



Rue Royale 171/3  
B - 1210 Bruxelles Belgium  
Tél : 00 32(0)2 209 16 36

Fax: 00 32(0)2 209 16 31

[info@Centre-of-Ethics.org](mailto:info@Centre-of-Ethics.org)

Schroeder, J.P. (1990b) Reproductive aspects of marine mammals. In. 'CRC Handbook of Marine Mammal Medicine: Health Disease and Rehabilitation' ed L.A. Dierauf. CRC Press: Boca Raton. pp 353-369.

Schroeder, J.P. & Keller, K.V. (1990) Artificial insemination of bottlenose dolphins. In "The Bottlenose Dolphin" S Leatherwood and R.R. Reeves (eds) Academic Press: San Diego, CA. pp 447-460

Schusterman, Ronald J. "Dolphin Cognition & Behaviour, a comparative Approach" by California State University, Hayward and University of California. Lawrence Erlbaum associates, publishers New Jersey 1986.

Sweeney, J. C. 1977. Difficult Births and Neonatal Health Problems in Small Cetaceans. In: Breeding Dolphins: Present Status. Suggestions for the future, eds. S. H. Ridgway and K. Benirschke. A report to the Marine Mammal Commission. Nat'l. Tech. Info. Serv. PB-273 673. pp. 278-287. (Analysis of records of stillbirths, difficulties in labor (dystocias), and neonatal health problems and mortalities, with conclusions and recommendations).

Sweeney, J. C. 1977. Diagnosis of Pregnancy in Small Cetaceans with Doppler Sonography and Other Techniques. In: Breeding Dolphins: Present Status. Suggestions for the Future, eds. S. H. Ridgway and K. Benirschke. A report to the Marine Mammal Commission. Nat'l. Tech. Info. Serv. PB-273 673. pp. 211-216. (Discusses electronic devices and various techniques by which pregnancy and fetal viability can be determined.)

Sweeney, J. (1984, September 7). Letter to National Marine Fisheries Service.

(1988, August 10). Letter to Division of Marine Resources, Florida.

(1989, April 9). USDA form, voluntarily surrenders dealers license #S8-NP.

111 (1990). Marine mammal behavioral diagnostics. in L. Dierauf (Ed.), Handbook of Marine Mammal Medicine (pp. 53-72). Boca Raton, Florida; CRC Press.

Thomas, A. Jeanette and Ronald Kastelein "Sensory Abilities of Cetaceans: Laboratory and Field Evidence". Harderwijk Dolfinarium/NATO ASI Series, Series A : Life sciences Vol.196.

Wood, F. G. 1977. Births of Porpoises at Marineland, Florida, 1939-1969, and Comments on Problems in Captive Breeding of Small Cetacea. In: Breeding Dolphins: Present Status. Suggestions for the Future, eds. S. H. Ridgway and K. Benirschke. A report to the Marine Mammal Commission. Nat'l. Tech. Info. Serv. PB-273 673. pp. 47-60.

Whale and Dolphin Conservation Society "Captive Cetaceans: A Handbook for Campaigners" WDCS publication available on

<http://www.wdcs.org/dan/publishing.nsf/allweb/D48334A40092D1128025693D003FB53C>

Kirtland, J. (1991, November 4-8). President's opening address, IMATA Proceedings, p. v-vi.(1993, Spring). The bottlenose dolphin (*Tursiops truncatus*), IMATA Soundings, Vol. 18 No. 2, pp. 22-27.  
Kirtland, J. and Stringer, S. (1995, Fourth Quarter). The authors' response, IMATA Soundings Vol. 20 No. 4, p. 20 & 24.

Lippert, Gérard (Dauphin , l'Autre édition les Eperonniers 1996 - Le Dauphin, L'homme et le mer, édition du Perron 1998 )

Marine Mammal Commission. (1990, January 31). Annual report of the Marine Mammal Commission, calendar year 1989, A Report to Congress, p. 61-67.  
(1994, January 31). Annual report of the Marine Mammal Commission, calendar year 1993, A Report to Congress.  
(1995, January 31). Annual report of the Marine Mammal Commission, calendar year 1994, A Report to Congress, p. 168, 231.  
(1996, February 29). Annual report of the Marine Mammal Commission, calendar year 1995, A Report to Congress.

Mayer, Sue "A Review of the Scientific Justifications for Maintaining Cetaceans in captivity » WDCS, 1998

Norton, B. (1995). A broader look at animal stewardship, in Norton et al, (Eds.), Ethics on the Ark (pp.102-121). New York, London; Smithsonian Institution Press.  
Not a snowball's chance in hell - liberated whale Gigi lost, feared dead. (1972, March 14). Combined News Service, Long Beach Press-Telegram, p. A-24.

Odell, D. & Asper, E. (1990). Distribution and movements of freeze-branded bottlenose dolphins in the Indian and Banana Rivers, Florida. in S. Leatherwood & R. Reeves (Eds.), The bottlenose dolphin (p. 315). San Diego; Academic Press.  
Odell, D. (1991, November 22). NMFS presentation, public meeting on killer whales in captivity.  
Olesiuk, P. (1992, January). Dolphins', whales year-round home was German prisoner-of-war camp, Niagara Falls Review.  
Olesiuk, P. (1995, January 24). Marine mammal research and conservation discussion.  
Olesiuk, P., Bigg, M. & Ellis, G. (1990). Life history and population dynamics of resident killer whales (*Orcinus orca*) in the coastal waters of British Columbia and Washington state, Rep. Int. Whal. Comm., Special Issue 12, pp. 209-244.

Man Janet, Richard C. Connor, Peter L. Tyack and Hal Whitehead "Cetacean Societies. Field studies of dolphins and whales". University of Chicago. 2000

McBride, A. F. and D. O. Hebb 1948 Behavior of the captive bottlenose dolphin *Tursiops truncatus*, Journal of Comparative Psychology, 41(2):111-123\*

Morgane, P. and M. Jacobs 1972 "Comparative anatomy of the cetacean nervous system. In: Functional Anatomy of Marine Mammals, Vol. I (Ed. R. J. Harrison), Academic Press, London and New York.

O'Connor Richard and Dawn Micklethwaite Peterson "The Lives of Whales and dolphins" Henry Holt & Compagny Publishers, New York 1994.

Pryor Karen and Kenneth S. Norris "Dolphin Societies Discoveries & Puzzle" University of California Press. Berkeley/Los Angeles/Oxford 1991

Pryor, K. (1975). Lads before the wind. New York; Harper & Row

Schroeder, J.P. (1990) "Breeding Bottlenose dolphins in captivity". In "The Bottlenose Dolphin" S Leatherwood and R.R. Reeves (eds) Academic Press: San Diego, CA. pp 435-446

DE BOIS HELGA, PAUL VAN DEN SANDE Preliminary Report on the Demographic Status of the Bottlenosed Dolphin in the E.E.EC (July 1981, Royal Zoological Society of Antwerp and European Community

Dierauf LA. "Stress in marine mammals, in CRC Handbook of Marine Mammal Medicine: Health, Disease and Rehabilitation", Dierauf LA, Ed.. CRC Press Inc., Boca Raton, FL, 1990b, 295-301.

Duffield, D. A. and R. S. Wells 1990 Bottlenose dolphins: Comparison of census data from dolphins in captivity with a wild population. International Marine Animal Trainers Association 1990 IMATA Soundings, Spring 1991 pp. 11-15.

Entrup Niki and al. "The Dolphin Traders". A WDCS Investigation into the World-wide Trade and Export of Black Sea bottlenose dolphins (*Tursiops truncatus*) from the Ukraine and Russia 1990 - 1997.

Environmental Investigation Agency "The Global War Against Small Cetaceans" published by the 208-209 Upper Street, London N1 1RL.

Faulk EY. "Water quality considerations for marine mammals", in CRC Handbook of Marine Mammal Medicine: Health, Disease and Rehabilitation, Dierauf LA, Ed.. CRC Press Inc., Boca Raton, FL, 1990, 537-542.

Folzenlogen, D. and R. (1993). A guide to American zoos & aquariums. Ohio; Willow Press.  
Hooper, K. (1995). personal communication.

Ford, J. (1991, March). Family fuges. Natural History, pp. 68-76.

Ford, J., Graeme, E. and Balcomb, K. (1994). Killer Whales. Vancouver; UBC Press.

Foose, T.J., de Boer, L., Seal, U.S. & Lande, R. (1995) Conservation management strategies based on viable populations. In "Population Management for Survival and Recovery. Analytical Methods and Strategies in Small Population Conservation". J.D. Ballou., M.Gilpin, & T.J. Foose (eds) Columbia University Press: New York. pp 273-294.

Hartmann, Manuel. "The European studbook of bottlenose dolphins (*Tursiops truncatus*) : 1998 survey results. In Aquatic Mammals 26(2): 95-100". [publié par le Zoo de Duisburg, Meulheimer Str. 273, 47058 Duisburg, Germany)

Herman, L. M. 1980 Cognitive characteristics of dolphins. In: Cetacean Behavior:

Hoyt, Eric "Orca : The Whale Called Killer Published by E.P. Dutton 1999.

Howell, R. (1968, February). Bringing Orky home, Westways, pp. 13-15.

IUCN (1991, October). Caring for the earth, p. 7.

Jerison, H. J. 1986 "The perceptual worlds of dolphins". In: Dolphin Cognition and Behavior (Eds. Schusterman, R. J., J. A. Thomas and F. G. Wood), Lawrence Erlbaum Associate Inc.

Krajniak EF. Opening a new marine mammal exhibit.  
International Marine Animal Trainers Association Proceedings 1987; 63-66.

Keller, K. V. 1987. „Training Atlantic Bottlenosed Dolphins (*Tursiops truncatus*) for Artificial Insemination". Proceeding of the Intl. Mar. Animals Trainers Asso. Conf., Vancouver B. C., Canada, 27-31 Oct. 1986, pp. 22-24. (Describes the training of behaviors supporting research in breeding bottlenosed dolphins in captivity).

## Bibliography

Alaniz, Yolanda, Lic. Hugo Castello, and Cecilia Vega. "Los Definiarios en México -- Un Informe Critico" (Dolphinaria in Mexico -- A Critical Report). Produced with the support of Animal Welfare Institute, Cetacean Society International, Conservación de Mamíferos Marinos de México, A.C., Earth Island Institute, Humane Society International, Mac Hawley, Swiss Working Group for the Protection of Marine Mammals, and the Whale and Dolphin Conservation Society.

Amundin M. "Breeding the bottle-nosed dolphin *Tursiops truncatus* at the Kolmarden Dolphinarium". International Zoo Yearbook 1986; 24/25: 263-271.

Andrews B. "Marine mammal husbandry and training". American Association of Zoological Parks and Aquariums Regional Proceedings 1986; 318-319. International

Andrews, B., (1992, April 23). Letter to Icelandic Minister of Fisheries Thorsteinn Palsson.

(1991, July 11). Letter to Dr. William Fox, National Marine Fisheries Service, p. 3.

(1991, November 22). NMFS presentation, public meeting on killer whales in captivity.

(1991, December 4). Letter to BBC Wildlife magazine.

(1991, December 31). Letter to NMFS regarding Sealand permit application.

Andrews, S. (1991, May 21 & 22). WFLA-TV News 8, Tampa, Florida.

Asper, E. (1975). Techniques of live capture of smaller cetacea. J. Fish. Res. Board Canada, Vol. 31, pp. 1191-1196.

(1988, August 31). Post-collection report, Sea World.

Balcomb, Kenneth, III. "[Cetacean Releases: A List of Examples](#)". Friday Harbor, Washington

Beeler, M. 1995. Basic Marine Mammal Training Terminology and Techniques Defined and Explained.

Bermingham, J. (1995, March 11). Whale sparks question, The Province.

(1995, March 13). Dead orca calf lifted from pool, The Province.

Calero, L. (1988, January 18). Hailey's history, Dolphin Research Center report to NMFS.

California Coastal Commission (1995, February 7). Staff report on application #6-95- 13.

Campbell, R. (1994, November 11). Designing a gem of the oceans, The Boston Globe, p. 43.

Carson, R. (1994, July 17). Mother whale is full of grief; public is full of questions, The News Tribune.

Conway WG. The practical difficulties and financial implications of endangered species breeding programmes. International Zoo Yearbook 1986; 24/25: 210-219.

Cornell, L. (1979, April 1). Application for permit to import for public display under the Marine Mammal Protection Act of 1972, Sea World, pp. 3-4.

(1987, February 19). Necropsy report, SWC-TT-8736 "Sundance".

(1993, July 8). Preliminary report to Jerje Mooney, Fund for Animals on Keiko, Reino Aventura, Mexico City.

Currey, D., Lonsdale, J., Thorton, A. & Reeve, R. (1990). The global war against small cetaceans, London; Environmental Investigation Agency, pp. 12-13.

Finally the Group of Inquiry recommended that research led within these establishments should be placed under the control of official scientific organisations.

**Every effort is made to ensure that the information provided is accurate, but no legal responsibility is accepted for any errors or omissions in that information. In case of doubt, the French language original should be consulted as the authoritative text.**

## 6-Standards in Dolphinariums

**A** The setting up of standards as far as dolphinariums are concerned follows the inescapable logic of the legislator. It seems nevertheless obvious to us, after critical analysis of the detention of cetaceans in an artificial environment, that this species does not tolerate captivity. Adding a few metres in length, width or depth does not give them the space, nor the quality of the natural environment, which is indispensable for the existence of a species such as the cetaceans. The only attitude which would respect the needs of cetaceans would be to observe them in their natural environment and to prohibit any form of captivity other than in rehabilitation centres when they are beached or where wild individuals are treated for illness.

**B** A recent example from England

In August 1986 the UK Minister of the Environment decided to set up a Group Inquiry comprised of experts and official representatives.

Dr Margaret Klinowska and Dr Sue Brown, internationally renowned experts on cetaceans, had first been requested to write up a report on the situation of dolphinariums in the country. The aim of this report was principally to determine if “the benefits in terms of education, scientific research or reproduction of cetaceans in captivity made it worth importing new wild dolphins just to be offered up as a public spectacle”. The two experts were also asked to determine the standards which, according to them, should be applied to these establishments, so that the captive animals could be received under conditions which would satisfy their most basic ethological and social needs.

The conclusions drawn after analysing the recommendations of the report provided by the Group of Inquiry were complex but quickly manifested themselves in a very concrete way. Being incapable of responding to the new criteria, which were extremely demanding and expensive, all of the establishments resigned themselves to closing their doors. There has not been a dolphinarium in England since 1993... The final report of the Group of Inquiry put forward some suggestions which are still wholly relevant today:

It regretted, amongst other things, that there was not any particular regulation in existence to manage the very particular situation of completely aquatic marine mammals within the framework of captivity.

It proposed that all captive dolphins should be clearly identified, using a set of standard photographs and a drawing of their dorsal fin. Their birth, importation and death should be notified to an official organisation responsible to the Ministry, and the health record of each captive dolphin should be passed on to this same organisation at least once every three years. The dolphinariums should commit themselves to ensuring a decent future to their ‘borders’ if the concern is being closed down.

A very marked improvement in the conditions at reception was furthermore demanded and the educational inconsistency of the shows has been noted.

At the end of August 2000 at Vallejo Park in California (USA): the death of an orca, Viga aged 23. The death was attributed to a heart attack. In 1997, Yaka, another orca aged 32, was found dead from a respiratory infection in the same pool. Remember that the average age of a female orca is ...90 years! A dolphin aged 3 months died in a neighbouring pool during the summer of 2000.

On 19 August 2000 at Niagara Marineland in Toronto (Canada) a female beluga christened Dee, who had just been captured for reproduction, died within a few minutes of her arrival of a sudden respiratory arrest. It would appear that she could not tolerate the conditions of her captivity. In December 2000 another beluga was found dead in the same dolphinarium due to a liver infection.

In March 2000 a 3 year old orca died there due to a breakdown in its immune system.

In September 2000 a baby Atlantic Tursiop dolphin, born in captivity in the August, died a month later at Indianapolis Zoo.

On 13 October 2000 the first 'pink dolphin' born in captivity died after only living for one month at Underwater World in Singapore. Its Mother was one of six hump-backed dolphins from the Indian-Pacific present in the Asian dolphinarium.

On 4 October 2000: three adult Tursiop dolphins died at the Sea Aquarium in Miami (USA).

- At Duisburg Zoo for example, more than 50 cetaceans have died since 1976
- At Antwerp Zoo 29 dolphins have died between 1969-1997
- The Bruges Dolphinarium has never released its mortality rate.
- Fire at the establishment 1988. Two adult dolphins died in 2000.



## 5- Mortality in Dolphinariums: Average Age and Mortality

### A-At Liberty

**Average age of Tursiops dolphins under natural conditions exceeds 50 years for females and 40 for males. (Man, Janet et al. 2000)**

### B- In Captivity

B1 In January 1998 181 Tursiops dolphins were held in captivity at 30 establishments distributed among 11 countries in Europe. Of these 181 individuals, 70 were male and 111 female:

-48.6% of the males and 74.8% of the females are 'founders' (captured in the natural environment).

-35.4% of the incarcerated population were born in captivity, or 51.4% of all males and 25.8% of all females.

B2 Within this population, the distribution categorised according to their age in the dolphinariums is the following:

- Average age of dolphins born in captivity: less than 10 years
- The oldest female in Europe born in captivity: 14 years
- The oldest male born in captivity: 16 years
- Average age of females born in captivity: 4.3 years
- Average age of males born in captivity: 6.4 years
- Average age of female 'founders': 19.2 years
- Average age of male 'founders': 20.2 years (Hartmann, M. 1998)

B3 Whilst it is very difficult to obtain exact figures on mortality rates in dolphinariums within Europe as a whole, or the world, announcements of new deaths are reported every day by organisations working for the defence of cetaceans.

On the morning of 10 August 2000 the Tursiops dolphin Maria, aged 19, died at the dolphinarium at the West Edmonton Mall (Canada).

On 17 August 2000: the death of one of two female orcas at Marineland Ontario. No precise information is available since the marine park will not release the news officially.

## B.1 Psychological Problems

When one observes dolphins in a dolphinarium whether in Europe, the USA or Israel one is struck by the 'autistic' type of behaviour linked to several factors:

- the difficulties of integrating into an environment which is not adapted to their needs 'impression of non-adaptability'
- the particular sensitivity of the dolphins

The studies that have been carried out (in particular the serology in Zn, Ca and Mg) demonstrate the emotional fragility of dolphins. Its tuberculinic typology (according to homeopathic classification) will lead to a deficiency in strength in dolphins, deficiencies which are aggravated by stress and the nutritional deficiencies in dolphinariums.

The autistic behaviour of captive dolphins manifests itself by:

- stereotypic movements (always swimming anti-clockwise, antiphysiological sense)
- self-mutilation
- aggression unknown in their natural habitat, except when provoked by man
- deviant sexual behaviour

(Dr G Lippert-'Dauphin l'autre' .)

## B.2 Physical Problems

The permanent stress which the captive dolphins live under cannot be extricated from this 'unnatural' environment where everything is:

Either excessive: noise, human presence, pollution of the surrounding air, force feeding, presence of chlorine and synthetic vitamins, antibiotics from birth...

Or deficient: natural vitamins and minerals, UV, plankton...

which rapidly induces physiological stress which will have significant repercussions on the immune system. This weakening will be the cause of different organic\* problems such as:

- respiratory problems: responsible for the mortality of newborns
- digestive problems
- cutaneous problems

\*Proceedings of the 3<sup>rd</sup> mammals health care workshop.  
Diagnostic and therapeutic methods in marine mammals  
Duisburg Zoo 4-5 December 1993, Germany Dr G Lacave

This explains why it is necessary to keep them constantly on antibiotics, which is the source of numerous complications and unnecessary suffering.

Because of movement restrictions a slow sclerosis of the musculature was witnessed and certain muscle groups developed more than others.

#### **4.3- Respect of physiological and ethological needs**

##### **A Social ethiology, distribution of the sexes and aggression**

###### **A1- In the Wild**

-The grouping of females belonging to several generations with their young ones within their own territory, the males stay on the periphery and only make short visits. Average proportion two males to one female (2/1).

-The oldest females are dominant, no bloody conflicts, importantly there is the possibility of flight for the losers of a fight; collaboration rather than confrontation. (O'Connor, Richard. 1994).

###### **A2-In Captivity**

Too many females and not enough males; for this reason conflicts typical of captivity between pregnant mothers and those on the point of giving birth and even infanticide by jealous females.

- Reconstruction of a polygamous social structure, instead of the fission-fusion type found in the natural environment.
- In the wild males are not used to socialising with females for a long time. In captivity the males are obliged to redefine their territory relentlessly due to continuous incursions by other dolphins in the pool. Aggression out of all proportion from the dominant male is the source of numerous behavioural and social problems, particularly for the youngest in the group. (Mooney, Jerry.1998).
- Traumatic injuries attested in the 'studbooks' of dolphinariums following this type of fight: "haemorrhage", "wounds inflicted by a male dolphin", "traumatic cerebral haemorrhage", "killed by another animal" "death associated with a ruptured jaw" "jumped out of the pool", or "rupture of the spine" (De Bois, Helga, 1981).

**B Disregard for physiological and ethological needs inherent to captivity is the cause of serious problems, both psychological and physical, both being very closely linked.**

## **4.2-Freedom of Movement: Comparison of activity and living space in the natural environment and in captivity**

### **A-In the Wild:**

-A normal community (pod) contains on average a few hundred dolphins divided into a 'central territory' of 125 kilometres in length which undertakes long journeys towards other groups.

-The average diving depth of Pacific Tursiops dolphins: 535 metres.  
The average diving depth of Atlantic Tursiops dolphins: 390 metres.

-Average time spent on the surface: less than 20% of a total lifetime.

Principal activities consist of: foraging (searching for invertebrates in the depths), exploration (scouting), hunting in packs (numerous and varied methods which are culturally transmitted), socialisation, algae games, vocal exchanges, education of young ones. (Cetacean Societies, 2000).

### **B-In Captivity**

The Articles of the Belgian law of 19/08/99 indicate a maximum number of 3-5 dolphins for a pool with a surface area of 275 m<sup>2</sup> and a depth of 5 meters on 20% of the surface area of the pool and of 3.5m on 80% of the surface area of the pool. An extra area of 75m<sup>2</sup> is envisaged per animal added.

The minimum standards for the reception point, under which the establishment is not considered acceptable, were devised by the European Association for Aquatic Mammals, <http://www.eaam.org/>, a federation of professional interests bringing together the main dolphinariums in Europe. These standards are not only to do with the space reserved for the animals, their diet or the care they must be given, but are also essentially concerned with how to limit the costs of the installation as much as possible, and to make believe that the dolphins can live happily under such conditions. If the dolphinarium in Bruges or that of the Asterix park abide on the whole by these standards, they are rarely respected outside of Northern Europe or the U.S.A. and in any case do not in any way satisfy even the natural biotope (see above) or the most elementary ethological demands of the captive dolphin. (see above). In Spain, Portugal, South America, Japan or any other country, the dolphins are taken in under even worse conditions. In particular, the travelling tented dolphinarium in Saudi Arabia, or the barred enclosures on the sea at La Paz (Mexico), next to a sewage outlet. (News dossiers WDCS 2000-2001).

- the dolphinarium at Bruges where, in 1999 11 dolphins were in a pool of 3 million litres of water, six metres in depth.

-The Asterix park, where in 1997, 7 dolphins (5 females and 2 males) were in 1044 5m<sup>2</sup> of surface area for a volume of 3 million 400,000 litres of water. Length of the outside pool: 45 metres wide: 17.5 metres deep: 4.5 metres at the deepest end and 2.5 metres elsewhere.

adulterated in dolphinariums (G. Lippert quoted above from 'Dauphin, l'Homme et la mer).

## **2° care**

- The emergence of the many problems which affect dolphins in captivity are a reflection of their incapacity as a species to adapt to it. The change from their healthy state shows up as much in psychological as in structural pathology, the two in any case being strongly linked. This necessitates setting up a great number of measures, prophylactic or curative, which are themselves a reflection of the scope and the means at the disposal of these reception points.

## **3° housing**

- The dolphin lives in the sea - the ocean - an environment in which the salt, mineral and oligo-element content is complete; all the elements of the Mendeleev table are found there. (Dr G Lippert- 'Dauphin l'Autre'). In dolphinariums the sea water is replaced by a substitute reconstructed on the basis of chlorinated city water with some oligo-elements (potassium, magnesium,...) added in a totally haphazard manner. Their variable distribution may also be at the root of pathologies due to deficiency or excess of same. The dolphin enclosed in his pool in unhealthy water has no means of going to see if the water further away would be more suitable, something which he constantly does in the natural environment.

All the elements associated with the marine world are important to the dolphin's stability, the currents, the waves, the algae... but also, of course, the sun, largely absent from dolphinariums in Northern Europe and Belgium in particular. Besides the deficiencies (lack of photon supply needed by the pituitary gland, the source of physical and psychological depression) and physical (mineral and vitamin deficiency, D, E, selenium) imposed upon dolphins in captivity, there is also the whole educational aspect, which needs to be put at the forefront. Dolphinariums are supposed to give our children an idea of the dolphins' natural environment. The reality however, is something entirely different. It is a gross educational error and children will suffer for it. The tragedy is that children may accept this reductionist image of the sea and consider it as a valueless space not worthy of taking into consideration. How will children know that the sea where these dolphins live freely is a fabulous environment which regulates all the essential processes for life. How much longer can we let this absurd situation continue? (cf.2.B page 25).

### **3- Trade and Commercial Use of Dolphins**

Numerous facts clearly illustrate that the presence of dolphins in dolphinariums has more to do with using this species for economic ends: to promote a show, or to sell dolphins born in captivity.

#### **A The Spectacle**

The paying shows which are presented in most dolphinariums are more like spectacles at the circus than anything with an educational or a fortiori, scientific calling.

#### **B Reproduction in Captivity**

- no reproduction, worthy of the name, has resulted from dolphins in captivity
- in addition, the genetic selection imposed in captivity runs contrary to the elementary principles of reproduction in the natural environment, which is tied to a series of ethological behaviours absent from dolphinariums. This trade therefore is solely intended for transferring individuals from dolphinarium to dolphinarium as and when requests arise. None of this is related to any scientific programme but rather falls within the realm of international trafficking; to maintain a commercial industry supported by the flaws and contradictions in international legislation,.

### **4-Detention in Dolphinariums**

The detention of cetaceans must be analysed according to the criteria elaborated within the text of the law, notably the Royal Decision of 10 August 1998 regarding:

- necessary measures with respect to diet, care and lodging
- freedom of movement
- physiological and ethological needs

Let us examine these points in detail within the framework of dolphinariums.

#### **4.1 Necessary measures taken within the context of:**

##### **1° diet**

- Frozen, vitamin-enriched food has been shown to have limitations. The dolphin eats it occasionally because it is forced to, never because it is hungry. In a number of cases this refusal to feed leads to force feeding the cetaceans who otherwise would starve themselves to death.
- The dolphin is a ruminant, distant relatives of the biongules of the Cretaceous period. It needs vegetable matter, varied algae and plankton, fresh or predigested, in the intestines of ingested fish. Such elements are absent or

-The separation of mother and child is extremely painful for the young cetaceans snatched from their mother. Example: the tragic circumstances of Keet who “hit his head against the edge of the pool and often resorted to self mutilation” (Hooper, personal account). Example: death of a young Tursiops in 1987 at the Dolphin Research Center of California (DRC) taken from his mother at 2 years: abnormal and infantile behaviour, incapable of defending himself against adults, finally let himself be killed by an older dolphin. Scars all over his body. (Calero 1998).

When a dolphin dies, the mother becomes seriously depressed: she is not shown the dead baby for fear that she will not let go of it and will keep the body next to her. (Carson, 1994).

Example: female orca, Bjossa, stayed five days next to her baby’s body no-one daring to go into the pool to recover it. (Birmingham, 1995).

- Creation of hybrids: at least a dozen varieties of Tursiops exist in the world, physically different according to their place of origin, but the dolphinariums do not take this into account and create hybrids. (Kirtland, 1993).
- Surplus: today the Tursiops population born in captivity exceeds the number that may be accommodated. In 1994 12 surplus dolphins from Ocean World (Florida) were sent to a dolphinarium in Honduras: two were found dead immediately on arrival. 8 others escaped from their ‘sea pen’ several months later during a storm.
- Example: dispatch of dolphins from the dolphinarium at Bruges to Portugal in 1998? Information still awaited on the part of the establishment concerned.

**C2 Value of this reproduction programme for conservation** There are 13 species of small cetaceans in danger of extinction, but none are detained in a dolphinarium and almost 130 million US dollars were spent in the 80’s on a plan to reproduce orcas in a pool. Result: eight orca dolphins survived, or 16.25 million per head. (Andrews, B. 1992).

**According to Pryor, K. 1975, the only real aim of captivity is to have: “the dolphin as the new domestic animal of the 21<sup>st</sup> century.”**

**C. The exception conferred on the basis of research related to the reproduction in captivity of endangered species and their conservation.**

## *C1 Reproduction in Captivity*

**In a pool 50% of dolphins born in captivity die before reaching one year, of which 23% during the first month of their life. (Olesuik, P. 1992). In Europe there has never been any success in breeding second generation dolphins. (Hartman, M. 1998).**

Different factors are implicated in these reports.

-The difficulty of nursing in a pool: stress, noise, presence of males, aggression on the part of the other females, lack of protected space. (Norton, B. 1995).

-Numerous accidents due to crowding or the crushing of dolphins against the walls. Similarly, drowning in the water outlets etc. (de Bois, Helga, Van den Sande, Paul, July 1981).

-Dolphins born in captivity, brought up in an inapt way, deprived of exercise, and not surrounded by an adequate social structure, suffer a serious lack of stimulation and satisfying social contact.

-Excess of antibiotics, lungs attacked by chlorine, lower mental development, weak musculature accompanied by nervous shaking. (Mayer. Sue, 1993).

-The dolphins' sexuality is heavily compromised by a situation never encountered in the natural environment: males are isolated and then placed with the ovulating females without even being able to choose their partner.

-Traumatic medical intervention to accelerate ovulation and collection of sperm: Marine World Africa USA, Miami Seaquarium, Shedd aquarium and Sea World Texas admit to frequently using methods of artificial insemination in the interests of inter-dolphinarium cooperation. (Folzenlogen, D. and R. 1993).

-Sexual precocity in the pool and the inability of the females to raise their little ones in the correct manner: Sea World points out that female orcas can reproduce from the age of 6 (publicity brochure 1993), whilst in their natural environment reproduction is not tied to age but to the social stature that the individual has reached. Nubile female orcas may be sexually active but the first pregnancy happens at around 14 or 15 years of age (Ford et al: 1994).

-Giving birth is always difficult without the 'aunt' to help with the birthing process: every birth is part of a wider social context in the natural environment (Schroeder, 1990).



These conclusions go a long way to explaining why the majority of zoos refuse to accept dolphinariums on their site, (Mayer, Sue. 1998) as well as the refusal of University scientific institutions to cooperate. (Cetacean Studies, 2000).

## *B. The Exception of the Educational Role*

- A number of factors attest to the futility of dolphinariums in the age of T.V. documentaries, films, low-cost holidays to see dolphins in the wild. (France, England, Spain, Portugal etc.)
  - Misleading information is constantly transmitted during shows or in documentation published by dolphinariums.
- -The anthropomorphic shows lead one to believe that dolphins behave like humans and tell us nothing about their capabilities in their natural environment.
- - The assertion that “dolphins rarely live beyond 25 years of age” is endlessly repeated, whilst in reality dolphins in the wild live to be 40-50 for males and 50-60 for females.
- “the dolphin is not as intelligent as claimed; in any case, less than that of a monkey”. False assertion, only with regard to cerebral volume, (1800 gr dolphins, 1500 man, less than a kilo for the chimpanzee). (noted by Kirtland, 1995).
- The observation; the study of captive animals; their presentation to the public in shows; confirms our view that there is nothing scientific in such an approach. Dr G. Lippert points out the inconsistency of the educational pretext several times in ‘Dauphin, l’Autre’ published by les Eperonniers 1996 – ‘Le Dauphin, L’homme et la mer, published by Perron 1998) *Cf\* point 4/ détention en delphinarium (detention in dolphinariums).*
- In short no dolphinarium can reproduce the real social life of the cetacean which it detains (culture, individual personality, vocalization, loyalty towards the group, family ties, hunting in collaboration etc). All of these concepts are wiped out and all that one gains is a meagre physiological explanation and a caricature of the real social life of dolphins often presented as monogamous and living in a human-type family (father, mother and children). (Mayer, Sue, 1993).

**For all of the above reasons, according to an opinion poll carried out in Great Britain by the WDCS (MORI, 1996) 85% of English people considered that “it was unacceptable to enclose cetaceans in a pool”.**

**B2-** The arrival at the pool causes a triple shock to a recently captured dolphin:

- a sudden and spectacular reduction in his living space,
- close contact under duress with human beings,
- necessity to eat dead fish and not living prey (Sweeney, J. 1990).

For this reason professionals are forced to confine the dolphins in an isolation pool for a month or more to 'desensitize' them. The dead fish are administered by force via tubes (forcefeeding) (Pryor, K. 1975) so that they are unable to starve themselves to death.

**The mortality rate of dolphins in the period covering their capture and the days following is 53% (Sweeney, J. 1990), or more than half.**

## 2- Scientific and Educational Exceptions

### **A. The Exception for Scientific Research**

**A1-** We have seen a **systematic halt** to scientific research in dolphinariums since the 70's. Since then really worthwhile scientific studies on cetaceans have been carried out by **observation at sea**. (Man, Janette et al. 2000)

**A2-** On the other hand, research in dolphinariums has been devoted to training techniques, prevention of disease caused by captivity, preservation of dolphins born in captivity and all rearing techniques similar to those used for domestic animals (Odell, D. 1991)

Moreover, within the context of a totally artificial environment the conclusions that can be drawn from, for example, autopsies, or daily blood analysis taken from animals always under medication (antibiotic cover), cannot be transposed into the natural environment. They contribute absolutely nothing to the study of the great infectious viral illnesses which ravage the population of free dolphins, due to the major differences in their living conditions.

- This is also the case for the whole of physiological research aimed at reproduction or sexual maturity. The atypical life of the captives affects their growth curve and their physiological and social development on a more general level.

- Behavioural studies also have hardly any relevance because they are based on the observation of populations outside of their culture and under human control.

**In summary, studies from dolphinariums are limited to problems provoked artificially by captivity. The results are neither transposable, nor of any benefit to conditions which prevail in the natural environment.**

# 1. The Capture of Dolphins

The capture of dolphins needs to be examined in all its different aspects. It covers not only the capture of cetaceans in their natural environment – the methods and consequences for the individuals, the dolphin community and the ecosystems – but also their transfer until they reach the dolphinarium.

## **A. Capture**

**A-1** Strictly speaking capture is a violent process usually accomplished by means of nets and lassoes. It causes numerous abortions, beaching and drownings. (Asper, E. 1975)

- The 'tail-grabber' (a kind of crane) used to pull the dolphin out of the water by its tail, is the cause of serious traumatism. (Cornell, 1986)
- In Japan, dolphins are the victims of industrial fishing techniques and salvaged for dolphinariums. (Currey et al, 1990).

**A-2 66% of captured dolphins are female adults,**

which impacts considerably on the reproduction rate of the group and its social coherence (the main role of females at this stage). (Cornell, L. 1979)

Due to the awareness of this **impact on the environment**, the American Federal Government decided to suspend all capture of Tursiops in the Gulf of Mexico on 14<sup>th</sup> March 1990. (Mammal Commission, calendar year 1989)

The dolphin population of the Black Sea is at the moment in the process of becoming extinct due to the combined effects of capture for dolphinariums and pollution. (Entrup Niki and al. 1990).

## **B. Transport and Arrival at the Pool**

**B1-** Dolphins are transported by stretcher. They are kept out of the water for hours which leads to different medical complications: rapid dehydration of the skin, breathing difficulties; pressure in the rib cage, sores at points of friction (Sweeney, J. 1990):

- the longest aeroplane journey endured by an orca lasted 68 hours. (Howell, R. 1968)
- another journey lasting 18 hours was endured by two Tursiops transported from California to Florida. On arrival lesions attributed to necrosis caused by pressure were such that they caused the death of one of the dolphins (Sweeney, J. 1990)
- on the basis of similar incidents the airline Lufthansa took the decision to stop transporting captive dolphins. (WCDS 1999).

**Second Section**

**The present situation**

By Yvon Godefroid and Dr G. Libbert

question or not under its present conditions, on the advice of the Commission on ZOOS.

In the Annex of this Ministerial Decision specifications regarding **the pool** are that **the area given is the minimum area of water which must be available on at least 50% of the surface, except for cetaceans.** The animals must have the possibility of entering and exiting the pool easily by their own means, except cetaceans. If there are several species of marine mammals detained together, an isolation pool must be provided for every two species.”

On page 30843 of the ‘Moniteur Belge’ of 19-08-99 the **minimum standards for pools** are set out.

For the **TURSIOPS TRUNCATUS** for example, it is provided that, for 3-5 individuals, the minimum dimensions for the area are 27m<sup>2</sup> and for the depth 5m for 20% of the area and 3.5m on 80% of the area (75m<sup>2</sup> of additional area per additional animal). It is also specifically mandatory to provide an isolation pool of 125m<sup>2</sup> and 3.5m depth.

Claude Goldschmidt  
20 March 2001.

**\*MB ‘Moniteur Belge’ – Journal which lists Belgian law**

According to Article 6 **“housing for animals (interior space and/or exterior where the animal is placed) must be designed and fitted out in a way so as to stimulate behaviour as varied and natural as possible”**.

Article 8 specifies that **“the Minister may lay down supplementary recommendations relating to the conditions of accommodation for animal species, in particular concerning minimum provisions for housing and fitting out of housing for animals”**.

Article 15 stipulates notably that **“in order to keep a regular check on the health and well-being of vertebrate animals other than fish, the person responsible for the zoo must be in contact with an approved veterinary doctor”**.

**“The person in charge alerts the vet in the case of every death.** The vet establishes the causes and takes the necessary measures to safeguard the health of other animals”.

The vet informs the person in charge when he notes that the health or well-being of animals is threatened and proposes to him the necessary measures to be taken. If his advice and remarks are not followed he should inform the department responsible for veterinary services”.

Article 24 stipulates that **“zoos must establish an educational and informative programme** in particular with regard to school children, based on an introduction to biology, ecology and nature conservation....**If animal displays are organised, their natural behaviour must be apparent, in line with the commentaries provided.”**

Finally Article 25 stipulates that the person in charge must note down **in a register**, certain information for each animal, or group of animals as provided for in the Royal Decision (as for example, the origin, date of acquisition or date of birth) and that this register must be completed by the vet with certain other pieces of information (such as in the case of death, the date and cause).

#### **4. The Ministerial Decision of 3 May 1999 fixing the minimum standards for the detention of mammals in zoos.**

This Ministerial Decision refers in its preamble to at one and the same time **the law of 14 August 1986 and the Royal Decision of 10 August 1998 on the agreement on zoos, notably Article 8 (see above) as well as the European Directive 1999/22/EC of 29 March 1999 relating to the detention of wild animals in a zoological environment.**

Article 2 stipulates that: **“the minimum sizes and the basic recommendations for the fitting out of enclosures where mammals are exposed are laid down in the Annex to the Decision”**.

The zoo, which at the moment of the entry into force of this decision, is holding **a species for which the Annex does not include a standard**, must present a dossier consisting of a description of the housing and care of the animals to the authorities. The department will decide whether to approve the detention of the species in

29/5/1985) grants exemptions pursuant to Article 4 of the law of 28 July 1981 but this apparently does not apply to dolphins.

## **2. The law of 14 August 1986, amended by the laws of 26 March 1993 and of 4 May 1995 relating to animal welfare and protection.**

In Article 3.9 **this law defines a zoo as being any establishment accessible to the public where live animals are kept and put on display, including dolphinariums (but notably excludes circuses).**

Article 4 contains important provisions:

- Article 4 paragraph 1 provides that: **“all persons who keep an animal must take the necessary measures to provide food for the animal, take care of it and house it in a way that is appropriate for its nature, its physiological and ethological needs, for its state of health, stage of development, adaptability or domestication.”**

Article 4 paragraph 2 stipulates that: **“no person who detains an animal may hamper its freedom of movement so much that it is at risk of avoidable pain, suffering or lesions. An animal usually or continually tethered or confined must have sufficient space in which to move, acknowledging its physiological and ethological needs.”**

According to Article 4 paragraph 3 **“lighting, temperature, degree of humidity, ventilation, air circulation and other ambient conditions within the housing of the animal must conform to the physiological and ethological needs of the species.”**

The law provides that, in Article 4 paragraph 4 **the King may**, in the execution of the last two paragraphs, **discontinue the supplementary rules for different species and categories of animals.**

## **3. Royal Decision of 10 August 1998 on the agreement on zoos.**

This Royal Decision provides that in order to implement the aforementioned law of 14 August 1986 **the zoos must obtain consent** from the Minister or Secretary of State who has agriculture within his remit following advice from the department responsible for veterinary services.

In the first Article, the King specifies that pursuant to that decree, the term **‘zoo’** is to be understood as: **“any establishment accessible to the public where non-domestic living animals are kept and put on display including dolphins...however, excluding circuses, travelling exhibitions and pet shops.**

***“Member States shall take measures ... to ensure all zoos implement the following conservation measures:***

***-participating in research from which conservation benefits accrue to the species, and /or training in relevant conservation skills, and/or the exchange of information relating to species conservation and/or where appropriate, captive breeding, repopulation or reintroduction of species into the wild***

- ***promoting public education and awareness in relation to the conservation of biodiversity***
- ***accommodating their animals under conditions which aim to satisfy the biological and conservation requirements of the individual species, inter alia, by providing species specific enrichment of the enclosures, and maintaining a high standard of animal husbandry with a developed programme of preventive and curative veterinary care and nutrition;***
- ***preventing the escape of animals....***
- ***keeping of up-to-date records of the zoo’s collection appropriate to the species recorded.***

The Directive also provides for the granting of licences, inspection, closure of zoos and “penalties applicable to breaches of the national provisions adopted pursuant to this Directive.”

These must be adopted **no later than 9 April 2002**. The Belgian authorities have informed the Commission that this Directive does not need to be transposed into Belgian law because it is covered by legislation already in force i.e. **Royal Decision of 10 August 1998 relating to the agreement on zoos**.

**5. The Resolution of the European Parliament on CITES of 16 March 2000** aims to reclassify dolphins from the Black Sea from Appendix II to Appendix I of CITES. This proposition has not been followed up by the Commission at the moment but is in the process of being examined.

**6. Commission Regulation No 2724/2000 of 3 November 2000**, partially modifying Council Regulation No 338/97 relating to the protection of species of wild fauna and flora by regulating trade therein.

## C BELGIAN LEGISLATION

**1. The law of 28 July 1981 (MB of 30/12/1983) which came into effect in 1984, approving CITES and the Royal Decree of 20 December 1983 (MB of 30/12/1983) relating to its implementation. The Royal Decision of 19 April 1985 (MB of**



***A series of specific exemptions from the prohibitions may be granted notably for educational purposes, research or reproduction (see points a-h of Article 8.3). as well as general derogations (see Article 8.4) first paragraph.***

Article 7 stipulates that: ***“save where Article 8 applies, specimens of species listed in Annex A that have been born and bred in captivity or artificially propagated shall be treated in accordance with the provisions applicable to specimens of species listed in Annex B.”***

According to Article 8.5: ***“the prohibitions referred to in paragraph 1 shall also apply to specimens of the species listed in Annex B except where it can be proved to the satisfaction of the competent authority of the Member State concerned that such specimens were acquired and , if they originated outside the Community, were introduced into it, in accordance with the legislation in force for the conservation of wild fauna and flora.”***

Article 9 regulates ***the movement within the Community of a live specimen of a species listed in Annex A and B*** and provides that ***“the Commission may establish restrictions on the holding or movement of live specimens of species”*** the introduction of which into the European Union is subject to certain restrictions on the basis of Article 4, paragraph 6.

The Regulation appoints, in addition, different authorities within each Member State charged with the implementation and control over the Regulation; to be noted in particular, **a Management Authority as well as a competent Scientific Authority**, and at the European level, a **Scientific Review Group**, and finally **the Committee for species of wild fauna and flora**.

#### **4. Council Directive (EC) No 1999/22 of 29 March 1999 relating to the keeping of wild animals in zoos.**

***“The objectives of this Directive are to protect wild fauna and to conserve biodiversity by providing for the adoption of measures by Member States for the licensing and inspection of zoos in the Community, thereby strengthening the role of zoos in the conservation of biodiversity.”***

In its preamble it refers notably to Council Regulation (EC) No 338/97 of 9 December 1986 and the Directive (EEC) No 92/43 of 21 May 1992 as well as the exceptions to their application and justifications among others, of education, research or reproduction.

***“For the purpose of this Directive “zoos” means all permanent establishments where animals of wild species are kept for exhibition to the public for 7 or more days a year, with the exception of circuses, pet shops and establishments which Member States exempt from the requirements of this Directive on the grounds that they do not exhibit a significant number of animals or species to the public and that the exemption will not jeopardise the objectives of this Directive”.***

## B. EUROPEAN LEGISLATION

**1. Council Regulation (EEC) No 3626/82 of 3 December 1982 applies the Convention on International Trade in Endangered Species of Wild Fauna and Flora in the Community with effect from 1 January 1984.** This regulation was revoked by Council Regulation (EC) No 338/97 of 9 December 1996 (see below).

**2. Council Directive (EEC) 92/43 of 21 May 1992 amended by the Directive (EC) No 97/62 of 27 October 1997 on the conservation of natural habitats and of wild fauna and flora,** prohibits the capture in European waters of a number of important species including dolphins (species listed in Appendix 4 of the Convention), listing derogations under certain circumstances; for the purpose of research and education, of repopulating and re-introducing and for reproduction (see in particular Articles 12 and 16 of the Convention).

Article 16 stipulates that: “ provided that there is no satisfactory alternative and the derogation is not detrimental to the maintenance of the populations of the species concerned at a favourable conservation status in their natural range....Member States shall forward to the Commission every two years a report in accordance with the format established by the Committee on the derogations applied ...and the Commission shall give its opinion thereon.

**3. Council Regulation (EC) No 338/97 of 9 December 1996 on the protection of species of wild fauna and flora by regulating trade therein and Council Regulation (EC) of 26 May 1997 comprising the details of the enforcement of this Regulation.**

The object of this Regulation is to protect species of wild fauna and flora and to guarantee their conservation by regulating trade therein.

**The Regulation classifies animal species into four categories (Annexes A to D). With the exception of certain sub-species (see entry ‘x703’, which appears at point 12 on page 61/15 of the Official Journal of the European Communities), all cetacean species are to be found in Annex B, which appears to correspond to Appendix II of CITES.** It should be noted that the number of dolphin sub-species to be found in Annex A appear to be more significant than those sub-species listed in Appendix I of CITES.

***Apart from derogations, “the purchase, offer to purchase, acquisition for commercial purposes, display to the public for commercial purposes, use for commercial gain and sale, keeping for sale, offering for sale or transporting for sale of specimens of the species listed in Annex A shall be prohibited”.*** (Article 8,1 relating to control of commercial activities).

***“Member States may prohibit the holding of specimens, in particular live animals of the species listed in Annex A.”*** (Article 8.2)

3. The Convention on the conservation of biological diversity of 1992 came into force in 1993, ratified by Belgium. In Wallonia **one** implementing decree was taken on 6 April 1995 (MB 10/06/95.) In Flanders, **there is** a general decree on conservation of the environment of 21 October 1997 (MB 10/01/98) **but it does not relate exclusively to the enforcement of this Convention. Following verbal information received, Flanders is not currently conforming to international and European texts on this matter.** For Brussels, the enforcement decision of the Government of the 'Bruxelles-Capitale Region' of 26 October 2000 (MB 28/11/00).

Article 8 of the Convention stipulates that each Contracting Party engages, where possible and appropriate, to promote the conservation of the ecosystem and natural habitats as well as to maintain viable populations of species in their natural habitat.

2. Any exploitation of wild fauna ... shall be regulated in order to keep the populations out of danger, taking into account the requirements of Article 2.
3. Measures to be taken shall include:
  - a. closed seasons and/or other procedures regulating the exploitation;
  - b. the temporary or local prohibition of exploitation, as appropriate, in order to restore satisfactory population levels;
  - f) the regulation as appropriate, of sale; keeping for sale; transport for sale or offering for sale of live and dead wild animals.

**Article 8 relates to the capture or killing of wild fauna species** specified in Appendix III, and in cases where, in accordance with article 9, exceptions are applied to species specified in Appendix II, Contracting Parties shall prohibit the use of all indiscriminate means of capture and killing and the use of all means capable of causing local disappearance of, or serious disturbance to, populations of a species, and in particular, the means specified in Appendix IV.

**In Article 11.2** each Contracting Party undertakes:

- a) to encourage the reintroduction of native species of wild flora and fauna when this would contribute to the conservation of an endangered species, provided that a study is first made in the light of the experience of other Contracting Parties to establish that such reintroduction would be effective and acceptable;
- b) to strictly control the introduction of non-native species.

**In Article 13** for the purposes of the Convention, a Standing Committee shall be set up. Any Contracting Party may be represented on the Standing Committee and, under certain circumstances, certain organisations or international or national organisations, either governmental or non-governmental, may be represented by an observer at one of its meetings.

Among the cetaceans mentioned in Appendix II are the following Delphinidae:

Delphinus delphis  
Globicephala macrorhynchus  
Globicephala melas  
Grampus griseus  
Lagenorhynchus acutus  
Lagenorhynchus albirostris  
Orcinus orca  
Pseudorca crassidens  
Steno bredanensis  
Stenella coeruleoalba Stenella frontalis

All cetaceans not mentioned in Appendix II are to be found in Appendix III.

**requires the co-operation of several States, and to promote such co-operation.**  
.. Particular emphasis is given to **endangered and vulnerable species**".

"The Contracting Parties shall take requisite measures to maintain the population of wild flora and fauna at, or adapt it to, a level which corresponds in particular to ecological, scientific and cultural requirements, while taking account of economic and recreational requirements and the needs of sub-species, varieties or forms at risk locally." **(Article 2).**

**Article 6 of the Convention stipulates that each Contracting Party shall take appropriate and necessary legislative and administrative measures to ensure the special protection of the wild flora species specified in Appendix II.** In particular the following shall be prohibited for these species:

- a) all forms of deliberate capture and keeping and deliberate killing;
- b) the deliberate damage to or destruction of breeding or resting sites;
- c) ...
- d) ...
- e) The possession of and internal trade in these animals, alive or dead,...

**Article 9 of the Convention stipulates that:** *"each contracting Party may make exceptions from the provisions ...from the prohibition of the use of the means mentioned in Article 8 provided that there is no other satisfactory solution and that the exception will not be detrimental to the survival of the population concerned:*

- for the protection of flora and fauna;
- to prevent serious damage to crops.....
- in the interests of public health and safety, .... or other overriding public interests;
- for the purposes of research and education, of repopulation, of reintroduction and for necessary breeding;
- to permit, under strictly supervised conditions, on a selective basis and to a limited extent, the taking, keeping or other judicious exploitation of certain wild animals and plants in small numbers.

**Article 7 of the Convention relates to the species of wild fauna specified in Appendix III.**

1. Each Contracting Party shall take appropriate and necessary legislative and administrative measures to ensure the protection of the wild fauna species as above;

**States with which such trade occurred; the numbers or quantities and types of specimens, names of species... and, where applicable, the size and sex of the specimens in question.”**

**Article IX** regulates the designations of Management and Scientific Authorities within each signatory State.

**Article XI organises the Conference of the Parties.** Paragraph 7 provides that under certain circumstances “any body or agency technically qualified in protection, conservation or management of wild fauna and flora, ... (may be) represented at meetings of the Conference by observers”.

**Article XII regulates the competence and functions of the Secretariat.** It shall notably, undertake scientific and technical studies .... request from Parties ..further information, ...invite the attention of the Parties to any matter...make recommendations for the implementation of the aims and provisions of the present Convention... When the Secretariat in the light of information received is satisfied that any species ... is being affected adversely by trade in specimens of that species or that the provisions of the present Convention are not being effectively implemented, it shall communicate such information to the authorized Management Authority (Article 8).

**Article XIV regulates the application of the Convention on domestic legislation and on international conventions.** It stipulates notably that “the provisions ... shall in no way affect the right of Parties to adopt:

- a) ***stricter domestic measures regarding the conditions for trade, taking possession or transport of specimens of species included in Appendices I, II and III, or the complete prohibition thereof:***
- b) domestic measures restricting or prohibiting trade, taking possession or transport of species not included in Appendix I, II or III.

The following provisions shall apply in relation to amendments to the Appendices of the Convention as well as amendments to the Convention itself: the settling of differences, ratification, the special reservations which each Party may make at signatory stage...

**Cetaceans in general are, it would appear, entered into Appendix II with the exception of certain species which are incorporated expressly into Appendix I,** like for example, with regard to the Delphinidae, the following sub-species:

Sotalia

Sousa

2. The Council of Europe Convention on the Conservation of European Wildlife and Natural Habitats of 19 September 1979 (Bern Convention) ratified by Belgium and passed into Belgian law 20 April 1990 (MB 29/12/90).

**“The aims of this Convention are to conserve wild flora and fauna and their natural habitats, especially those species and habitats whose conservation**

A Scientific Authority in each Party shall monitor both the export permits granted by that State for specimens of species included in Appendix II and the actual exports of such specimens.

The **import** of any specimen of a species included in Appendix II shall require the prior presentation of either an export permit or a re-export certificate.

The **re-export** of any specimen of a species included in Appendix II shall require the prior grant and presentation of a re-export certificate. A re-export certificate shall only be granted when the following conditions have been met:

- a) a Management Authority of the State of re-export is satisfied that the specimen was imported into that State in accordance with the provisions of the present Convention; and
- b) a Management Authority of the State of re-export is satisfied that any living specimen will be so prepared and shipped as to minimize the risk of injury, damage to health or cruel treatment.

**“The introduction from the sea ... shall require the prior grant of a certificate from a Management Authority of the State of introduction”** which must meet the following conditions:

- a) a Scientific Authority of the State of introduction advises that the introduction will not be detrimental to the survival of the species involved;
- b) a Management Authority of the State of introduction is satisfied that any living specimen will be so handled as to minimize the risk of injury, damage to health or cruel treatment.

(These) “certificates ... may be granted on the advice of a Scientific Authority, in consultation with other national scientific authorities or, when appropriate, international scientific authorities, in respect of periods not exceeding one year for a total number of specimens to be introduced in such periods”.

**Article VII of the Convention which relates to exemptions** specifies in particular that **“specimens of an animal species included in Appendix I bred in captivity for commercial purposes .... shall be deemed to be specimens of a species included in Appendix II.”** (Article VII paragraph 4).

**A Management Authority of any State may waive the requirements** of the obligations mentioned above and **allow the movement without permits or certificates of specimens which form part of a travelling zoo, circus, menagerie, ...or other travelling exhibition” under certain conditions** (Article VII, paragraph 7).

**Article VIII concerns “the measures to be taken by the parties”**, in particular concerning anticipated sanctions. **“The choice of a rescue centre...(the maintenance of) records of trade (with) the names and addresses of exporters and importers, the number and type of permits and certificates granted; the**

The **re-export** .... shall require the prior grant and presentation of a re-export certificate.....when the following conditions have been met:

- a) a Management Authority of the State of re-export is satisfied that the specimen was imported into that State in accordance with the provisions of the present Convention;
- b) a Management Authority of the State of re-export is satisfied that any living specimen will be so prepared and shipped as to minimize the risk of injury, damage to health or cruel treatment.
- c) a Management Authority of the State of re-export has proof that an import permit has been granted to all living specimens.

**“Introduction from the sea”** ... shall require the prior grant of a certificate from a Management Authority of the State of introduction. A certificate shall only be granted when the following conditions have been met:

- a) a Scientific Authority of the State of introduction advises that the introduction will not be detrimental to the survival of the species involved; and
- b) a Management Authority of the State of introduction is satisfied that, in the case of living specimens, the consignee has adequate living arrangements so as to conserve and take care of it properly
- c) a Management Authority of the State in which the specimen has been introduced is satisfied that it will not be used mainly for commercial ends.

**Appendix II** shall include all species which although not necessarily now threatened with extinction may become so unless trade in specimens of such species is subject to strict regulation in order to avoid utilization incompatible with their survival.

The **Export** of any specimen of a species included in Appendix II shall require the prior grant and presentation of an export permit. An export permit shall only be granted when the following conditions have been met:

- a) a Scientific Authority of the State of export has advised that such export will not be detrimental to the survival of that species;
- b) a Management Authority of the State of export is satisfied that the specimen was not obtained in contravention of the laws of that State for the protection of fauna and flora; and
- c) a Management Authority of the State of export is satisfied that any living specimen will be so prepared and shipped to minimize the risk of injury, damage to health or cruel treatment.



## DOLPHIN LEGISLATION

### A. INTERNATIONAL REGULATIONS

1. The Washington Convention on international trade in endangered species of wild fauna and flora (CITES) of 1973, ratified by Belgium and entered into force in 1984 (see below).

This Convention classifies species into different categories (Appendices I-III) and the countries party to the Convention undertake to not allow trade in these species without conforming to the provisions of the convention." **Trade**" means: "**export, re-export, import and introduction from the sea**".

"Appendix I shall include all species threatened with extinction which are or may be affected by trade. Trade in specimens of these species ... must only be authorised in exceptional circumstances".

**Export** "of any specimen of a species included in Appendix I shall require the prior grant and presentation of an export permit ... when the following conditions have been met:

- a) a Scientific Authority of the State of export has advised that the import will be for purposes which are not detrimental to the survival of the species involved;
- b) a Management Authority of the State of export is satisfied that the specimen has been obtained in accordance with the provisions of the laws on conservation of wild flora and fauna in force in this State;
- c) a Management Authority of the State is satisfied that any living specimen will be so prepared and shipped as to minimize the risk of injury, damage to health or cruel treatment;
- d) a Management Authority of the State is satisfied that an import permit has been granted for said specimen.

**Import** shall require the prior grant and presentation of an import permit or, either an export permit, or a re-export certificate. An import permit shall only be granted when the following conditions have been met:

- a) a Scientific Authority of the State of import has advised that the import will be for purposes which are not detrimental to the survival of the species involved;
- b) a Management Authority of the State of import is satisfied that the proposed recipient of a living specimen is suitably equipped to house and care for it; and
- c) a Management Authority of the State of import is satisfied that the specimen is not be used for primarily commercial purposes.

**dolphinariums**....however, to the exclusion of circuses, travelling exhibitions and pet shops”.

**4. The ministerial decision of 3 May 1999 fixes the minimal standards for the detention of mammals in zoos.**

This ministerial decision references in its introductory statement at once and at the same time **the law of 14 August 1986 and the royal decision of 10 August 1998 relating to the agreement on zoos, notably article 8 (see above) as well as the European Directive 1999/22/CE of 29 March 1999 relating to the detention of wild animals in a zoological environment.**

In its preamble it refers notably to Council Regulation (EC) No 338/97 of 9 December 1986 and to the Directive (EEC) No 92/43 of 21 May 1992 as well as the exceptions foreseen in their enforcement and justified among other things by education, research or reproduction.

The Belgian authorities have informed the Commission that this Directive does not need to be transposed into Belgian law because it is covered by legislation already in force, *cf. Royal decision of 10 August 1998 on agreement on zoological parks.*

**5. The Resolution of the European Parliament on CITES of 16 March 2000** notably aims to re-classify dolphins from the Black Sea from Appendix II to Appendix I of CITES. This proposition has not been followed up by the Commission at the moment, but is under examination.

**6. Commission Regulation No 2724/2000 of 3 November 2000** partially modified by Council Regulation No 338/97 on the protection of species of wild fauna and flora by regulating trade therein.

## C BELGIAN LEGISLATION

**1. The law of 28th July 1981 (MB of 30/12/83) came into force in 1984 approving CITES and the Royal decree of 20 December 1983 (MB of 30/12/1983) on its implementation.** The royal decree of 19 April 1985 (MB\* of 29/5/1985) grants exemptions on the application of article 4 of the law of 28 July 1981 but apparently this does not apply to dolphins.

**2. The law of 14 August 1986, amended by the laws of 26 March 1993 and 4 May 1995, relating to animal welfare and protection.**

***In Article 3.9 the law defines a 'zoo' as being all establishments accessible to the public where living animals are held and put on display, this includes dolphinariums*** (but notably excludes circuses).

**3. Royal decision of 10 August 1998 relating to the agreement on zoos.**

This royal decision makes provision for that to implement the aforementioned law of 14 August 1986, **the zoos must obtain consent** from the Minister or Secretary of State who has agriculture within his remit, following advice from the department responsible for veterinary services.

In **the first article** the King specifies that pursuant to that decree, a specific place meant by **zoo** is "any establishment accessible to the public where living animals belonging to non-domestic species are held and put on display **including**

## DOLPHIN LEGISLATION

### A. INTERNATIONAL LEGISLATION

1. The Washington Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES, 1973) ratified by Belgium and entered into force in Belgium in 1984 (see below).
2. The Convention of the Council of Europe relating to the conservation of European wildlife and natural habitats dated 19 September 1979 (Bern Convention) ratified by Belgium and adopted into Belgian law on 20 April 1990 (MB 29/12/90).
3. The Convention for the conservation of biological diversity (1992) entered into force in 1993, ratified by Belgium. In Wallonia an implementing decree was taken on 6 April 1995 (MB 10/06/95). In Flanders, a general decree (21 October 1997, MB 10/01/98) **exists** relating to the conservation of the environment **but it does not exclusively concern the implementation of this Convention. According to verbal information Flanders is not presently conforming to international or European texts on this matter.** For Brussels the decision of compliance of the Government of the Brussels Region of ('Bruxelles-Capitale') dated 26 October 2000 (MB 28/11/00).

### B. EUROPEAN LEGISLATION

**1. Council Regulation (EEC) No 3626/82 of 3 December 1982 on the enforcement of CITES in the European Union from 1<sup>st</sup> January 1984.**

This regulation has been repealed and replaced by Council Regulation (EU) No 338/97 of 9 December 1996 (see below).

**2. Council Directive (EEC) No 92/43 of 21 May 1992, modified by Directive (EU) No 97/62 of 27 October 1997, on the protection of natural habitats as well as species of wild fauna and flora,** prohibits the capture in European waters of a number of important species including dolphins, listing derogations under certain circumstances, for the purposes of research and education, for repopulating, re-introducing and for reproduction.

**3. Council Regulation (EC) No 338/97 of 9 December 1996 on the species of wild fauna and flora by regulating trade therein and Commission Regulation (EC) No 939/97 of 26 May 1997 comprising the details of enforcement of this regulation.**

**4. Council Directive (EU) No 1999/22 of 29 March 1999 relating to the detention of wild animals in a zoological environment.**

*This directive aims to protect wild fauna and flora and preserve the biodiversity in foreseeing the adoption by Member States of measures to grant licences and inspection of zoological gardens within the European Union, reinforcing therefore the role of zoological gardens in conserving biological diversity.*

**First Section**

**Critical Analysis of Legal  
Texts**

By Claude Vankerckhoven

This dossier on the subject of dolphinariums comprises two sections:

- 1- A legal section which sets out the main legal texts which, on a national and international level, deal with different aspects that are linked, directly or indirectly, to dolphin captivity.
- 2- A second section which sets out a summary of commentaries based on recent scientific studies, for the most part from dossiers of the Whale and Dolphin Conservation Society (UK) ([http://www.wdcs.org/.](http://www.wdcs.org/)) These commentaries highlight the fact that legislation still does not sufficiently protect the welfare and security of cetaceans at this point in time.

In order to create a link between the legal and scientific sections we intend to analyse the many-sided aspects connected to dolphin captivity using six interfaces:

- 1- the capture of dolphins
- 2- scientific and educational exceptions: the pretext
- 3- trade
- 4- detention in dolphinariums
- 5- mortality in dolphinariums
- 6- the standards in dolphinariums

The main part of the work endeavours to achieve the following:

- to draw from the texts the mindset of the legislator at the time of drafting the legal framework:
- to show how certain standards allow for the protection of certain species in their natural environment – and for the justification and promotion of commercial interests
- on the basis of objective facts to show the contradictions between what the legislator is actually defining when he touches on notions of *educational and scientific exceptions* and the reality of applying these notions in the case of dolphinariums;
- to ban dolphinariums in Europe and to stress at the national and international courts the necessity of promoting rehabilitation and observation areas for dolphins in their natural environment (under the control of renowned scientific authorities) with a view to proposing an alternative to the current situation.

Dr Yvan Beck  
Coordinator

By

Madame Claude Vankerckhoven Goldschmidt, lawyer  
Yvon Godefroid (journalist), Dr Gérard Lippert and Dr Yvan Beck (veterinary  
surgeons)

## Dolphinariams

A critical analysis of legal texts – international and Belgian – in the light of the realities and contradictions within this area.

