversity (CBD) held in 2022, local communities can play a fundamental role in biodiversity conservation, and particularly in the fight against wildlife trafficking, but some local, poverty-stricken communities who live amongst cheetah populations may turn to poaching for financial gains to improve their quality of life.

Law enforcement activity alone against rural communities in source countries is unlikely to be significantly effective as poaching opportunities may be sporadic with low levels of repeat criminality. Targeting the brokers responsible for controlling the illicit movement of these commodities may also help, as their role is more persistent, and the required knowledge, contacts and languages are likely harder to replace. Following the payments that facilitate and motivate these crimes can be a highly effective technique to identify these persistent wildlife traffickers. Prosecutions against brokers in the illicit cheetah trade are rare, but it is possible to identify patterns of activity that can help financial institutions spot transactions that could represent a risk of money laundering.

In 2020, an individual was sentenced to four years in prison in Somaliland. This perpetrator, recognised by authorities as a key figure in the illegal cheetah trade in the Horn of Africa, had previously been convicted of the same crime in 2018. He and his associate were intercepted with ten cheetah cubs following a targeted counter wildlife trafficking operation. Between July and October 2020, Somaliland authorities conducted a total of six operations in western Somaliland leading to the confiscation of 16 cheetah cubs and one leopard cub.

Traders in Yemen were understood to be making a considerable mark-up buying a cub for around USD400 and selling to a buyer for USD10,000 or more. Cheetahs are believed to be transported to Yemen by boat (dhow), and then reportedly moved by road across the Saudi border to animal markets such as Al-Jazan or Al-Khouba. As with many kinds of wildlife trafficking, corruption facilitates the illegal trade in cheetah cubs, with instances of illegally obtained cheetah cubs being sold back to smugglers by corrupt officials.

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The proliferation of the use of the internet to trade in live cheetahs has been the subject of growing concern. In 2022-23, TRAFFIC undertook an online survey using URLs from user profiles for listings involving live cheetahs and users that publicly engaged with them. This data revealed that of 222 unique URLs, 44% had a clear intention to trade in live cheetahs. This survey reaffirmed previous assessments that the internet continues to be used for trading in live cheetahs, for displaying live cheetahs as pets, and that social media was the dominant channel by which internet users displayed and attempted to trade live cheetahs for pets.

Surveyors noted the convergence of the trade in live cheetahs with other types of wildlife traded or considered as pets. Nearly 65% of the URLs analysed also contained evidence of other wildlife in trade, including other big cats (lions, tigers, leopards), reptiles, birds, antelope, primates, and other mammals. Concerted action against those displaying cheetahs as pets on social media and financial investigations to identify repeat traders offers a route to save this iconic species.

Based on the above, potential red flag indicators for FIs, investigators and law enforcement bodies include:

**Animal-related words in the payment reference**, particularly codewords that are known to be associated with IWT on internet forums and social media.

**Multi-species trade**: payments for any one illegally traded species may indicate there may be also other species involved.

**Prior convictions for IWT**: given the high profit and the relatively low-risk associated with IWT, criminals such as traffickers may be repeat offenders.

**Over-reliance on cash payments, round number sum payments, unexplained payments to government officials and port authorities** can be indicators of bribery facilitation payments.

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## 7.2 Financial Crimes and Illegal Trade in Bear Bile

### Case study from our expert guest contributors

Lynn Schlingemann, Environmental Crime Specialist, World Resources Institute

The bear bile trade from wild and farmed bears has been increasingly controversial due to the animal abuse [1, 2, 3] and unsustainable demand for wild Asiatic Black bear (Ursus thibetanus) and Sun bears (Helarctos malayanus), both exposed to significant poaching and classified as vulnerable to extinction by the IUCN Red List, and listed under CITES Appendix I.

Bear gall bladders produce bile which contains ursodeoxycholic acid (UDCA) used in Traditional Chinese Medicine (TCM) amongst 1,581 other types of animal medicine, for treating liver conditions, fever, convulsions, detoxification, inflammation, as well as other conditions. Since 2010, the TCM sector has more than doubled, comprising 28-40% of the Chinese pharmaceutical industry, with estimated revenue of 45.5 billion USD and 5 billion worth of exports to at least 128 countries.

#### Location and Legality of Bear Farming

Bear farms are mainly in Heilongjiang, Jilin, Sichuan and Yunnan provinces. Around 17,000 bears are estimated to be kept on some 67 Chinese bear farms. A bear can produce 2.2 kg of bile over a 5-year production life. All international trade of the Asiatic Black and Sun Bear bile is illegal under CITES. Legislation has restricted or completely banned the production and trade of bear bile in South Korea, Cambodia, Malaysia, Myanmar, Singapore, Thailand, Vietnam and Lao PDR. Domestic trade of bile appears legal Japan, and it is legal in China, provided it originates from bears kept in farms from captive stock. Only bear bile with specific government approval can be sold commercially with the approval denoted by a special label indicating that the bile is from a legal source under government management.

Despite this and international pressure to end bear bile trade, the demand continues and is further propagated by legal farms inside China and through existing pre-legislation farms in other countries. Wild cubs are laundered through farms, and gall bladders are also harvested through hunting and imports from Russia and SE Asia. Several reports suggest there is an expanding number of bears in foreign-owned bile farms operating in Specific and Special Economic Zones (SEZ) in northern Lao PDR facilitating trade to Thailand, Myanmar and China. The Golden Triangle in Bokeo Province is considered a hotspot for IWT and has the highest foreign – mainly Chinese - labour of all SEZs in Lao PDR.

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## The Bear Bile Market

TCM products including bear bile are often sold in pills (0.85 USD/per pill) or vials (1 cm3 at ca. 5 USD/vial), gall bladders (180 USD/bladder or 12 USD/gram) [1, 2, 3]. Assuming that an average store sells 5 x 50-pill packages a month (ignoring other bear bile products), the sale per year would be 2,550 USD/store. It is estimated that there are about 609,000 pharmaceutical stores in China [1, 2]. Despite high levels of uncertainty and the lack of up-to-date data, if the share of stores selling bear bile products of 20-56% is representative [1, 2, 3], the number of TCM stores in China selling bear bile products could be around 120,000 - 340,000, with revenues between 311-871 million USD annually. This would put the bear bile pills, one of the most common bear bile product, at around 0.7 - 1.9% of TCM pharmaceutical market, although great uncertainty exists around such estimates.

Several challenges exist when investigating financial crimes linked to the bear bile trade. Firstly, illegal and legal bear bile products are mixed; secondly, fraudulent products are common (e.g. use of pig bladders); thirdly, illegal amounts made per sale are small, involve several hundred thousand stores and millions of buyers. This would not raise red flags in the banking system and is symptomatic for many parts of IWT.

## Response

Frontline law enforcement against poaching and influencing consumer behavior are important. In addition, and given the continued growth in TCM pharmaceuticals, exerting pressure on the large Chinese pharmaceuticals that control around 78% of the TCM retail market is fundamental.

When it comes to tackling financial crimes linked to the bear bile trade, major financial institutions, investment companies and pension funds across Australia, Canada, the EU, Japan, Switzerland, the UK and USA, can play a key role in increasing pressure to stop the illegal trade in bear bile. By investing in the production and sales of Chinese TCM pharmaceuticals containing wildlife products, they are making profits from the eradication of threatened and iconic wildlife species like tigers, pangolins and bears, representing a considerable reputational and possibly even legal risk.

## 7.3 Top-level wildlife criminal's reliance on cash and bank transfers

### Case study from our expert guest contributors

Jenny Feltham, Wildlife Justice Commission

#### Background on the case

Nguyen Van Nam – also known with his criminal alias Ah Nam – was one of Vietnam's top wildlife criminals and lead broker for a criminal network, responsible for trafficking at least 477 kg of rhino horn and 17.6 tonnes of elephant ivory worth over USD 17 million from Africa to China via Vietnam between 2016 and 2019. A key subject in Wildlife Justice Commission (WJC) investigations for three years, he was arrested in Hanoi in September 2019 in connection with the illegal trade of 204 kg of ivory and sentenced to 11 years in prison in July 2020.

#### How the network operated

Ah Nam sourced his products from various supply networks in South Africa, Malawi, Angola, Mozambique, Nigeria and Zambia, and cooperated with specialist transporters to move shipments to Asia. His preferred method was to ship consignments via air cargo from Africa to Malaysia and then on to Vietnam. Smaller quantities of rhino horn could be smuggled in the personal luggage of couriers travelling to Hanoi by plane, and some larger consignments were known to have been smuggled by sea on container ships.

Once the products were safely imported into Vietnam, Ah Nam employed a network of caretakers to store them in the backrooms of residences, shops, or factory-like premises in several locations outside of Hanoi. After buyers were secured, packers were responsible for cleaning, preparing and packaging products for delivery. Ah Nam's customer base was predominantly Chinese wholesale traders. Products were delivered overland to China by truck. Legitimate local businesses trading agricultural products, vegetables, and fruit from Vietnam to China were suspected to be used as a cover for the deliveries.

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Images of large amounts of Vietnam Dong cash handled by Ah Nam and his wife that were obtained during the investigation. **Source**: Wildlife Justice Commission.

### Opportunities to follow the money

Ah Nam's access to millions of dollars' worth of wildlife products and high rate of product turnover, particularly for rhino horn, indicates the presence of significant illicit financial flows. Authorities did not conduct a financial investigation in this case, although multiple entry points in Ah Nam's operations presented opportunities to follow the money.

Most pertinent were the specific bank accounts known to be used to receive payments for goods consistently for at least three years. Also relevant was the known use of cash couriers to physically transport money between parties across the China-Vietnam border. These payment methods pointed to a heavy reliance on the use of cash, and evidence of Ah Nam's wife depositing large amounts of cash to banks in Vietnam should have raised red flags for further investigation.

Proceeds of crime were suspected to be laundered through legitimate businesses that could receive large cash deposits with less suspicion, such as timber businesses connected to Ah Nam's right-hand man and potentially the real estate business run by Ah Nam's wife. Furthermore, Ah Nam appeared to have no legitimate form of employment, yet lived an affluent lifestyle owning multiple houses, driving expensive cars, and flaunting luxury items and wealth. It is highly plausible that illicit proceeds from Ah Nam's criminal activities could have been used to purchase such high-value assets and goods. Financial investigation in this case may have yielded evidence of unexplained wealth that could have formed the basis for asset seizure and recovery.

Finally, following the money can lead to the identification of other people or companies connected to the offence. In this case, financial investigation may have revealed other high-level actors who were collaborating with Ah Nam, or corrupt facilitators supporting the importation of shipments or providing protection against law enforcement action.

## 7.4 The convergence between illicit finance and IWT

### Case study from our expert guest contributors

Julia Yansura, Program Director for Environmental Crime and Illicit Finance at the Financial Accountability and Corporate Transparency (FACT) Coalition

Environmental crimes are among the most lucrative illicit economies in the world. In the case of the illegal wildlife trade (IWT), there is a close, highly symbiotic relationship between the trafficking of these species and the dirty money driving the trade. In fact, IWT is often accompanied by a variety of financial crimes. In many instances, the profits from IWT are re-invested in criminal organizations, which, depending on the jurisdictions and groups involved, may constitute terrorism financing. Moreover money laundering and corruption, including paying bribes to government officials, are a common practices that facilitates IWT. Unfortunately, law enforcement responses to IWT focus mostly on the physical trafficking – such as recovering the wildlife and arresting the traffickers – but largely neglect the financial aspects of the crime.

In an effort to better understand these financial strategies used by criminals and give law enforcement more effective tools to follow the money, the Financial Accountability and Corporate Transparency (FACT) Coalition has been conducting research on money laundering methods used in environmental crimes, including IWT. Drawing on publicly available information from official sources, 230 environmental crimes committed in the Amazon region over the past 10 years were identified. Among these, 36 cases involved IWT. The cases were quite diverse but included the trafficking of (in order of prevalence): lizards and iguanas, turtles, parrots other bird species, and boa constrictors or pythons. It appears that authorities were able to identify foreign jurisdictions in 42% of the IWT cases, signalling a strong transnational component to these crimes. The US was the most frequently mentioned foreign jurisdiction, followed by Germany.

FACT's analysis also shows strong evidence of crime convergence with drug trafficking, corruption, and weapons trafficking in IWT cases. In only 8% of the cases (3 out of 36) did authorities appear to follow the money and conduct a parallel financial investigation. These three instances suggest that some of the typologies being used to move and launder the proceeds of IWT include the use of shell or front companies, bulk cash smuggling, and the use of financial institutions.

In March 2024, for example, the Colombian Attorney General's Office announced charges against the Harpy Network, a criminal group involved in exotic animal trafficking. Members of the network extracted fangs and feathers from jaguars, harpy eagles and macaws and then trafficked them on social media under the pretext of selling local handicrafts. According to Colombian authorities, the Harpy Network had been involved in wildlife trafficking since 2021, when 94 harpy eagle body parts were seized at Bogotá's El Dorado airport on their way to international destinations. Colombian prosecutors identified at least 10 instances of IWT occurring between 2021 and 2022 in which members of the Harpy Network were involved. In April 2022, the leader of the network allegedly sold a necklace with a jaguar fang, valued at one million Colombian pesos (approximately 230 USD). By tracing the route of the money, prosecutors were able to ascertain that payment for IWT occurred through bank transactions and money orders. More than 20 payments were made between December 2020 and April 2022 through a variety of channels.

Following the conviction of three members of the network in November 2024, the regional government of Bogotá provided additional details on the case. Inside a package, authorities had found two claws, 92 harpy eagle feathers, and an antelope horn valued at approximately US$2,000. They also noted that the products were coming from Putumayo, Colombia in the country's southern Amazon region and appeared to be heading to Texas in the United States.

While this case is in many ways a success story for Colombian authorities, it also exemplifies some of the challenges associated with following the money in IWT cases. Numerous small transactions between 200 and 2000 USD, passing through different channels can be very difficult to detect in an AML system that was primarily designed to address large financial flows associated with narcotics trafficking. Going forward, government authorities should continue to follow the money, as they did in the Harpy Network case. However, they should also work with financial institutions and subject matter experts to develop red flag indicators specific to IWT, taking into consideration its unique characteristics and the challenges associated with smaller transactions.

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## 7.5 Sanctions and superyachts. A deep dive into Myanmar's illegal Teak trade

### Case study from our expert guest contributors

Chen Hin Keong, Ben Brock & Stephanie Pendry, TRAFFIC

The attractive patina of teak combined with its hardwearing and water-resistant properties have created international demand for its use in furniture and decking of luxury yachts, creating a high-value global trade in this precious wood. Heavily targeted by illegal logging, Myanmar teak, 'Tectona Grandis', grows naturally in Myanmar and in recent years has made up a quarter of the teak logs harvested globally. Teak harvesting has contributed significantly to Myanmar's forest loss and degradation; forest inventories indicate massive declines in tropical hardwoods in Myanmar since 1996, with teak as one of the worst affected species.

Illegal logging of all types, not just teak, causes significant financial losses for the country. In 2020 Myanmar lost an estimated USD10 billion to illicit logging, approximately equal to 12.5% of the country's GDP of USD79 billion for that year. Around 80% of Myanmar's illegally logged timber is assessed to be smuggled to China and India. Myanmar's porous eastern border with China has long allowed movement of illicit timber into south-western China and is facilitated by complicit actors on both sides. In February 2021, the Myanmar military declared a state of emergency and removed the newly elected government. This has caused the security environment to deteriorate in many parts of Myanmar and immense suffering for the people. With national and local governance in turmoil, regulation and enforcement have weakened.

In 2022 the Financial Action Task Force (FATF) added Myanmar to its "blacklist" of high-risk jurisdictions. This decision called for all jurisdictions to apply enhanced due diligence to protect the international financial system from the money laundering, terrorist financing, and weapon-proliferation financing risks emanating from the country.

The same year, the US Office of Foreign Assets Control (OFAC), which administers trade sanctions in support of U.S. national security and foreign policy objectives, placed restrictions on a number of elements associated with Myanmar's state-owned enterprises (SOEs). OFAC assessed these SOEs were responsible for generating about half of the regime's revenue and the largest of these SOEs are in the natural resources sector including the "Myanma Timber Enterprise" (MTE).

A Global Initiative against Transnational Organised Crime study in 2021 described that businesses operating in the illegal-timber trade rely on corrupt connections to the state-owned MTE as well as military and armed groups to enable their participation. A senior businessperson who had worked for many years in Yangon declared that: "*to succeed in the timber business you need to have connections, but you don't have to be somebody's son. Illegal timber is pretty attractive because you just need to find a buyer, but drugs and everything else need more investment, people and planning.*"

Given the strong sanctions and financial restrictions in place around Myanmar and particularly around Myanmar timber, it could be expected that this would prevent trade flows to countries that endorse sanctions such as the EU, UK and USA. However, recent cases have shown that this illicit trade persists and brings threats of evading sanctions, money laundering as well as breaching environmental protections to businesses and their partners.

In December 2024, British luxury yacht manufacturer Sunseeker International Ltd was fined almost USD450,000 for importing illegal teak from Myanmar. This marks the first prosecution under the new UK Timber and Timber Products Regulations. A week later a Dutch Shipyard, Oceanco, was fined just over USD150,000 by the Netherlands Public Prosecution Service for violating the European Timber Regulation (EUTR) through its alleged use of Myanmar teak in teak furniture and interior finishings.

In 2021, the German company WOB Timber was ordered to pay a €3.3 million fine and its director was sentenced to 21 months in prison for evading EU sanctions on 31 separate timber shipments from Myanmar between 2008 and 2011. The court found that the company routed shipments of timber from Myanmar through Taiwan, declaring it the country of origin. More recently, the Environmental Investigation Agency reported that European timber traders (including WOB Timber) have been using Croatian intermediaries to continue importing illicit timber from Myanmar, in contravention of international sanctions.

However, a new ruling from the EU Court of Justice following an appeal of the 2021 conviction found that Myanmar teak processed into sawn wood in Taiwan actually confers Taiwanese origin, and that the EU sanctions only cover goods imported in the EU directly from Myanmar. It is yet to be seen how the German court will apply this ruling.

In another case, Dutch companies were found to be illegally importing Myanmar teak. To circumvent EU regulations, they established a shell company in the Czech Republic. This company imported teak to the Czech Republic, making it the first point of entry into the EU, shifting responsibility away from the Dutch companies. However, investigations revealed that the Dutch companies placed orders with Myanmar exporters, arranged transportation, and ultimately financed the imports. Financial transactions were deliberately routed through Croatia and Singapore to obscure the origin of funds. Local authorities intercepted communications and conducted joint financial investigations with Czech and Croatian counterparts. This evidence linked the Dutch companies to the illegal imports, demonstrating their active role in the scheme despite attempts to conceal their involvement.

Based on the Amsterdam District Court judgment dated 12-12-2022 (Case numbers 81/052745-22, 81/052765-22 and 81/052725-22), criminal charges – including money laundering – were filed against the Dutch companies and their officials for knowingly importing illegal timber and engaging in fraudulent activities to evade regulatory scrutiny. In December 2022, the company officials received community service sentences and 65 tonnes of seized teak timber (valued at EUR1,200,000) was forfeited.


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## 7.6 Hong Kong IWT crime syndicates – the evolution of governance and law enforcement

**Case study from our expert guest contributors**

Sam Inglis & Hilary Lai, ADM Capital Foundation

Over the last decade (2013-2023), authorities in the Hong Kong Special Administrative Region (Hong Kong) have disrupted nearly 4,700 wildlife trafficking attempts, seizing over 2,800 metric tonnes of wildlife, with a conservative total estimated value of HK$1.3 billion (USD167 million). Despite disrupting these operations and making around 3,000 arrests (of which at least 1,284 resulted in convictions), organised criminal groups (OCGs) continue to operate in the city.

Local authorities have recognised that wildlife crimes in the city are linked to syndicates since at least 1994, when the Hong Kong Police Force committed to "investigate any possible organized crime that might be involved in such illegal [wildlife] trade." However, law enforcement agencies (LEAs) broadly have long struggled to reach financiers and facilitators beyond the "mules" or "couriers". Indeed, for many years, the Customs and Excise Department (C&ED) characterised wildlife trafficking incidents as "isolated cases" in annual reports.

Seeking to bolster the Government's efforts, promote increased vigilance and encourage deterrent action against wildlife trafficking, a coalition of around 100 experts in wildlife trade, wildlife crime, policy reform, law, etc. was formed in 2015 – the Hong Kong Wildlife Trade Working Group (HKWTWG). As of 2018, the group had developed a comprehensive report highlighting how Hong Kong had been repeatedly exploited by criminal syndicates, as well as examining facets of the illicit trade such as the species involved, transit routes, the modus operandi of traffickers, etc. The HKWTWG engaged the Hong Kong Government and lawmakers through fora such as the 'Interdepartmental Task Force on Wildlife Crime' and Legislative Council ("LegCo") Redress System.

Over the years of engagement, significant progress has been made. Starting in 2018, penalties for trafficking offences were increased and a ban on the ivory trade was phased in. LEAs began to take substantive actions, seizing large volumes of high value wildlife products, and specialised units were enlisted in wildlife crime investigations. Seizures in Hong Kong peaked in 2018 and 2019, with over 1,400 seizures in those two years alone. The C&ED's Syndicate Crimes Investigation Bureau (SCIB) – responsible for cases involving "organised and serious crime" and "suspected ML elements or a large sum of suspected crime proceeds" – was deployed to investigate several notable wildlife trafficking cases. These included Hong Kong's most significant seizures (to date) of ivory (7.2 MT in 2017), pangolin scales (8.3 MT in 2019) and rhino horn (82.5 kg in 2019).

As specialised LEAs stepped up involvement and seizure numbers spiked, it was hoped that syndicates would be detected, disrupted and, ultimately, dismantled. However, it became apparent that there were still barriers to apprehending the so-called "masterminds". Despite SCIB's involvement in investigations, no prosecutions were initiated in any of these cases, despite the clear involvement of OCGs.

Observing these developments, the HKWTWG set to work updating their analysis and also developed a white paper, co-authored by the University of Hong Kong and legal experts, released in 2020. The paper proposed bringing wildlife crimes under the Organised and Serious Crimes Ordinance (OSCO, Cap. 455). Legislative Councillor Hon. Elizabeth Quat, a sponsor of Hong Kong's ivory ban, introduced a private members bill to amend OSCO in 2021 to provide "additional powers of investigation into certain crimes and proceeds of crime, the confiscation of proceeds of crime and related matters." In the following months, local and international civil society organisations (CSO), the private sector, Chambers of Commerce and other governments expressed support for the reform.

Vitally, the Government openly acknowledged the organised nature and enforcement challenges they faced in wildlife trafficking investigations – raising concerns during proceedings with the LegCo Panel on Security and Panel on Environmental Affairs. In March 2021, the Security Bureau (SB) reported that "crime syndicates resorted to smuggle larger volume of endangered species by means of cargo shipments" over the COVID-19 period and that investigators struggled to gather evidence partially because "the masterminds of the wildlife crimes [...] were located in other jurisdictions."

With overwhelming support from lawmakers, Government and civil society, the Ordinance was successfully amended on 27th August 2021, adding certain offences under the Protection of Endangered Species of Animals and Plants Ordinance (PESAPO, Cap. 586) to Schedule 1 to the OSCO. This reform critically equipped LEAs with a far greater suite of powers to delve more deeply into the OCG networks, trace illicit financial flows, freeze and seize proceeds and assets, as well as to enhance sentences.
In the wake of the amendment, authorities continued to seize wildlife, especially as the frequency rebounded in the aftermath of COVID-19 – many were high volume and high value. Between August 2021 and December 2024, there were at least 66 wildlife seizures where the value exceeded HK$1 million (USD128,370). Eight were valued beyond HK$100 million (USD13 million), with two involving commodities valued at HK$1.2 billion (USD154 million) and HK$1.5 billion (USD193 million). Despite these successful interventions, prosecutions and convictions appeared limited to low-level operatives.

In 2022, the Financial Services and the Treasury Bureau (FTSB) provided its assessment, stating that wildlife trafficking posed "only a limited threat to Hong Kong" and that "most of the local arrestees are so-called 'mules' or 'couriers' without involvement in the associated ML activities." From 2015 through 2023, local authorities did not initiate any financial criminal prosecution in relation to wildlife trafficking.

This changed in January 2024, when authorities, for the first time, levelled charges for both money laundering and wildlife crime against an individual who had previously been arrested in a cross-boundary smuggling attempt involving corals (DCCC1048/2024 - ongoing). The C&ED noted that 6,700 transactions involving about 700 third-party accounts had been made over the course of 2.5 years. Shortly thereafter, in February 2024, enhanced sentences were sought in two cases convicted in February 2024 (DCCC491/2023 & DCCC492/2023 - concluded). The defendants were both sentenced to 30 months imprisonment, following a 25% increase.

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Since these cases, there has been no further information on OSCO being applied in wildlife cases. Evidently, there remain barriers to the regular application of these powers. Positively, there is a growing interest from other agencies. Notably, the Customs Financial Investigation Bureau (CFIB) has come to the fore, actively seeking information and allies from civil society and overseas law enforcement. Its tasks include "cooperation and intelligence exchange with local and foreign law enforcement agencies and financial institutions, to tracing the illicit fund flows, freeze and confiscate criminal proceeds," making it a critical entity in efforts to identify, freeze and seize illicit funds and assets.

The progress in Hong Kong has potentially also contributed to trigger both further local actors supporting IWT interventions domestically – for instance with the December 2023 IWT Threat Profile Report created by ADMCF, UfW and WWF to highlight country-specific wildlife crime risk indicators – as well as comparable action in other jurisdictions. For example, in August 2024, Singapore included wildlife offences within the Organised Crime Act. As wildlife crime gains global attention, continuous mitigation measures from government agencies, financial institutions and related stakeholders (e.g. CSOs) are essential to address the risks effectively.

Collaboration across sectors is crucial, especially with financial institutions, as they form the frontline for detecting illicit financial flows associated with wildlife trafficking offences. The Hong Kong Government acknowledged in 2022 that that it would seek to "collaborate with the banking sector on suspicious bank transactions relating to illegal wildlife trade-related ML activities".

Fundamentally, it is critical to identify how Hong Kong authorities can move beyond the current situation, with illegal business continuing as usual. Measures such as ramping up intelligence sharing to other jurisdictions, facilitating information flow with and between financial institutions, pursuing local members of international syndicates and seizing and freezing the assets associated with OCGs would all be positive steps, furthering Hong Kong's ambition to detect, disrupt, dismantle and deter organised and serious wildlife trafficking.

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# 7.7 Alarming cases of turtle seizures in Madagascar: A highly organised mafia network

### Case study from our expert guest contributors

Faramalala Andriamparany, Transparency International Madagascar

#### A Wake-Up Call

Large confiscations of endangered tortoises are not new in Madagascar. In just one month, between late December 2024 and January 2025, over 2,700 tortoises were seized as reported by the Turtle Survival Alliance (TSA), underscoring the mounting pressure on Madagascar's biodiversity. The seizures primarily involved juvenile tortoises, presumably intended for export. Wildlife trafficking represents a critical challenge for the country, making the dismantling of trafficking networks an urgent priority.

#### A Trafficking Network Dismantled by Malagasy Authorities

Thanks to the joint efforts of Madagascar's mixed investigation unit, comprising the Ministry of Environment and Sustainable Development, the Ministry of Public Security, and the Ministry of National Gendarmerie, a highly organized trafficking network has been dismantled. A case in Thailand – where 1,248 endemic species, including 1,200 tortoises and 48 lemurs from Madagascar, were seized – drew significant international media attention. Following extensive efforts by both countries to repatriate these animals, this case revealed the existence of a powerful mafia network plundering Madagascar's natural resources. Subsequently, numerous seizures were documented by local authorities, amounting to 2,735 tortoises within a single month. Toward the end of the year, a high-profile case shook the media: a deputy and their collaborators were arrested for trafficking of 112 tortoises.

Intensive investigations were carried out across various regions of Madagascar to track down the perpetrators behind these seizures. With the help of a national and international informant network and inquiries conducted across different regions, all links in the chain were identified, from local gatherers to the masterminds. A total of 19 individuals were arrested and detained, including 13 men and 6 women. Furthermore, through collaboration with the Ministry of Environment and Sustainable Development and international stakeholders, key foreign orchestrators – two Chinese nationals and one Tanzanian – were recently apprehended in Tanzania.

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### Corruption Risks in Illegal Tortoise Trade Cases

These recent cases demonstrate that a high-level trafficking network is active in the country, mobilizing substantial financial and human resources. According to a report by Transparency International Initiative Madagascar, the tortoise supply chain is undermined by corruption risks, including influence peddling, bribery, and abuse of power. The report identifies the most severe corruption risks at several stages: tortoise collection and gathering, the referral and preparatory investigation process, the judicial phase, and customs at ports and airports.

Studies and observed cases distinguish two categories of corruption within this type of trafficking: "corrupt-traffickers" and "corrupt-accomplices." Corrupt traffickers are the direct actors within the tortoise supply chain, sometimes even masterminds of the illegal trade, who hold public office, such as senior officials or politicians. Corrupt accomplices are those who can be bribed occasionally or regularly at various points in the chain, including local community members, law enforcement agents, and customs officials.

### Investigations Requiring Deeper Financial Probes

Illegal tortoise trade cases are often tied to financial crimes, given the lucrative nature of the market. According to an investigation by the journalist network of the NGO Malina, depending on their size, a turtle's price is around $10 on the local market but can attend around $890 on European and Asian markets. The recent Thailand case illustrates how traffickers manage to move thousands of tortoises, representing enormous amount of money, raising questions about the traceability and scale of these illicit flows. This highlights the critical need for financial investigations in wildlife trafficking cases, an area still underdeveloped in Madagascar. Such investigations, which focus on financial crimes, are essential for targeting mafia networks, identifying accomplices, and swiftly freezing assets to dismantle networks efficiently.

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# 7.8 Laundering the proceeds of crime from IWT

## Case study from our expert guest contributors

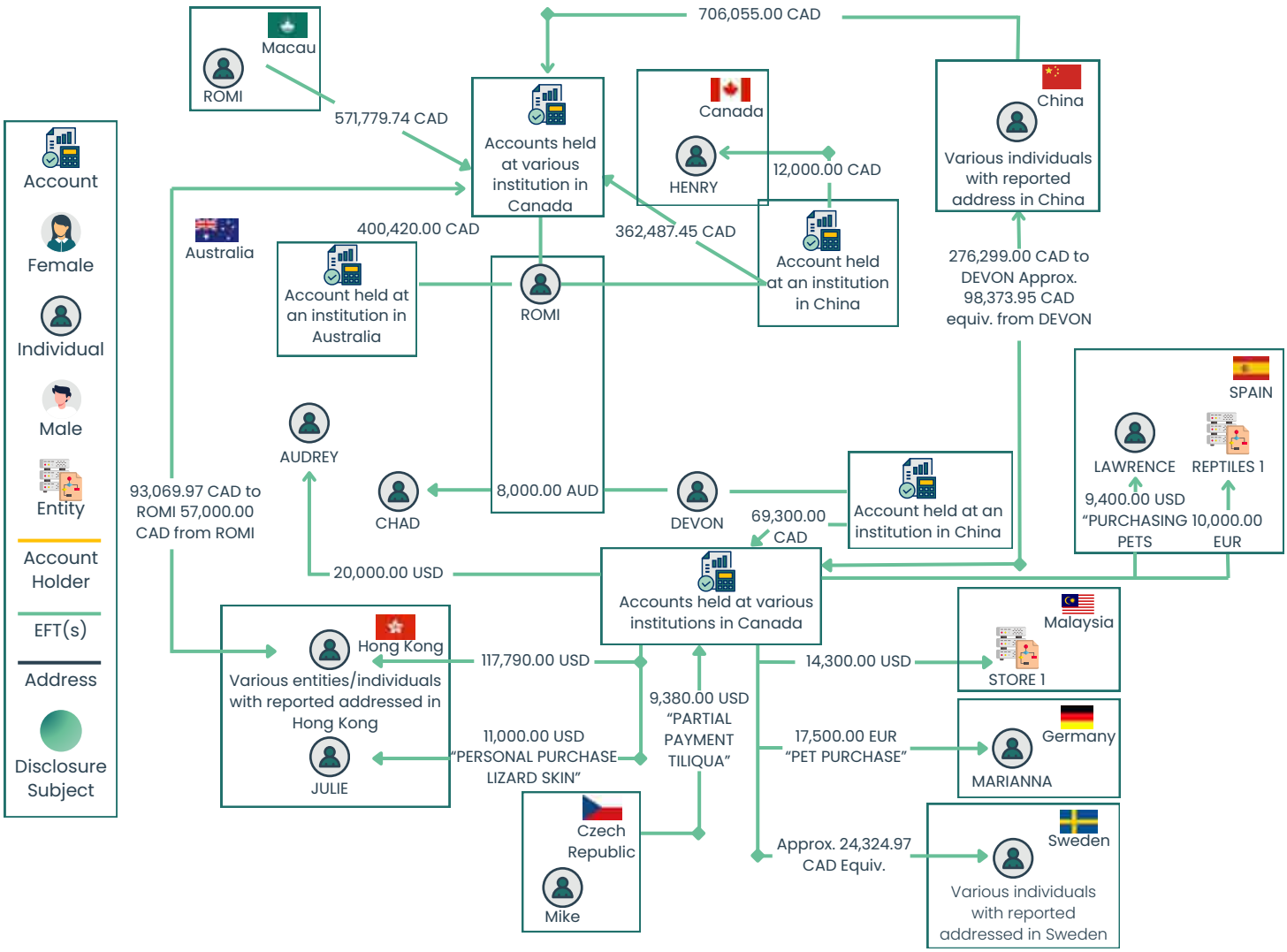
**F**INTRAC

(Adapted from Operational alert: Laundering the proceeds of crime from illegal wildlife trade)

This case study demonstrates the international nature of an IWT investigation, the critical importance of suspicious transaction reports (STR) and following the financial flows associated with this crime. Part 1 illustrates international financial links and Part 2 is focused on how two of the individuals are linked.

### Part 1: International Links

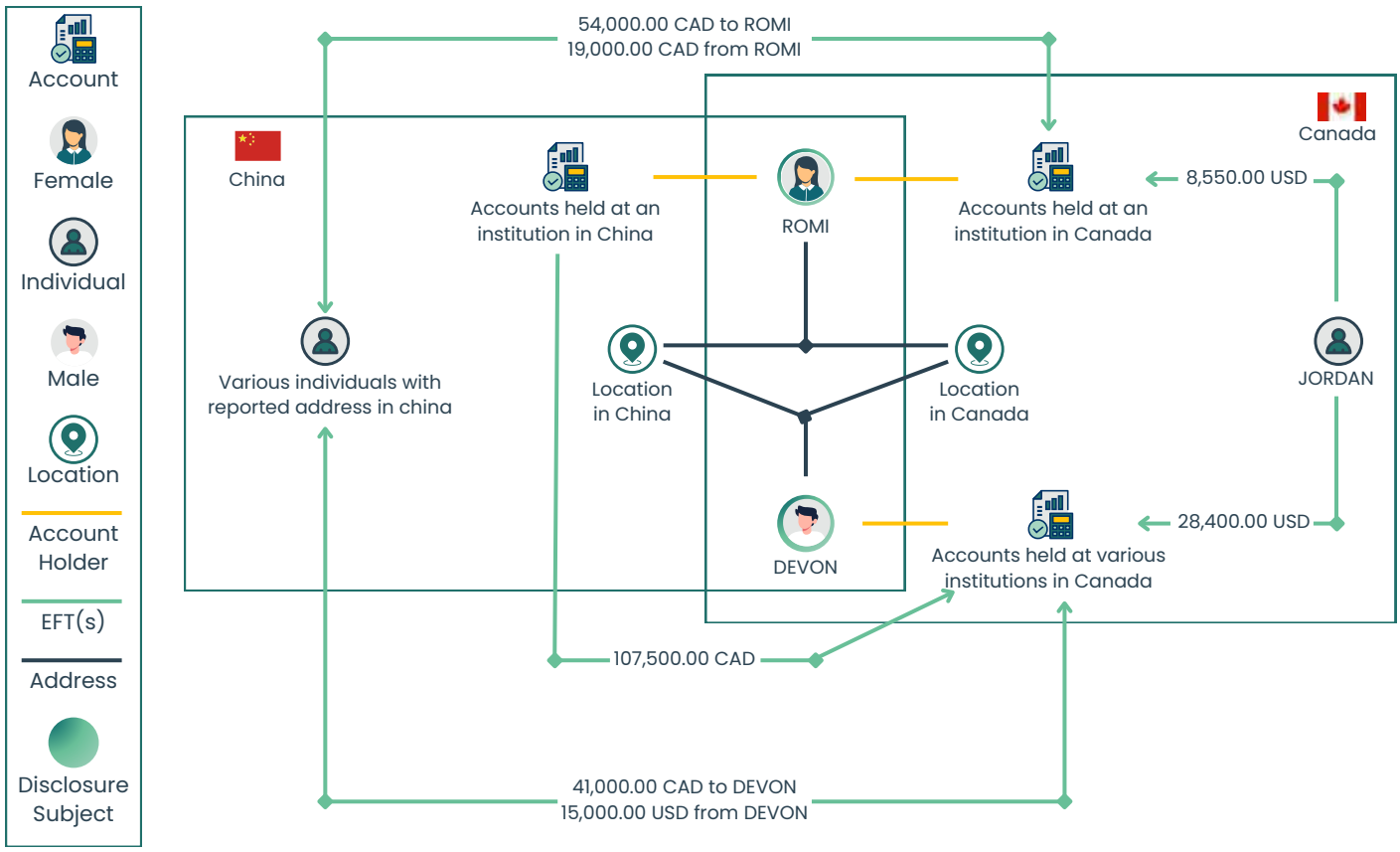
An STR submitted to FINTRAC identified CHAD and DEVON (aliases) as conducting transactions consistent with laundering the proceeds from IWT. Information shared by a foreign financial intelligence unit corroborated the STR and revealed information on an additional individual, ROMI, suspected of being involved in the same IWT activity. ROMI was reported to be sending herself funds through electronic funds transfers (EFTs) from her bank accounts held in Australia and China, which are jurisdictions of concern for wildlife crime, to her bank account in Canada. This pattern of layering transactions through multiple accounts is a common method for committing or attempting to commit a money laundering offence.



DEVON was reported as ordering EFTs to the benefit of various entities and individuals, including himself and CHAD, with reported addresses in numerous countries, some of which are jurisdictions of concern for wildlife crime. Additionally, two EFTs included transaction details referencing species or animal parts of concern for illegal wildlife trade, including, "PERSONAL PURCHASE LIZARD SKIN" and "PARTIAL PAYMENT TILIQUA". One of the entities receiving funds was STORE 1, a company that open-source information describes as engaged in supplying rare reptiles. As such, it is possible that the EFT to STORE 1 was a payment.

### Part 2: Connections Between ROMI and DEVON

Analysis of financial intelligence identified that ROMI and DEVON share the same addresses and that they each ordered and received EFTs in relation to the same individuals with reported addresses in China, a jurisdiction of concern for wildlife crime. One can reasonably assume that they are known associates, if not family members. Furthermore, ROMI and DEVON were also reported as receiving EFTs from JORDAN, who was identified by open-source information as the owner of JORDAN REPTILES, which produces captive bred reptiles. As such, JORDAN was identified as being involved in an animal-related business and it is possible that these EFTs were payments. The chart below depicts these connections.



## 7.9 Money laundering and reptile trafficking

### Case study from our expert guest contributors

Geraldine Fleming, SAMLIT IWT Taskforce; United for Wildlife
(First published by SAMLIT IWT Taskforce in August 2024)

This case study shows how two investigations into the trafficking of CITES-protected Sungazer Lizards from the Northern Cape in South Africa were linked, via mobile phone analysis and financial transactions, and led to convictions for wildlife trafficking and money laundering. Furthermore, this initial investigation, and the tenacity of the investigating team, unveiled a syndicate involved in the international distribution, collection and selling of reptiles to foreign countries spanning more than eight countries, and led to a global investigation.

#### Investigative successes and lessons learned

Investigative steps not only focused on the investigation at hand, but on all relevant evidence, which led to the identification of aspects relating to the unsolved 2019 case. Law enforcement authorities, led by South Africa's Department of Forestry, Fisheries and the Environment (DFFE) collaborated with counterparts abroad, and used multiple investigative techniques into these illegal wildlife crime syndicates. The financial flows analysis led to convictions for both the IWT predicate offences and associated money laundering charges. In-depth analysis of Accused One's mobile phone by the DFFE and INTERPOL led to the identification of several other individuals in various countries. Understanding of the financial flows also expanded the investigation into the INTERPOL environment where all affected countries came together for a case discussion action plan.

#### Follow up

Evidence downloaded from Accused One's mobile phone, together with identified payments via money transfer services has been handed by SA authorities to INTERPOL, and additional investigations have subsequently been opened in Tanzania, Germany, China, Cameroon, Mexico, Indonesia, Solomon Islands and Singapore.

#### Case type and background

Two German nationals were involved in the catching, transporting and selling of reptiles such as lizards, geckos and tortoises in South Africa. Accused One was internationally known for his potential involvement in the illegal reptile trade, advertising openly on social media. Following a direct approach from him, a member of the public reached out to South Africa's DFFE, who followed up. A Section 252A authority was obtained in terms of the Criminal Procedure Act with the assistance from the Directorate for Priority Crime Investigation (DPCI), permitting investigators to use extraordinary investigative techniques, and ensuring all information obtained would be admissible in court. The investigating officer sold three tortoises to Accused One and Two, at which time they were arrested. Accused One had previously been identified as a German national but Accused Two was unknown until the time of arrest. Accused Three and Four (wife of Accused Three) were identified during an analysis of Accused One's mobile phone and were subsequently linked to an unsolved 2019 case involving Sungazer lizards.

### Modus operandi, typology and accused profile

Accused One and Two travelled to South Africa on numerous occasions in 2015 and 2019. They obtained reptiles to sell abroad, either by using a hire car, staying at guest houses, and physically catching special protected and endangered animals or by buying the creatures from other individuals (such as Accused Three and Four). They travelled with the equipment necessary to locate and catch these animals. To catch and/or purchase the animals, they used social media and scientific papers to assist them in understanding the trade, distribution, and geographic location of the species.

When animals were purchased from suppliers (such as Accused Three and Four), Accused One and Two requested they be disguised in gift baskets and sent by courier to avoid legal processes and detection. Animals the accused caught personally were hidden in their suitcases eg, tortoises were taped and placed inside socks.

Separately, in 2019, Sungazer lizards intended to be shipped to Germany were detected at the International Mail Centre at OR Tambo International Airport. Accused Three and Four were identified after the arrest of Accused One in 2021, from analysis of detailed text conversations pertaining to the couriered lizards. Accused Three had initially wrapped the lizards in teddy bears and attempted to post them, using false information, which hampered his identification initially. Accused One paid Accused Four for the lizards via a US financial technology company, which was referenced in the phone messages. Lifestyle indicators showed that Accused Three and Four were living beyond their means and driving expensive cars. The syndicate investigated in South Africa consisted of two German nationals (aged 33 and 52) and two married South African nationals, aged 33 at the time of arrest.

### Financial flow indicators

Analysis of the text messages between the accused was used to detect the flow of the proceeds of crime. Relevant banks were engaged in the early stages of the investigation, assisting with the gathering of evidence on money laundering charges through SAMLIT. A financial technology company in the United States was contacted and shared a South African bank account number with South Africa's Financial Intelligence Centre (FIC), who then requested bank statements from the bank concerned. Accused One transferred funds for the Sungazer lizards to the account of Accused Four, via money transfer services, who received proceeds into three different bank accounts from the illegal selling of wildlife and disguised its source. An additional investigation is currently being conducted into payments made by Accused One via money transfer services to unknown parties in several other countries.

## Legal proceedings

### 2021 case

Charges: Accused One and Two: trade in special protected species, transport of such species, possession and attempt to export such species (undercover operation).

Sentences: Accused One: 11 years' imprisonment or a R 175,000 fine, wholly suspended for five years. Accused Two: 10 years' imprisonment or a fine of R 175,000, wholly suspended for five years. Accused One was fined R 350,000 and Accused Two a fine of R 100,000, to be paid to DFFE and utilized to support compliance and enforcement activities.

### 2019 case

Charges: Accused One and Two: Export of CITES-listed species.

Sentences: Accused One: 6 years imprisonment suspended and fine of R 150,000. Accused Two: 2 years imprisonment suspended and a fine of R 50,000. Accused Three: convicted of three counts of illegal export and transport of threatened or protected species and false declaration to customs. Accused Four convicted of facilitating money laundering and standalone money laundering. Accused Three: fined R 1 million (half of which was suspended) or 5 years imprisonment Accused Four: sentenced to 5 years' imprisonment, wholly suspended due to her having small children and family circumstances.

## 7.10 The misuse of permits and concessions in high-risk timber from Papua New Guinea

### Case study from our expert guest contributors

Aina Grødahl, Rainforest Foundation Norway

Papua New Guinea (PNG) is home to part of the world's third-largest rainforest and harbors seven percent of global biodiversity. This includes endemic species such as the tree kangaroo, the paradise bird, the world`s largest butterfly Queen Alexandra, and thousands of undiscovered species unique to this forest alone. However, its rainforests face severe threats from Illegal activities in the timber sector, which are a major driver of deforestation. In this context, many national and international actors emphasized the urgent need to address these issues to safeguard PNG's rainforests and preserve their ecological and cultural importance The systematic exploitation of forests is enabled by the misuse of concessions and weak regulatory enforcement.

PNG is the world's largest exporter of tropical timber, with approximately 3 million cubic meters of logs exported annually, 90% of which is destined for China. Estimates indicate a large increase in the global demand for roundwood, which is projected to raise by 49 percent by 2050. This rise in demand is expected to intensify pressure on PNG`s forests, given the country's significant role in the global timber trade.

### Timber legality

A global assessment of timber legality risks ranked PNG as having the highest risk profile in the world. Legal and governance challenges includes corruption and bribery in the issuance of logging permits, non-compliance with the Logging Code of Practice. Logging on customary land without proper consent.
Many logging operations bypass local landowners, undermine customary rights, and exploit agricultural concessions for high-value timber extraction. This is made possible by the lack of transparency in public processes, including concession allocations. Illegal logging on customary land is further exacerbated by the lack of basic services, making landowners susceptible to suboptimal deals offered by logging companies in exchange for basic services such as healthcare, education, bridges and roads. Low levels of literacy and knowledge of basic legal protections mean that many cases of abuse and illegal activities in the logging sector go unreported by customary landowners.

Additionally, the logging sector poses significant risks of money laundering. The Bank of PNG National Risk Assessment identified the forestry sector as high risk, pointing to strong indicators of large-scale corruption and illegal logging. The assessment highlights the large values involved and vulnerabilities as a significant informal sector, cash-based economy, porous borders making it easier to move cash and items of value such as timber in and out of the country. The Internal Revenue Commission (IRC) of PNG has also criticised the forest industry, accusing logging companies of transfer pricing manipulation and tax evasion. It has been reported that the IRC described the logging industry as "one of the most delinquent sectors insofar as tax compliance is concerned". These systemic issues highlight the urgent need for improved governance, greater transparency, and accountability within PNG's forestry sector. The misuse of Strategic Litigation Against Public Participation (SLAPPs) to target environmental and human rights defenders is however threatening to silence those voicing these concerns.

### Misuse of permits

A clear example of the risk linked to timber from PNG is the misuse of different types of permits. Many licenses are granted for agricultural production but illegally used to extract and export valuable timber. One example is the Special Agricultural Business Leases (SABLs) that were intended to facilitate agricultural development by leasing customary land to the state, which would then lease it to developers. Between 2003 and 2011, over 5 million hectares of customary land were improperly leased through SABLs, often without genuine landowner consent, leading to significant deforestation and land disputes. Another example is the large segment of the logging operations that continued under the invalid Timber Rights Purchase (TRP) and Local Forest Area (LFA) licenses, often associated with illegal practices. From 2009 to 2018, more than 55% of log exports originated from these outdated agreements, signed by local landowners over 50 years ago.

The Forest Clearing Authorities (FCAs) are documents designed to allow land clearance for agricultural projects. However, FCAs are often misused to cover for large-scale selective logging. Reports indicate that companies often inflate or falsify claims of agricultural planting to secure permits, but then proceed to extract high-value timber. One example is the Wammy Project in West Sepik Province, where an FCA issued for palm oil and rubber planting resulted in the removal and export of over 400,000 cubic meters of logs, valued at over US$31 million. After a decade no agricultural development has materialized and the project has been associated with displacement of local landowners, lack of informed consent, and reports of violence. The government has now implemented a 12-month moratorium on new FCA permits to address concerns over their misuse. As of November 2024, the moratorium remains in place but reports show that FCA permits are still used. Over a third of PNG's exported logs are likely to come from FCA-authorized operations, indicating systemic issues in the regulation of these permits.

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# Get in Touch

If you would like to talk to us about this report, please let us know.


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## About Themis

THEMIS

Themis helps clients identify and manage their specific financial crime risks, through a combination of innovation, insight and intelligence. Our cutting edge platform helps organisations understand these strategic threats through an ESG and socio-economic lens and protects their customers, staff, suppliers and shareholders from criminal attacks or association. For more information, visit www.wearethemis.com

## About WWF

WWF

WWF (Worldwide Fund for Nature) is one of the world's largest independent conservation organisations, active in nearly 100 countries.

Our supporters – more than five million of them – are helping us to restore nature and to tackle the main causes of nature's decline, particularly the food system and climate change. We're working to ensure a world with thriving habitats and species, and to change hearts and minds so it becomes unacceptable to overuse our planet's resources.

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