BOOK REVIEW

China faces a conservation challenge: the expanding elephant and mammoth ivory trade in Beijing and Shanghai

Lucy Vigne and Esmond Martin, 2014

Save the Elephants, Nairobi and The Aspinall Foundation, Lympne Reviewed by Daniel Stiles PO Box 5159, Diani Beach 80401, Kenya email: kenyandan@icloud.com

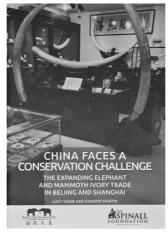
This report describes in detail the elephant and mammoth ivory that were found in physical outlets and factories in Beijing and Shanghai, including the number of outlets, number of items, the types of items and the prices of items. The report covers both registered (legal) and unregistered (illegal) outlets and describes the various challenges involved in monitoring the sale of legal ivory, most of which originated from the 2008 CITES-authorized sales from four southern African countries.

What grabbed the headlines in the media, however, was the purported

tripling in raw ivory price between 2010 and 2014 in China from USD 750/kg to USD 2,100/kg. This was assumed by many to indicate a commensurate skyrocketing of consumer demand for ivory. There are problems with the claim that raw prices tripled during this period, and the report itself contains pertinent information to provide a more nuanced analysis of the relationship between demand and elephant poaching. The data provided do not substantiate the oft-heard claim that 'insatiable consumer demand' for ivory in China is driving elephant poaching. But first, the main conclusions and data that led to them are presented.

China is the largest importer of illegal elephant tusks in the world.

This conclusion is substantiated by the Elephant Trade Information System statistics, which show that



China is the main destination for illegal ivory based on seized ivory shipments.

Most raw elephant tusks smuggled into China from Africa do not pass through the formal factories in China.

The investigators visited six of the ten licensed ivory factories in Beijing and two of the three licensed in Shanghai. The remainder could not be found. The small quantities of ivory processed by these factories (the largest about 500 kg annually) could not possibly account for all of the poached ivory assumed to be smuggled into China, and then supposedly 'laundered'. They also

have 2010 data from Guangzhou and Fujian Province to support the conclusion that legal factories process very little ivory. However, as no illegal factories were found, there are no data on what quantities the latter might be processing.

Most of the large supplies of illegal African ivory, both raw and worked, are not sold through retail outlets but are given as gifts or sold informally to friends and acquaintances.

This conclusion is not substantiated by the report's contents, nor could it be since what happens to the illegal ivory after import is unknown in quantitative terms. Certainly most of the smuggled worked ivory items are most likely sold through personal networks or on the Internet, or given as gifts. However, the presumed huge quantity of illegal tusks imported annually could not possibly be 'given as gifts or sold informally to friends and acquaintances', or even be processed and sold informally, in my opinion.

China is the main ivory manufacturing centre in the world.

No data were provided to substantiate this conclusion, but it would be difficult to propose another country as manufacturing more ivory than China.

Most ivory is bought on the retail market by Chinese collectors and by growing numbers of investors reportedly anticipating further restrictions on the ivory trade as well as possible growing scarcity in ivory due to future worldwide ivory stockpile destructions.

The authors state in the report that the "significant price rise has made raw tusks a profitable investment, attracting more investors in raw tusks" and "learned some are also buying raw tusks, before they reach the factories, for speculation, usually on the black market".

This is an exceptionally important conclusion omitted from press releases and media reports, as it provides a significant driver for recent elephant poaching. Fear of a domestic trade ban and the well-publicized stockpile destructions are spurring consumers to buy ivory.

The three conclusions below tell an important story:

Nearly all worked ivory seen for retail sale in Beijing and Shanghai was recently made by Chinese carvers, with very few foreign-made or antique ivory items seen for sale.

Well over 90% of the elephant ivory items sold in the retail outlets in China are now bought by mainland Chinese.

Nearly all the worked ivory nowadays stays within China.

These findings indicate that China has a largely self-contained ivory market, unlike the cosmopolitan markets of North America and Europe. In the latter markets many of the buyers involved originate outside of those regions, and traditionally imports and exports of antiques were a major component, although recent administrative and legislative actions are restricting this movement.

The numbers of ivory items surveyed for retail sale have doubled in Beijing from 3,196 in 2002 to 6,272 in 2014 and increased in Shanghai from 2,045 in 2002 to 2,172 in 2014. Outlets in Beijing have more than doubled from 61 in 2002 to 156 in 2014 and in Shanghai from 35 in 2002 to 119 in 2014

These numbers include both legal and illegal outlets. The number of outlets has increased substantially, but the average number of pieces per outlet has actually declined since 2002. The numbers indicate a slow expansion of the open retail market in Beijing – about 7 per cent annual growth – and stagnation in Shanghai. The ivory market growth in Beijing is a bit less than the average economic growth rate for China during this 12-year period. The increase in numbers can be explained largely by the availability of legal ivory. Data would be needed from the black market to support a claim that consumer demand for worked ivory has skyrocketed, or that demand was insatiable.

Retail market data do not support a conclusion that ivory market growth has 'exploded' since 2002; growth in the physical outlets sector has been surprisingly small. Retail outlets in Beijing and Shanghai combined—cities with a total population of about 37 million—had 25 per cent less ivory than Manhattan, USA, in 2006, a city of about 1.6 million (Stiles 2013, 2015a)!

Almost all of the new factories, outlets and ivory pieces they found were registered and legal, with the ivory originating from the 2008 sales. The authors report that legal items made up 84 per cent of total items seen in Beijing and 63 per cent in Shanghai.

Retail prices for ivory items have skyrocketed

Rising price can be a good indicator of demand changes, provided that prices for comparable items are known from different points in time. In comparing prices for roughly comparable types between 2002 and 2014, the prices have risen tremendously. This is a good indicator that indeed ivory demand has gone up considerably.

Unfortunately, the report did not systematically compare prices for equivalent items found in the legal

and illegal outlets respectively; the two are lumped together. A table showing prices for a few standard items would have been very useful in determining whether price differentials provide incentives to shop in the black market.

The report did state that "retail prices for ivory items in non-licensed outlets were generally lower than in licensed outlets, especially pendants, bangles and name seals", but actual data to observe the degree of price difference would have been useful.

The legal outlets tend to sell the large, expensive items while the illegal outlets sell the small, inexpensive items

This was not a conclusion given in the Executive Summary. It describes a fundamental difference between the two markets. The authors provide the support for this conclusion:

"Of a random sample of 14 licensed elephant ivory outlets, 28% were large items counted on the shelves and 72% were small items of less than 50 g. This proportion of large items for sale is very high compared with outlets in other countries worldwide". By contrast, "nearly all the items in the unlicensed outlets seen on display for sale weighed less than 50 g, such as jewellery and second-hand name seals".

The latter phenomenon has been noted by other investigators (Gao and Clark 2014; Conrad and Moyle 2013).

There are opportunities for laundering illegal ivory in legal outlets.

There are two main ways illegal ivory could be mixed in with the legal:

- 1. Each ivory item over 50 g in weight is required to have a photo identification; each item less than 50 g should have an ID card, but with no photo. These cards are not always taken with the buyer of an item, thus they can be reused. There is no way of knowing whether the new item now associated with the old card was made from legal or illegal ivory.
- 2. Mammoth ivory is legal to sell with no identification cards. Elephant ivory is sometimes sold as mammoth ivory, according to the authors; thus the ivory could be made from illegal ivory.

3. Given the above provisos, for Beijing and Shanghai combined, 26.5 per cent of the ivory items surveyed were illegal by the government's definition.

Some elephant ivory items are being exported as mammoth ivory items.

The authors state that vendors told them that they could buy and carry with them ivory items and say they were mammoth, as customs agents cannot differentiate between the two. I believe I found commercial examples of this in New York and California, where in certain outlets elephant and mammoth ivory items of Chinese origin are typically mixed. They are probably imported this way (Stiles 2013, 2015a). This is a serious challenge that needs a policy response in China to prevent worked ivory smuggling. The United States and the European Union are currently working on this.

Most Chinese are not interested in ivory and know very little about it.

An important finding omitted from the Executive Summary is that "ivory is not seen generally for sale in the modern shopping centres and is not popular with the majority of Chinese, who want to spend their money on modern items, such as cars and smart phones". Moreover, "ivory has a very low turnover, one place in Shanghai had a 20% discount, but still no buyers."

Again, if this is the case, why is "ivory trade escalating out of control"?

Most visitors to the shops are not interested in the brochures or the legal system, according to the vendors and our observations.

Most Chinese ivory consumers buy in the black market. Those that do shop in the legal market are not influenced by the fact that their purchase is legal. This has important implications for the success of a domestic ivory trade ban working in China. It explains the observation made in the report that "officials are generally against a domestic ban on ivory, which they say would push the industry completely underground, making it harder to control, along with problems of compensating private owners".

The wholesale price of raw tusks sold for carving has tripled since 2010

The 2010 black market price the authors use is USD 750/kg, obtained in Fuzhou, southern China, while the 2014 USD 2,100/kg price is from Beijing in northern China. The Martin and Vigne (2011) report on southern China notes that "in Fuzhou, demand is much less [than in Guangzhou]". There were no ivory specialty shops in Fuzhou and only 282 ivory items were found in the city. Given this soft demand, black market raw ivory prices could be expected to be very low.

In the report under review here they state that "another ivory factory [in Beijing] said that in 2008 they paid 8,000 yuan/kg (USD 1,311/kg)"for small tusks. An IFAW (2012) report presented a late 2011 Beijing price of RMB 15,000/kg (USD 2,366/kg). Therefore, in Beijing we have three price points, 2008, 2011 and 2014.

If only the Beijing prices are used, the pattern is one of a sharp price rise from 2008 to late 2011, followed by a slight drop in 2014. The accuracy of the IFAW price has been questioned, however, which is why perhaps the authors made no reference to it. That said, black market raw ivory prices have risen roughly 1,000 per cent from 2002 to 2014.

Legal raw ivory prices

This report makes no attempt to deal with legal raw ivory prices. Without knowing legal prices, however, it is difficult to interpret the significance of black market prices and trends (see Table 1).

Conclusions

The report contains very valuable quantitative and qualitative data, but its credibility has been marred by the inaccurate press hype that has been fabricated from its contents. A dispassionate analysis of the data reveals an unusually slow growth in the open retail ivory markets of Beijing and particularly of Shanghai. The scale of the open market lags behind Manhattan (USA) (Martin and Stiles 2008), Bangkok (Thailand) (Stiles 2009; Doak 2014), Lagos (Nigeria) (Martin and Vigne 2013), Luanda (Angola) (Martin and Vigne 2014) and other cities outside China. The low numbers are reinforced by observations the authors make on consumer attitudes and behaviour that ivory is of little interest to the average Chinese citizen.

This leaves the anomaly of extremely high increases in raw and worked ivory prices. Why would prices surge so much in an environment of such slow market growth and moderate absolute market scale? Possible answers involve the size of the informal black market, price speculation/stockpiling, supply and demand disparities, and other factors.

References

Conrad K, Moyle B. 2013. The legal ivory market in China: part 2. SULinews 7. Available from http://www. iucn.org/about/union/commissions/sustainable_use_and_livelihoods_specialist_group/sulinews/issue_7/ sn7_ivory/.

Doak, N. (2014). *Polishing off the Ivory Trade: Surveys of Thailand's Ivory Market*. TRAFFIC International, Cambridge, UK.

Year	Beijing	Southern China/Hong Kong	Tusk weight/kg	Source
2010	303-530		1–5	Martin and Vigne, 2011
2011		630–840	>10	Dentex, pers. comm. 2014
2014		484–613	-	Moyle and Conrad, pers. comm.
2014		660-1,100	>20	'tSas-Rolfes et al. 2014
2014	1,625	832-1,138	>10	Dentex, pers. comm. 2014

Table 1. Legal prices for China in USD/kg between 2010 and 2014

Stiles

Gao Y, Clark S. 2014. Elephant ivory trade in China: trends and drivers. *Biological Conservation* 180:23–30.

[IFAW] International Fund for Animal Welfare. 2012. *Making a killing: a 2011 survey of ivory markets in China*. IFAW, Yarmouth Port.

Martin, E., Stiles, D. (2008). *Ivory Markets in the USA*. London and Nairobi: Care for the Wild

International and Save the Elephants.

Martin, E., Vigne, L. (2013). Lagos, Nigeria: one of the largest retail centers for illegal ivory surveyed to date. *TRAFFIC Bulletin* 25(1): 35-40.

Martin, E. Vigne, L. (2014). Luanda - the largest illegal ivory market in southern Africa. *Pachyderm* 55: 30-37.

Stiles, D. (2009). *The Elephant and Ivory Trade in Thailand*. Petaling Jaya, Malaysia: TRAFFIC

Southeast Asia.

Stiles, D. 2013. The big ivory apple. Natural History July–August:10–13.

Stiles, D. 2015a. *Elephant Ivory Trafficking in California, USA*. NRDC, Washington, D.C.

Stiles, D. 2015b. *Analysis of Ivory Demand Drivers*. Consultancy report for Wildlife Conservation Society, China Office. WCS, Beijing.

'tSas-Rolfes M., Moyle B., Stiles D. 2014. The complex policy issue of elephant ivory stockpile management. *Pachyderm* 55:62–77.