

A. PROPOSAL

Transfer of *Varanus melinus* from Appendix II to Appendix I according to the criteria A i, B i, iv, C ii, D of Resolution 9.24, Annex 1

B. PROPONENT

Federal Republic of Germany

C. SUPPORTING STATEMENT**1. Taxonomy**

- 1.1 Class: Reptilia
 1.2 Order: Squamata
 1.3 Family: Varanidae
 1.4 Genus: *Varanus*
 Subgenus: *Euprepiosaurus*
 Species: *Varanus melinus* BÖHME & ZIEGLER, 1997
 Subspecies: -
- 1.5 Scientific synonyms: -
- 1.6 Common names: English: Quince monitor lizard
 German: Quittenwaran
 French:
 Spanish:
 Indonesian:

1.7. Code numbers:

2. Biological Parameters**2.1 Distribution**

In their description of *Varanus melinus*, BÖHME & ZIEGLER (1997) gave the Sula Islands as well as Obi, Moluccas, Indonesia, as distribution area of the Quince monitor lizard. Later ZIEGLER & BÖHME (1999) reduced the distribution of *V. melinus* to the Sula Islands, because Obi obviously is only an intermediate trading centre (e. g., ERDELEN, ISKANDAR, in litt.). In the Sula Archipelago *V. melinus* seems to inhabit the islands of Mangole and Taliabu (SPRACKLAND 1999), ISKANDAR (in litt.) further mentions the island of Sanana. Beside Taliabu (see also LEMM 1998) BAYLESS & ADRAGNA (1999) further give Bowokan and Banggai island groups as distribution area of the Quince monitor lizard.

According to ERDELEN (in litt.) beside the Sula Islands sometimes also Halmahera and even Sulawesi are mentioned by Indonesian traders as distribution area of *V. melinus*, thus indicating that the species is still remarkably little known in Indonesia. This applies to the species itself as well as to its geographic range and its ecology. Of ten consulted exporters who were hardly informed about *V. melinus* only three really seemed to know the species (ERDELEN, in litt.). As the local hunters reluctantly name the exact collecting areas, usually only incomplete or wrong locality data reach the exporters in Jakarta.

2.2 Habitat Availability

Up to now missing information on the exact distribution, habitat, and ecology of *Varanus melinus* emphasizes the necessity of first ecological field studies. But the preferences of the Quince monitor lizard for water and high humidity as well as its willingness for swimming and diving together with its preference for aquatic prey (fish and prawn) in captivity indicate that it is probably a swamp-dweller or an inhabitant of similar habitats, perhaps more adapted to water than its close relative *V. indicus*; due to its sharp claws the Quince monitor lizard also is a good climber (BÖHME & ZIEGLER 1997, ZIEGLER et al. 1998, BAYLESS & ADRAGNA 1999). After YUWONO (in litt.) *V. melinus* seems to occur not only in forested areas but also near human settlements.

According to BAYLESS & ADRAGNA (1999) over 80 % of the land area of the Moluccas is still forested, with lowland forest being the predominant type covering approximately 75 % of the total land area.

As one of the islands in the Sula Archipelago that seems to be inhabited by the Quince monitor lizard Taliabu covers an area of 3000 km² with a tropical and rainy climate (19-21 C to 30-32 C mean temperatures; 82-90 % humidity) with little seasonal variation (BAYLESS & ADRAGNA 1999). The forest types of Taliabu range from tidal forests (mangrove swamps) along much of the coastline to primary forests at the island's centre. The lowland forests on Taliabu are characterized by a relatively high density of dipterocarp trees, many of them with extensive epiphyte and liana growth.

After BAYLESS & ADRAGNA (1999) the forests of Taliabu below 800 m are designated for commercial exploitation, those above the 800 m level are protected from commercial logging but not from agricultural exploitation. Large parts of the Taliabu lowland forests where *V. melinus* apparently occurs have been destroyed, principally in the northeastern and western parts of Taliabu. BAYLESS & ADRAGNA (1999) further state, that in 1991 no primary lowland forest habitat was located in the framework of an ornithological survey of Taliabu. Only selectively logged and heavily degraded forest areas as well as agricultural landscapes were observed.

2.3 Population Status

Varanus melinus is most probably only occurring on some islands of the small Sula Archipelago, thus having a very restricted geographical distribution (e. g., BAYLESS & ADRAGNA 1999). BAYLESS & ADRAGNA (1999) state that *V. melinus* is without doubt a rare species. But according to the information given by Indonesian traders (YUWONO, SAPUTRA, in litt.) the Quince monitor lizard is supposed to be common there. Apparently only small specimens are demanded by the trade whereas the adult specimens allegedly can remain in their habitat (YUWONO, in litt.). Though, the first specimens imported to Germany were large ones of about one meter in size (BÖHME & ZIEGLER 1997).

2.4 Population Trends

A decline of the population is to be expected due to the increased removal of *Varanus melinus* for the pet trade. Habitat loss and destruction as well as the occasional killing of the species by forest workers (see BAYLESS & ADRAGNA 1999) most probably put further pressure on the population of the Quince monitor lizard.

2.5 Geographic Trends

As currently the exact distribution of the species is not yet reliably known, it is not possible to make any conclusion about geographic trends.

2.6 Role of the Species in its Ecosystem

Like almost all other varanid species *Varanus melinus* is carnivorous. Due to its size the species certainly belongs to the top predators in its ecosystem and therefore should also be involved in controlling the number of the available invertebrate and vertebrate prey (see also BAYLESS & ADRAGNA 1999).

2.7 Threats

As *Varanus melinus* is apparently occurring only on some islands of the small Sula Archipelago, a serious threat of the populations due to habitat loss and destruction as well as by the continuous removal by local hunters has to be taken into account (e. g., ОТА, in litt.). Due to its attractive colouration, its "tameness", and its small size of only about one meter, *V. melinus* is especially attractive for being kept in captivity and therefore for the pet trade in general (BÖHME & ZIEGLER 1997, ISKANDAR, in litt., BAYLESS & ADRAGNA 1999, LEMM 1998, ZIEGLER et al. 1998).

3 Utilization and Trade

3.1 National Utilization

There exists no information about a possible utilization of *Varanus melinus* in Indonesia for food, medicine or pet. But BAYLESS & ADRAGNA (1999) report on the occasional killing of the species by forest workers as "common practice for such 'pests'".

3.2 Legal International Trade

The discovery of *Varanus melinus* can probably be correlated with the disastrous forest fires in Indonesia in 1997, because new collecting areas had to be taken into account instead of some of the traditional collecting areas known (BÖHME & ZIEGLER 1997, BAYLESS & ADRAGNA 1999). According to YUWONO (1998) such major collecting areas for live amphibians and reptiles in Indonesia are West Kalimantan, South Sumatra, Sulawesi, Java, Halmahera, Tanimbar, Seram and Ambon islands, and parts of Irian Jaya (e. g., Sorong, Jayapura, and Merauke).

The Quince monitor lizards are caught by local hunters and are finally, via the intermediate trade (Obi), reaching the traders in Jakarta and also in Bali.

According to ERDELEN (in litt.) *Varanus melinus* has been exported from Indonesia for at least a few years. As the species has been described only recently, viz. in December 1997, it must have been exported under different species names, such as *V. indicus*, "*V. kalabeck*" and *V. salvator*. For analysing such a trade trend the WCMC net export / re-export data of *V. indicus*, *V. indicus* "*kalabeck*" and *V. salvator* are provided for comparison in Table 1, more detailed net export and also import data of *V. indicus* and *V. indicus* "*kalabeck*" are listed in Appendices I and II. The data for *V. indicus* "*kalabeck*" are listed separately, because the name *kalabeck* Lesson, 1830 is, according to BÖHME et al. (1994), a Nomen dubium that means an unavailable name in the sense of the International Code of Zoological Nomenclature (ICZN). Such scientifically non-existent names usually appear in the trade when unusual or new taxa are to be offered for sale.

Table 1. Net trade in *Varanus* spp., *V. indicus*, *V. indicus* "*kalabeck*" and *V. salvator* by country of export / re-export 1992-1996 according to "Significant trade in animals, net trade outputs" produced by the World Conservation Monitoring Centre (WCMC), Cambridge, UK, in accordance with Decision 10.79 of the Conference of the Parties, March 1998.

More detailed net export and also import data of *V. indicus* and *V. indicus* "*kalabeck*" are listed in Appendices I and II.

Taxon	Term	Country	1992	1993	1994	1995	1996
<i>Varanus</i> spp.	live	Indonesia	257	685	669	30	204
	skins	"	-	-	-	2050	-
<i>V. indicus</i>	live	"	168	543	215	32	356
<i>V. indicus</i> " <i>kalabeck</i> "	live	"	631	1396	280	306	1029
<i>V. salvator</i>	live	"	4023	4330	2770	3526	4717
	skins	"	1067320	577943	642185	467950	465860

The highest amount of exported *Varanus melinus* currently known was imported to the United States of America. This corresponds well with the new report from TRAFFIC North America, in which the USA is declared as the world's largest trader of live reptiles (see also HOOVER 1999): Between 1983 and 1992, US trade in live reptiles increased nearly twenty-fold, and jumped from 28 % to 82 % of the global market; more than 2.5 million live reptiles were imported in 1995, and in 1996 the USA exported or re-exported 9.5 million reptiles, primarily to Europe and East Asia (Oryx 1999, 33[1]: p. 15). AULIYA (RIQUIER) (in prep.) further reports of steadily increasing imports of at least 25 species and subspecies of live varanids into the EU from 1990 to 1996. Since 1993 a constant increase of offers and demands could be observed by members of the German Society for Herpetology and Amphibian and Reptile Husbandry (DGHT), with distinctly higher numbers of persons demanding for monitor lizards than the amount of persons offering, and this trend is growing continuously.

According to different confidential sources, in 1997, shortly before the scientific description of *V. melinus*, about 400 specimens of the Quince monitor lizard reached the USA via Jakarta, most probably under the name of *V. indicus*. Next to Jakarta, apparently also Bali seems to be an important trading center for monitor lizards. According to BENNETT (in litt.) sources in the USA estimate "about 500" animals exported there in the last two years. But HOOVER (TRAFFIC North America-USA, in litt.) only reports of less than 200 animals imported to the USA as *V. salvator*, prior to them being identified as *V. melinus*, probably around 100. Furthermore it is known that *V. melinus* has also been exported legally or illegally to Japan, Russia, and perhaps also to United Kingdom. According to TRAFFIC Southeast Asia (in litt. to MELISCH, TRAFFIC-Europe) Pata Zoo, Bangkok (Thailand) advertises of having the Quince monitor lizard in its collection by depicting it

on the cover of the zoo brochure (however, the animal could not be found during a visit in May 1999). HOOGMOED (in litt.) saw three specimens of *V. melinus* in Madagascar that have been bought in Indonesia. In Germany currently 28 legal specimens are known which were, with the exception of four specimens, obtained from a French trader (STAAS, pers. comm.), exported via Jakarta. For Switzerland currently 12 legal specimens are known which have been ordered directly from Jakarta (AMMANN, pers. comm.).

High numbers of exported specimens of *V. melinus* are apparently no longer tenable (YUWONO, in litt.) because the species is well known meanwhile and easily detectable. In 1997 the price of a specimen in Indonesia was about 2000 US \$, today a specimen is obtainable for 100 to 300 US \$ (HOCH, YUWONO, in litt.). HOOVER (TRAFFIC North America-USA, in litt.) states that when first imported to the USA, the price of a specimen ranged from 2000 to 3000 US \$. After several shipments had been imported, the price fell as low as 500 US \$. Currently, the internet price per specimen is about 1000 US \$. In Germany prices between 2500 and 5000 DM have been paid.

3.3 Illegal Trade

According to confidential sources, illegal offers of *Varanus melinus* for about 1000 DM per specimen are currently known only from the Czech Republic and from France. For the Czech Republic about 30 specimens illegally imported from Indonesia are known, from France apparently six specimens illegally reached Germany.

3.4 Actual or Potential Trade Impacts

Actually there exist no official trade data for *Varanus melinus*, but the currently available information (e.g. the relatively high import numbers into the USA) already indicates that such high removal numbers must have serious consequences for the wild population in its apparently distinctly restricted distribution area.

3.5 Captive Breeding for Commercial Purposes (Outside Country of Origin)

No successful captive breeding of *Varanus melinus* is currently known. According to YUWONO (in litt.) the Quince monitor lizard is probably easy to breed (SAPUTRA, ERDELEN, in litt.) because the specimens known to him frequently copulate in captivity (in Indonesia). LEMM (1998) states that most captive animals remain healthy, and females have cycled in captivity in private collections and in zoos, although eggs have been infertile. According to BENNETT (in litt.) there are no records of captive breeding although there exist viable eggs in incubation in the USA. BENNETT (in litt.) further states that according to most keepers of the species courtship is rough on the females and most of the eggs failed to hatch. The maximum clutch size comprised 9-12 eggs, though there were not more than two to four viable eggs, so that this number might be a closer reflection of the mean clutch size. In Germany only one infertile clutch of a female of more than one meter length and consisting of only two eggs of 72 x 29 and 70 x 27 mm is known (DEDLMAR, pers. comm.). Furthermore a preserved female of *V. melinus* (ZFMK 70441) of about one meter length contained four large shelled eggs (23-29 x 27-31 mm). Any captive breeding in commercial scale does not exist.

4 Conservation and Management

4.1 Legal Status

4.1.1 National

No data available.

4.1.2 International

According to ERDELEN (in litt.) *Varanus melinus* is not listed in the latest quota list of PKA, formerly PHPA. If export licences have been issued from Indonesia, *V. melinus* must have been registered under another names (e. g., *V. indicus*, "*V. kalabeck*", and *V. salvator*). According to some US dealers Indonesia apparently has imposed a voluntary ban on exports of the Quince monitor lizard.

Varanus melinus is listed in Appendix II of CITES under *Varanus* spp. since 1 July 1975 and in Annex B of the EC regulation 338/97 of the European Union.

4.2 Species Management

A special management of the species does not yet exist.

4.2.1 Population Monitoring

4.2.2 Habitat Conservation

4.2.3 Management Measures

4.3 Control Measures

Currently no quota is existing for *Varanus melinus* (ERDELEN, in litt.).

4.3.1 International Trade

4.3.2 Domestic Measures

5 Information on Similar Species

Due to its structures of outer genitalia *Varanus melinus* clearly is a member of the varanid subgenus *Euprepiosaurus* FITZINGER, in which it belongs to the *V. indicus* group. Compared with the other members of this group (*V. caerulivirens*, *V. doreanus*, *V. finschi*, *V. indicus*, *V. jobiensis*, *V. spinulosus*, and *V. yuwono*) it is diagnosable by its unique intensively yellow ground colouration of head, body, limbs and tail - though the juveniles can be more blackish (DEDLMAR, pers. comm., LEMM 1998, BAYLESS & ADRAGNA 1999) - in combination with an unpigmented, pink tongue, relatively low scale counts around midbody (124-133), and outer genitals, each with only unilateral paryphasmata (BÖHME & ZIEGLER 1997, ZIEGLER & BÖHME 1997, 1999, ZIEGLER et al. 1999a, 1999b).

Compared with the other varanid taxa, *V. melinus* can possibly be confused with the subspecies *cumingi* of the Asiatic water monitor *V. salvator*, due to its convergent yellow ground colouration. But *V. salvator cumingi* occurs only on the Philippines, and it is principally distinguishable from *V. melinus* by its much larger size (max. 220 cm versus max. 115 cm in *V. melinus*), its dark coloured tongue tip, and its structures of outer genitalia (GAULKE 1991, ZIEGLER & BÖHME 1997, BENNETT 1998). Furthermore *V. salvator cumingi* differs from *V. melinus* in usually having black temporal stripes, an at least marginally dark striped underside, and strong transversal bands dorsally, consisting of large ocelli.

6 Other Comments

Most consulted scientists welcomed a transfer of *Varanus melinus* from CITES Appendix II to Appendix I (e. g., ISKANDAR, OTA, in litt.). Mainly keepers of monitor lizards and (Indonesian) traders did not support a transfer to Appendix I (e. g., SAPUTRA, YUWONO, in litt.): Instead of a general export ban they plea for a small quota for maintaining solid breeding populations in captivity on the one hand, and for avoiding illegal exports on the other (e. g., SAPUTRA, YUWONO, in litt.). BENNETT (in litt.) approves a protection of the species in the case that it is rare and has a very restricted distribution but he emphasizes the necessity of still required first ecological field studies. ERDELEN (in litt.) recommends further studies concerning a possibly easy captive breeding because it could turn out to be a realistic alternative, combined with a well-founded quota regulation, to prevent over-exploitation or even extinction. YUWONO (in litt.) recommends a quota of about 200 specimens per year, starting out from 40 clutches, "if each female only conservatively lays 5 eggs per clutch".

However, such a mean clutch size in captivity seems to be overestimated at the current state of our knowledge (see chapter 3.5). For comparison, *V. indicus*, a close relative of *V. melinus* (ZIEGLER & BÖHME 1999), actually lays 1-10 eggs per clutch (BENNETT 1998). But most eggs of the Quince monitor lizard laid in captivity were infertile, not more than average 2-4 viable eggs in incubation are currently recorded.

7 Additional Remarks

None

8 References

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Ia: Net imports of *Varanus indicus* between 1991 and 1997 according to the World Conservation Monitoring Centre (WCMC), Cambridge

Importer	Origin	Source	1991	1992	1993	1994	1995	1996	1997	Total
live										
BE	-	-	-	15	14	-	-	-	-	29
CA	SB	wild	-	-	-	6	1	-	-	7
CA	SB	-	-	7	1	4	-	-	-	12
CH	-	wild	-	-	-	-	-	6	-	6
CH	ID	wild	-	-	2	3	2	1	-	8
CH	ID	-	-	-	-	2	-	-	-	2
CZ	-	wild	-	-	-	36	-	42	-	78
CZ	SB	wild	-	-	-	-	-	-	3	3
DE	-	wild	-	-	-	-	-	12	-	12
DE	ID	wild	-	2	-	-	-	-	-	2
DE	-	-	32	33	-	-	100	-	-	165
DE	ID	-	-	2	-	-	2	-	-	4
ES	-	wild	-	-	-	-	-	11	14	25
ES	ID	wild	-	-	-	2	-	-	-	2
ES	SB	wild	-	-	-	9	-	-	-	9
ES	ID	seized	-	-	-	2	-	-	-	2
FI	-	wild	-	-	-	-	-	-	2	2
FR	-	capt. bred	-	-	-	-	-	-	10	10
GB	-	wild	4	-	-	70	67	10	-	151
GB	SB	wild	4	-	-	-	6	-	-	10
GB	-	capt. bred	-	-	1	-	-	-	-	1
HK	SB	wild	-	-	6	-	-	-	-	6
HK	SB	-	-	-	6	-	-	-	-	6
ID	ID	-	-	-	2	-	-	-	-	2
IL	SB	wild	-	-	-	-	-	1	-	1
JP	-	wild	44	-	250	-	-	-	-	294
JP	ID	wild	-	-	6	-	-	-	-	6
JP	-	-	-	160	-	364	230	50	-	804
JP	ID	-	-	-	3	-	-	-	-	3
NL	-	wild	12	-	-	-	-	-	-	12
RU	-	capt. bred	-	-	-	-	-	2	-	2
SK	-	wild	-	-	-	-	-	10	-	10
US	-	wild	90	311	539	71	587	1373	747	3718
US	SB	wild	35	-	-	-	-	-	-	35
US	-	capt. bred	-	-	-	-	-	5	10	15
US	-	-	485	202	761	766	107	-	62	2383
US	ID	-	-	34	-	-	-	-	-	34
US	-	pre-Conv.	-	-	-	-	126	24	17	167
US	-	seized	-	-	-	-	-	-	2	2
US	ID	seized	-	1	-	-	-	-	-	1
specimens										
AU	-	wild	4	1	-	-	-	-	-	5
AU	-	-	-	-	-	-	-	1	-	1
US	-	wild	-	-	-	1	-	1	-	2
US	-	-	-	-	-	-	-	1	-	1
US	SB	-	-	-	-	1	-	-	-	1
bodies										
AU	-	wild	-	1	-	-	-	-	-	1
DE	-	wild	-	-	-	-	-	-	3	3

US	-	wild	-	2	2	-	-	-	-	4
US	-	seized	1	1	-	-	-	-	-	2
leather items										
AU	-	wild	-	1	15	-	-	-	-	16
AU	-	-	-	-	-	5	9	13	-	27
AU	-	pre-Conv.	-	-	2	-	-	-	-	2
CA	-	-	-	-	-	-	1	-	-	1
DE	-	-	-	-	-	-	3	-	-	3
ES	-	wild	-	2	-	-	-	-	-	2
FI	-	wild	-	1	-	-	-	-	-	1
GB	-	wild	-	-	1	-	-	1	-	2
GB	-	-	-	-	-	-	-	2	-	2
JP	-	wild	-	2	-	-	-	-	-	2
JP	-	-	-	-	-	-	-	3	-	3
NZ	-	-	-	-	-	2	6	-	-	8
SG	-	-	-	-	-	1	1	-	-	2
US	-	wild	-	-	1	-	-	-	-	1
US	-	-	-	1	-	1	7	1	-	10
skins										
AU	-	-	-	-	-	-	-	2	-	2
GB	-	wild	-	-	-	-	1	-	-	1
JP	-	wild	-	-	1	-	-	-	-	1
NZ	-	-	-	-	-	-	-	1	-	1
US	-	wild	-	-	1	1	-	5	-	7
US	-	-	-	-	-	-	-	1	-	1
skin pieces										
US	-	wild	-	1	-	-	3	-	-	4
unspecified										
US	-	-	-	-	-	2	-	-	-	2
Total (all countries)			711	780	1614	1349	1259	1579	870	8162

I b: Net imports of *Varanus indicus* "kalabeck" between 1991 and 1997 according to the World Conservation Monitoring Centre (WCMC), Cambridge

Importer	Origin	Source	1991	1992	1993	1994	1995	1996	1997	Total
live										
AT	-	wild	-	-	-	-	-	2	-	2
AT	-	-	-	-	13	-	-	-	-	13
BE	-	wild	-	-	-	-	-	20	26	46
BH	-	wild	-	-	-	-	2	-	-	2
CA	-	wild	-	-	-	-	-	35	20	55
CA	-	-	-	2	30	-	-	-	-	32
CH	-	wild	-	-	-	-	13	6	16	35
CZ	-	wild	-	-	-	-	-	29	4	33
CZ	-	-	-	-	-	25	-	-	-	25
DE	-	wild	-	-	-	-	16	73	96	185
DE	-	-	-	-	-	15	4	-	-	19
DK	-	wild	-	-	-	-	-	4	-	4
ES	-	wild	-	-	-	-	-	3	9	12
FI	-	wild	-	-	-	-	-	-	2	2
FR	-	wild	-	-	-	-	-	53	19	72
FR	-	capt. bred	-	-	-	-	-	-	8	8
FR	-	-	-	-	4	-	-	-	-	4
GB	-	wild	-	-	-	-	11	15	11	37
HK	-	wild	-	-	-	-	-	10	-	10
HK	ID	-	-	-	1	-	-	-	-	1
ID	ID	wild	-	-	-	-	2	4	-	6
IT	-	wild	-	-	-	-	-	50	-	50
JP	-	wild	9	50	90	40	30	73	115	407
JP	ID	wild	-	-	17	-	-	-	-	17
JP	-	-	-	65	175	10	-	-	-	250
KR	-	wild	-	-	-	-	-	-	29	29
MY	-	wild	-	-	17	-	2	-	5	24
MY	-	-	-	-	27	-	-	-	-	27
NE	-	wild	-	-	-	-	-	9	-	9
NL	-	wild	12	-	-	-	10	77	69	168
PL	-	wild	-	-	-	-	-	-	50	50
SA	-	wild	-	-	-	-	-	-	1	1
SE	-	wild	-	-	-	-	-	2	1	3
SG	-	wild	-	-	-	-	-	4	-	4
SK	-	wild	-	-	-	-	-	-	2	2
US	-	wild	6	-	-	-	224	568	381	1179
US	ID	wild	-	-	-	-	-	-	4	4
US	-	capt. bred	-	-	-	-	-	-	5	5
US	-	-	-	564	1147	200	-	-	-	1911
Total (all countries)			27	681	1521	290	314	1037	873	4743

Abbreviations used:

AT = Austria, AU = Australia, BE = Belgium, BH = Bahrain, CA = Canada, CH = Switzerland, CZ = Czech Republic, DE = Germany, DK = Denmark, ES = Spain, FI = Finland, FR = France, GB = United Kingdom, HK = Hong Kong, ID = Indonesia, IL = Israel, IT = Italy, JP = Japan, KR = Republic of Korea, MY = Malaysia, NE = Niger, NL = Netherlands, NZ = New Zealand, PG = Papua New Guinea, PH = Philippines, PL = Republic of Poland, RU = Russian Federation, SA = Saudi Arabia, SB = Solomon Islands, SE = Sweden, SG = Singapore, SK = Slovakia, TW = Taiwan, US = United States, XX = country unknown

II a: Net exports of *Varanus indicus* between 1991 and 1997 according to the World Conservation Monitoring Centre (WCWC), Cambridge

Exporter	Origin	Source	1991	1992	1993	1994	1995	1996	1997	Total
live										
CA	-	capt. bred	-	-	-	-	-	5	-	5
CZ	-	capt. bred	-	-	-	-	-	2	-	2
ID	-	wild	12	124	204	62	32	356	75	865
ID	-	capt. bred	-	-	-	-	-	-	20	20
ID	-	-	2	44	341	153	-	-	2	542
ID	-	pre-Conv.	-	-	-	-	10	-	-	10
ID	-	seized	-	-	-	-	-	-	2	2
JP	ID	-	-	36	-	-	-	-	-	36
JP	ID	seized	-	1	-	-	-	-	-	1
MY	-	wild	29	-	-	-	-	-	-	29
MY	SB	wild	39	-	-	-	-	-	-	39
PG	-	wild	-	-	-	9	-	-	-	9
SB	-	wild	109	187	585	106	622	1108	688	3405
SB	-	-	515	366	434	977	437	50	60	2839
SB	-	pre-Conv.	-	-	-	-	116	24	17	157
US	ID	wild	-	2	8	5	2	1	-	18
US	ID	-	-	-	5	2	2	-	-	9
US	ID	seized	-	-	-	2	-	-	-	2
US	SB	wild	-	-	6	15	7	1	3	32
US	SB	-	-	7	7	4	-	-	-	18
US	-	capt. bred	-	-	1	-	-	-	-	1
specimens										
GB	SB	-	-	-	-	1	-	-	-	1
PG	-	wild	-	1	-	1	-	1	-	3
PG	-	-	-	-	-	-	-	2	-	2
SB	-	wild	4	-	-	-	-	-	-	4
bodies										
ID	-	wild	-	-	-	-	-	-	3	3
PG	-	wild	-	1	-	-	-	-	-	1
PG	-	seized	-	1	-	-	-	-	-	1
PH	-	seized	1	-	-	-	-	-	-	1
SB	-	wild	-	-	2	-	-	-	-	2
XX	-	wild	-	2	-	-	-	-	-	2
leather items										
PG	-	wild	-	6	17	-	-	1	-	24
PG	-	-	-	1	-	9	27	19	-	56
PG	-	pre-Conv.	-	-	2	-	-	-	-	2
skins										
PG	-	wild	-	-	2	1	1	5	-	9
PG	-	-	-	-	-	-	-	4	-	4
skin pieces										
PG	-	wild	-	1	-	-	3	-	-	4
unspecified										
PG	-	-	-	-	-	2	-	-	-	2
Total (all countries)			711	780	1614	1349	1259	1579	870	8162

II b: Net exports of *Varanus indicus* "kalabeck" between 1991 and 1997 according to the World Conservation Monitoring Centre (WCMC), Cambridge:

Exporter	Origin	Source	1991	1992	1993	1994	1995	1996	1997	Total
live										
ID	-	wild	27	-	107	40	308	1033	856	2371
ID	-	capt. bred	-	-	-	-	-	-	13	13
ID	-	-	-	631	1396	250	4	-	-	2281
MY	ID	wild	-	-	17	-	2	-	4	23
SG	ID	wild	-	-	-	-	-	4	-	4
TW	-	wild	-	50	-	-	-	-	-	50
US	ID	-	-	-	1	-	-	-	-	1
Total (all countries)			27	681	1521	290	314	1037	873	4743

Abbreviations used:

AT = Austria, AU = Australia, BE = Belgium, BH = Bahrain, CA = Canada, CH = Switzerland, CZ = Czech Republic, DE = Germany, DK = Denmark, ES = Spain, FI = Finland, FR = France, GB = United Kingdom, HK = Hong Kong, ID = Indonesia, IL = Israel, IT = Italy, JP = Japan, KR = Republic of Korea, MY = Malaysia, NE = Niger, NL = Netherlands, NZ = New Zealand, PG = Papua New Guinea, PH = Philippines, PL = Republic of Poland, RU = Russian Federation, SA = Saudi Arabia, SB = Solomon Islands, SE = Sweden, SG = Singapore, SK = Slovakia, TW = Taiwan, US = United States, XX = country unknown