Introduction to the pre-publication draft

Illicit trafficking of protected species of flora and fauna is a widespread organized criminal activity, involving transnational networks. There is a growing mobilization of the international community to respond to this threat and UNODC has been asked by Member States to play an active role in multilateral efforts to counter it. In 2013, the Economic and Social Council (ECOSOC) adopted a resolution (E/RES/2013/40) requesting UNODC, in consultation with Member States and in cooperation with other competent intergovernmental organizations, such as the Secretariat of the Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES), the World Customs Organization (WCO), INTERPOL, the World Bank and the United Nations Environment Programme (UNEP), to undertake case studies that focus on organized crime networks involved in the illicit trafficking of specific protected species of wild fauna and flora, their parts and derivatives. Subsequently, the General Assembly called upon UNODC, in line with the aforementioned resolution, to continue to collect information on patterns and flows of illicit trafficking in wildlife and to report thereon (A/RES/69/314).

UNODC Executive Director Yury Fedotov announced at the 23rd Session of Commission on Crime Prevention and Criminal Justice (May 2014) that UNODC would initiate a “vigorous and dedicated research and analysis effort on wildlife and forest crime, with the aim to help generate the systematic assessments that the international community needs to inform responses.” This research would take stock of the present wildlife crime situation and conduct a broad assessment of the nature and extent of the problem at the global level.

The World Wildlife Crime Report presents the findings of the global research effort to empirically assess illicit trafficking of specific protected species of wild fauna and flora, their parts and derivatives at the global level. It is based on a World Wildlife Seizures Database compiled by UNODC with the support of the International Consortium on Combating Wildlife Crime (ICCWC), comprised of the CITES Secretariat, INTERPOL, the World Bank, WCO, and UNODC. The Report gives a global overview of wildlife seizures in the context of the global trade in protected species. It includes case studies of seven key wildlife product markets: ivory, rosewood, oud (agarwood), live parrots, caviar, pangolin, and reptile skins. The detailed descriptions of each of these markets comprise the bulk of the report. The report gives insight into the way illegally sourced wildlife is introduced into legal wildlife product markets worldwide.

The prepublication draft of the World Wildlife Crime Report contains the statistical material, including tables, maps and graphs, that could be assembled up to 31 October 2015. The document is to be used exclusively for review by Member States and is not for quotation or dissemination. The final report is scheduled for publication in May 2016.

The document can be downloaded from the UNODC website at: www.unodc.org/unodc/wwcr/index.html

User id: wildlife
Password: 2015wwcr

The information in the prepublication draft will also be made available for circulation to CITES Management Authorities.
Governments wishing to comment on the statistics are requested to send in their observations to the United Nations Office on Drugs and Crime, Research and Trend Analysis Branch, **by 20 January 2016**. Only comments received before the above mentioned deadline in writing will be considered.

Please send comments to:

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Explanatory Notes

This report has not been formally edited.

The designations employed and the presentation of the material in this publication do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries. The names of territories and administrative areas are in italics. Countries and areas are referred to by the names that were in official use at the time the relevant data were collected.

The assignment of countries or areas to specific groupings is for statistical convenience and does not imply any assumption regarding political or other affiliation of countries or territories by the United Nations. The designations used in this study are based on the United Nations M.49 geographical regions for statistical use, which have been developed, used and maintained by the United Nations Statistical Division.

Maps are in line with the United Nations Secretariat standards. A dotted line represents approximately the line of control in Jammu and Kashmir agreed upon by India and Pakistan. The parties have not yet agreed upon the final status of Jammu and Kashmir. Disputed boundaries (China/India) are represented by cross hatch due to the impossibility of detail. Final boundary between the Republic of Sudan the Republic of South Sudan has not yet been determined. A dispute exists between the Governments of Argentina and the United Kingdom of Great Britain and Northern Ireland concerning sovereignty over the Falkland Islands (Malvinas).

The following abbreviations have been used in this report:

CITES Convention on International Trade in Endangered Species of Wild Fauna and Flora
CITES ETIS CITES Elephant Trade Information System
EIA Environmental Investigation Agency
FAO Food and Agriculture Organization of the United Nations
FAO FIGIS FAO Fisheries Global Information System
INTERPOL International Criminal Police Organization
IUCN/SSC International Union for Conservation of Nature Species Survival Commission
IUCN/SSC/AFESG IUCN/SSC/African Elephant Specialist Group
TAWIRI Tanzania Wildlife Research Institute
TEFAF The European Fine Art Foundation
UNODC United Nations Office on Drugs and Crime
WCO World Customs Organization

Weights and measurements:

u Unit
lt Litre
kg Kilogram
ha Hectare
mt Metric ton
Sources of Information

The prepublication draft of the World Wildlife Crime Report is based primarily on the World Wildlife Seizures Database compiled by UNODC with the support of ICCWC.

UNODC has been able to assemble seizure data from the CITES annual, biennial and special reports, as well as the WCO’s Customs Enforcement Network Database (CEN). This was supplemented by other sources, such as the regional Wildlife Enforcement Networks (WENs), when necessary and where available. Data from all the mentioned sources have been cleaned and standardised to produce a global wildlife database which currently contains some 160,000 seizures from 114 countries.

The following data sources are used in the World Wildlife Seizures Database (see Annex 1 for a summary table of wildlife seizures and sources by country):

- **ASEAN WEN** – The Association of Southeast Asian Nations’ Wildlife Enforcement Network is a wildlife law enforcement network that involves police, customs and environment agencies of all 10 ASEAN countries - Brunei, Cambodia, Indonesia, Laos, Malaysia, Myanmar, the Philippines, Singapore, Vietnam and Thailand.
- **Australian Permits Administration Database**
- **Brazil National Data** - National wildlife seizure data provided by the ‘Instituto Brasileiro do Meio Ambiente e dos Recursos Naturais Renováveis’ (Ibama).
- **CITES Annual Reports** - Under Article VIII, paragraph 7, CITES requires each Party to submit an annual report on its CITES trade, containing a summary of information on, inter alia, the number and type of permits and certificates granted, the States with which such trade occurred, the quantities and types of specimens, and the names of species as included in Appendices I, II and III.
- **CITES Biennial Reports** - Under Article VIII paragraph 7, CITES also requires each Party to submit a biennial report on legislative, regulatory and administrative measures taken to enforce the Convention. Among the data gathered are seizures of illicit wildlife products.
- **CITES SRR and other reports** – This includes information extracted from CITES reports resulting from Special Reporting Requirements, as well as reports of the Standing Committee, Plants Committee and Animals Committee.
- **COBRA3** - Operation COBRA III was the biggest ever coordinated international law enforcement operation targeting the illegal trade in endangered species. Conducted in two phases between mid-March and the end of May 2015, saw the participation of law enforcement teams and agencies from 62 countries in Europe, Africa, Asia and America.
- **EAGLE** - Eco Activists for Governance and Law Enforcement is comprised of several NGO’s operating in Western Africa aimed at detecting, combating, and regulating corruption and wildlife crime. EAGLE is currently active in Cameroon, Congo, Gabon, Guinea, Togo, Benin, Senegal, and Uganda.
- **Environment ZA** - The Department of Environmental Affairs of the Republic of South Africa.
- **EU-TWIX** - A database that has been constructed to provide an overview of wildlife seizures in the EU, and aid law enforcement agencies in their efforts to detect, analyse and regulate illegal activities related to trade in flora and fauna.
• Lusaka Agreement Taskforce Secretariat - The Lusaka Agreement on Co-operative Enforcement Operations Directed at Illegal Trade in Wild Fauna and Flora.
• Mexican National Data - National wildlife seizure data from Mexico provided by the ‘Procuraduría Federal de Protección al Ambiente’.
• NECER - National Environmental Compliance & Enforcement Report is an annual report prepared by the Department of Environmental Affairs of South Africa which provides an overview of enforcement efforts, progress, and notable seizures.
• Peru National Data - National wildlife seizure data provided by the Servicio Nacional Forestal y de Fauna Silvestre through the Permanent Mission, Vienna.
• Philippines National Data - National wildlife seizure data provided by the Department of Environment and National Resources, Biodiversity Management Bureau.
• USFWS-LEMIS - United States Fish and Wildlife Service Law Enforcement Management Information System.
• WCCB - Wildlife Crime Control Bureau, Ministry of Environment and Forests, India.
• WCO-CEN - World Customs Organization, Customs Enforcement Network.
• Pangolin Working Group - Intersessional working group on pangolins established at the CITES Standing Committee 65.
• WPSI - Wildlife Protection Society of India.

Data limitations and methodological considerations

Wildlife seizure data, like any other seizure data, are complicated to interpret. Each incident is like a single pixel in a large and complex hidden picture, a brief glimpse into a clandestine world. Any crime analysis of wildlife seizure data must overcome four main challenges: estimating the true prevalence of wildlife trafficking; the issue of uneven sampling; the difficulty of comparing unlike products; and the fact that not all seizures result from criminal intent.

Use of triangulation methods and qualitative information to overcome prevalence and sampling problems

Raw seizure data are not an adequate indication of the size of the underlying illicit contraband flow. Conscientious and well-resourced law enforcement agencies may seize a large share of a small flow, while much larger contraband movement can be missed entirely by those without the means to detect it. Some countries do not have the mechanisms in place to collection wildlife seizure data at a national level, or collect only aggregated information. As a result, the current global wildlife seizures database is somewhat incomplete in its coverage. Despite substantial data from most key destination markets, some regions are underrepresented, and efforts are underway to gather these data.

Taking the seizure information that does exist and triangulating it with other sources of data can help to paint a more complete picture. For example, surveys have been conducted on the extent of demand for illicit products. Data on the illegal trade can be triangulated with data on legal trade and scientific information about the number and location of protected species. Known unregulated wildlife markets, both real and virtual, can be monitored for data such as price trends. Finally, qualitative work can greatly enhance the analysis. Those who make their
living from legal and illegal wildlife markets can often give an estimate of scale and trend to complement the recorded statistics.

**Comparing unlike products and eliminating noise**

A more profound complication comes with the extreme heterogeneity of illegal wildlife products. To compare illegal wildlife flows, to aggregate multiple seizures, and to track trends over time requires some sort of amalgamation. But how does one compare a box of 10,000 seahorses, a shipping container of rosewood, and a suitcase with three rhino horns? Does each seizure count as “one”? Should the logs be counted and the comparison done by the number of detachable items? Or should each item be weighed on a scale and compared on the basis of kilograms of product?

The weight and number of seizures cannot be used as an indicator of poaching, because it is meaningless to compare or add the different wildlife products. Although it represents an oversimplification of the issues, the simplest means of comparison is some form of standardised valuation. Transnational organized crime is crime committed for material gain. To understand the criminal incentive structure, it is important to know the rough monetary values involved. With sufficiently detailed study, the monetary value of any wildlife contraband flow can be estimated. But even more importantly, monetary values provide an index by which unlike commodities can be compared and tracked across time. Moreover, valuation can be used to filter data noise. Many seizures result from ignorance of the law, not smuggling. To use the seizure records as a tool for crime analysis, this data noise must be filtered. Since, as noted above, organized crime is profit driven, it is highly unlikely that low value shipments were made with criminal intent.

**Wildlife Seizure Index**

As noted above, in order to be able to speak about “wildlife trafficking” as a category, it is necessary to combine seizures of very unlike commodities through valuation. Since legal trade does occur among all species products, including those listed on CITES Appendix I, it is possible to derive standard prices from import records in a common market. Based on the valuations thus derived, it is possible to determine an index value for global wildlife seizures, and to track this value across time. It is also possible to determine which species and species products are most implicated in illicit trade. It was on the basis of initial valuation of World WISE that the case study species products were identified. Although subsequent data and analysis have changed the picture, these seven species still make up a significant share of the value of the entire database (69% - see graph on page 3).

The methodology used to derive the value index is as follows:

- Let commodity \( x \) have \( n \) number of reported declared values; \( \{v_1, v_2, ..., v_n\} \)
- Assuming that each report involves several units of the commodity \( \{x_1, x_2, ..., x_n\} \),
- the value assigned to each report is: \( \{x_1v_1, x_2v_2, ..., x_nv_n\} \)
- Thus, the value of all the reported amounts of the commodity \( x \) is: \( \sum_{i=1}^{n} x_i \cdot v_i \)
- The value index for commodity \( x \) used for this report is the weighted average

\[
\frac{\sum_{i=1}^{n} x_i \cdot v_i}{\sum_{i=1}^{n} x_i}
\]
This method takes into account each reported value and assigns weight to the valuation according to the amount of the commodity associated with each report.
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