Toronto Zoo: Evaluation of Options for the Elephant Program

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Study Rationale and Methodology

- Responded to the Zoo's RFP
- Objective and independent review
- Due diligence for the Zoo Board
- Reviewed documents
- Interviewed stakeholders



Study Background

- Toronto Zoo has had an African elephant program for over 36 yrs
- At its peak: 8 elephants, 7 females and a bull
- Today 3 females, all post-reproductive Ages 42, 41 and 30
- Current AZA/CAZA standards are for minimum of three elephants, recognizing need for elephant socializing
- It is expected the number of elephants will fall below minimum soon
- Existing facilities at the Toronto Zoo when constructed and renovated were state of the art/science but standards continue to change
- Toronto Zoo sees the need for much larger indoor and outdoor facilities in the near future



Options for the Elephant Program

1. Expand Elephant Program

- Expand indoor and outdoor spaces substantially
- Acquire younger elephants and initiate breeding program

2. Phase-Out Elephant Program

- Relocate remaining elephants to another accredited zoo offering larger facilities before or after the minimum number drops below three
- Or acquire other post-reproductive elephants when number drops below the three minimum standard



Criteria to Evaluate Options

- Toronto Zoo Vision and Strategic Plan
- Health and well-being of elephants
- Conservation and education commitments
- Availability of elephants
- Capital costs of facilities
- Transition costs
- Opportunity cost implications
- Staffing and other operating costs
- Attendance and visitor-generated income
- Private and government funding
- Public relations



Recommendations

- 1. Phase out of the existing Elephant Program
- 2. Transfer the three remaining elephants to an AZA accredited facility with enhanced facilities and programs
- 3. Reconsider starting a new elephant program in the future, depending on the results from the IMLS study, financial priorities etc.



Health of Remaining Elephants

- Three older elephants are in good health
- Need new elephants, or may soon be below the standard of three
- New elephants are not readily available



Uncertainty About Availability of Elephants

- Substantial Demand: AZA estimates potential capacity for 532 elephants (290 currently housed), if all 61-AZA accredited zoos implement plans for expanded elephant programs
- Uncertain Supply:
 - Other Zoos: Few elephants of reproductive age, few bull elephants
 - Private Sources: Cost, permits and border-crossing issues
 - African Range Countries: Very uncertain availability
 - Asian Elephants from Other Canadian Sources: Easier to obtain but already Asians at nearby African Lion Safari



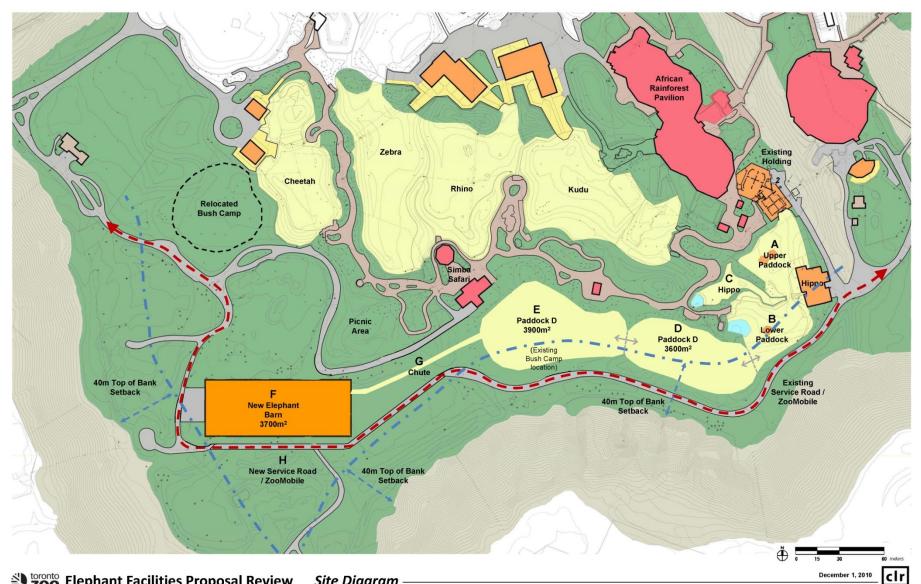
Capital Cost of Expansion Plan

If Toronto Zoo invested in developing an expansion plan for elephants:

- Largest winter/holding barn in North America (3,700 sq. m. compared to current 920 sq. m.), including large stalls for females and calves, natural substrate flooring and 1,100 sq. m. herd room for winter socializing
- Two new outdoor paddocks to increase outdoor space from current 3,360 sq. m. (0.8 acres) to 10,900 sq. m. (2.7 acres)

Capital cost estimate (2010 dollars) is \$16.5 million





Health and Well-Being of Elephants

Scientific/academic studies cited by various animal rights groups identify factors why elephants should not be held in zoos:

- Much shorter lifespans in zoos due to captivity-related illnesses and confinement, including:
 - Low fertility rates and reproduction problems, high rates of stillbirths, and being forced to breed too young
 - Psychological disorders including stereotypic behaviour (swaying due to stress), hyper-aggression
 - Obesity
 - Arthritis and foot infections from hard surfaces
- Elephants should not be in zoos with cold weather winters
- Elephants need far more space to roam than possible in zoos.

Elephants Lifespans

- AZA, CAZA and other scientists disagree with many studies as flawed, based on data from many years ago, on European and not North American zoos, and written by anti-zoo activists
- Re shorter lifespans in zoos, the Toronto Zoo disputes findings that the natural lifespan of elephants in the wild is 60 to 70 years: "There may be some documented cases of elephants living to their late 50s or even their sixties but these are exceptional cases and not the norm. People can live to a hundred but who would claim that's the norm."

Cold Weather and Roaming Space

- Zoos dispute validity of the cold climate issue and the importance of the amount of roaming space, citing periodic cold weather in the wild and successful breeding programs in cold weather zoos
- Zoos emphasize that the quality of enrichment, exercise and stimulation is just as important as the amount of roaming space
- Though the studies have been disputed, it is also true that standards keep changing and zoos have responded by providing substantially more indoor and outdoor space for elephants

IMLS Elephant Study

- Three-year, \$1.2 million study, funded two thirds by IMLS and one-third by AZA zoos with elephants
- Title: "Using Science to Understand Zoo Elephant Welfare"
- Objective to "understand the relationship between environmental variables and physical and mental health"
- Variables include enrichment, training, enclosure size, group size, physiological status, social behaviour, and keeper-animal relationships
- Comprehensive study of all 290 elephants at 78 AZA institutions today
- Conducted primarily by AZA personnel therefore not biased against zoos. To be completed at end of 2013.

Implications of IMLS Study for Toronto Zoo

- 3,700 sq. m. of indoor space compared to the current 920 seems great, but what if the IMLS study leads to changed standards regarding the size or features of indoor space?
- 10,900 sq. m. of outdoor space compared to the current 3,360 sq. m of outdoor space is a big improvement but is it enough to meet new standards that may emerge from the IMLS study?
- \$16.5 million in capital investment would be substantial but what if the IMLS studies requires changes to the facilities if built? That would mean money was wasted.
- Our review concludes that no investment should take place for elephants until completion of the IMLS Elephant Study



Other Zoos

- New Investment & Growth: Substantially more zoos invested/investing in larger facilities (Birmingham, Cleveland, Denver, Oklahoma City, Pittsburgh, Portland, Tucson, Washington DC)
- Temporary Phase Out: Others phased out but leaving options open for reintroducing elephants when financially able (Philadelphia, Brookfield and Lincoln Park in Chicago)



Other Zoos

- Phased Out: Some zoos (Detroit, San Francisco, Jackson MS) phased out and have no plans to re-introduce them.
 Reasons are primarily financial and space related and not "ethical"
- Waiting for IMLS Results: Many zoos are waiting for recommendations from IMLS Elephant Study due in 2013



Other Important Factors

 Staffing and Other Operating Costs: Elephants are the single most expensive animal to care for and feed

Impact of Elephants on Attendance:

- Elephants very popular
- Zoos that discontinued elephants had no negative impact on attendance, value of experience, membership or other earned income
- negative impact would likely be short term



Other Important Factors

- Opportunity Costs: Toronto Zoo Master Plan calls for about \$200 million in capital development over the next 10-15 years. etc. There are lots of priorities in addition to elephants.
- Government Financial Support and Private Fundraising:
 - Uncertainty regarding availability of government and private funding, and difficult to fundraise without elephants for a new exhibit
 - Supports waiting until after completion of the IMLS Study



Recommendations: Future Elephant Program

- Wait for results of IMLS elephant study in late 2013 before finalizing plans or initiating fundraising for larger, enhanced facilities for elephants and to better understand availability of elephants
- Proceed with fundraising for other capital priorities of Toronto Zoo
- If analysis of IMLS Elephant Study leads to decision to proceed, add elephant program to menu of fundraising opportunities for potential private sector support



Recommendations: Existing Elephants

- Relocate all three remaining elephants while still healthy to an AZA accredited institution with better quality facilities than currently available at Toronto Zoo
- Allows for control of when and how the elephants can be relocated while healthy
- Allows for adaptive reuse of existing facilities for another species and for operating resources to be redirected until if and when better facilities for elephants are developed at the Toronto Zoo
- This is best for the elephants

