

**Final Report  
Of The Visiting Committee  
To The Accreditation Commission**

**LOUISVILLE ZOOLOGICAL GARDEN**  
*Louisville, Kentucky*

**UNDER REVIEW FOR ACCREDITATION**

**Date(s) Visited: December 5 - 7, 2007**  
**Final Review & Hearing on: March 5, 2008**

**ACCREDITATION COMMISSION PRIMARY REVIEWER**  
Robyn Barbiers, DVM, Vice President of Collections, Lincoln Park Zoo, Chicago, IL

**VISITING COMMITTEE INSPECTORS**  
*signatures on file*

**TEAM CHAIR**

**Operations Inspector:** Charles Wikenhauser, Director, Milwaukee County Zoological Gardens, WI

**Husbandry/Animal Mgt. Inspector:** John Lehnhardt, Animal Operations Director, Disney's Animal Kingdom, Bay Lake, FL

**Veterinarian:** Mike Barrie, DVM, Director of Animal Health, Columbus Zoo and Aquarium, Powell, OH

**This Visiting Committee recommends that the next team allow at least 3 day(s) to inspect this institution.**

**NOTE:** This is an official document of the Association of Zoos & Aquariums and becomes an intrinsic part of the institution's accreditation processing. The accreditation program is conducted in confidence; only the Accreditation Commission, related AZA staff, Director/CEO of the applicant institution, and Chair of the institution's governing authority shall be provided copies by AZA.

## VISITING COMMITTEE REPORT 2007 EDITION

### 1. STRUCTURED QUESTIONNAIRE SECTION:

**A/Q/U NOTATIONS:** All questions are answered with "Yes", "No", or "N/A". Except for questions answered "N/A", all questions will also indicate either "A", "Q", or "U" (Acceptable, Questionable, or Unacceptable), in the far right-hand column. If "Q" or "U", a brief explanation of why this is so should be included in the "Comments" area at the end of that section, and again *in greater detail* in the Narrative section of this report.

**A** - Acceptable (Normal within the profession and requires no immediate action.)

**Q** - Questionable (Should be improved or corrected as soon as possible, but is not a critical matter.)

**U** - Unacceptable (Must be corrected immediately, does not meet professional standards, may be unsafe or detrimental to the institution, its staff, its collection, or its visitors.)

### **KEY TO NOTATIONS APPEARING WITH QUESTIONS:**

< A >: When the notation "< A >" appears following a question it indicates that the question could be answered by reviewing the materials submitted by the facility.

< A + >: When the notation "< A + >" appears following a question it indicates that the question could be answered by reviewing the materials submitted by the facility in conjunction with additional investigation during the actual inspection.

No Notation: Questions without an < A > or < A + > could *only* be answered by questioning appropriate personnel, obtaining additional documentation, and/or by observances made during the actual inspection.

**Appearing On Institution Questionnaire Only:** The Visiting Committee Report Form is numbered to sequentially correspond with the institution's questionnaire/application. Often consecutive questions appearing in the questionnaire/application relate to the same basic issue. When this happens redundant or similar questions are deliberately left out of the Visiting Committee Report Form. The "Appearing On Institution Questionnaire Only" notation is provided to avoid the impression that questions in a sequence are erroneously missing from this report form.

**2. VISITING COMMITTEE'S LIST OF CONCERNS & POINTS OF ACHIEVEMENT:** The list of concerns and points of particular achievement noted by the team during the inspection are included at the end of this document. *This list was presented to the institution's Director during the exit interview.*

**3. NARRATIVE SECTION:** The narrative section of this report follows the List of Concerns. It contains details of items appearing in this report and on the List of Concerns.

**PREAMBLE TO THE ACCREDITATION STANDARDS**

*Zoos and aquariums accredited by the Association of Zoos & Aquariums (AZA) are continuously evolving. Standards are constantly being raised, ensuring that animals in AZA institutions are receiving the best possible care from highly qualified staff, in modern facilities that represent the state-of-the art in our industry. 21st century AZA accredited institutions and certified related facilities are expected to be leaders in the field and to embrace the highest quality facilities, programs, and staff available. Animals must be well cared for and displayed in naturalistic settings that provide an educational experience for visitors and an appropriate enriching environment for the animals, including proper social groupings. The species included in the collection must be managed on a regional basis to ensure long-term genetic viability of the species, which means careful planning of resource allocation, ex-situ breeding, and ex-situ/in-situ conservation and research.*

*The phrase "modern zoological practices and philosophies" refers to practices and philosophies that are commonly accepted as the norm by the industry. The word "practices" represents the tangible while "philosophies" refers to an overall perspective. AZA accredited institutions and certified related facilities must be incorporating modern zoological practices and philosophies as basic tenets.*

**GENERAL INFORMATION (GI)**

YES NO N/A A/Q/U

GI-1 to GI-4. *Appearing on Institution Questionnaire only.*

- |       |   |                                     |                                     |                          |          |
|-------|---|-------------------------------------|-------------------------------------|--------------------------|----------|
| GI-5. | Does the historical record of the institution reflect an accurate record of continued progressive growth? < A > | <input checked="" type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/> | <u>A</u> |
| GI-6. | Does the institution appear to meet its stated purposes? < A + >  | <input checked="" type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/> | <u>A</u> |
| GI-7. | Is the institution approved by USDA for importing/ holding ruminants (PPEQ)?                                    | <input type="checkbox"/>            | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <u>A</u> |
| GI-8. | <i>Appearing on Institution Questionnaire only.</i>   |                                     |                                     |                          |          |

COMMENTS: GI-5: The LZ has progressively grown with quality exhibits and programs.

**ANIMAL COLLECTION (AC)**

YES NO N/A A/Q/U

- |       |   |                                     |                          |                          |          |
|-------|---|-------------------------------------|--------------------------|--------------------------|----------|
| AC-1. | Does the institution's Institutional Collection Plan (ICP) conform to the institution's mission and vision? < A >   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <u>A</u> |
| AC-2. | Does the institution's ICP incorporate the suggested elements outlined in AZA's Accreditation Standards? < A + >    | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <u>A</u> |
| AC-3. | <i>Appearing on Institution Questionnaire only.</i>   |                                     |                          |                          |          |
| AC-4. | Is the ratio of males to females in the animal collection appropriate for the individuals being maintained? < A + > | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <u>A</u> |
| AC-5. | Does the animal collection fulfill the stated objectives of the institution?  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <u>A</u> |
| AC-6. | Are all endangered, CITES I, SSP®, and studbook species maintained by the facility registered with ISIS? < A >      | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <u>A</u> |
| AC-7. | Is the animal cataloging system adequate? < A + >   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <u>A</u> |
| AC-8. | Does the animal marking system meet the needs of the collection? < A + >  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <u>A</u> |

	YES	NO	N/A	A/Q/U
AC-9. Are animal records duplicated? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-10. Are the collection's records protected from fire, flooding, and other natural hazards? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-11. Are duplicate records stored in an appropriate separate location? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-12. Is an individual designated as being responsible for the institution's animal record-keeping system?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-13. Are records kept current with up-to-date information?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-14. Is the institution's animal acquisition/disposition policy in accordance with relevant legislation, AZA's A&D Policy, and AZA's conservation policies? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-15. Does the management of the collection appear to conform with the stated acquisition/disposition policy?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-16. Is there an adequate system for the preservation of important data on acquisitions/dispositions?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-17. If the facility maintains elephants, is it in compliance with AZA's Guidelines for Elephant Management and Care (see pages 23-32 of the 2007 "Accreditation Standards and Related Policies" booklet)? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-18. Do the institution's elephant management protocols meet the requirements as outlined in AZA's Standards For Elephant Management and Care? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-19. Does the facility have an elephant restraining device? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a. If "no", are the facility's alternative methods acceptable in terms of meeting AZA standards of veterinary care and examination, method of restraint, and the ability to safely manage dominance and aggression, or the introduction of a new animal? < A >	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	_____
AC-20. Does the institution have protocols for training new staff in the elephant management program? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-21. Do elephant behavior profiles appear to be acceptable? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-22. Does the institution have a designated, qualified elephant manager? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-23. Has the institution adequately addressed the concerns/deficiencies noted on the USDA Inspection of Animal Facilities, Sites or Premises (VS form 18-8) report forms (or the equivalent for those not inspected by USDA)? Please provide details in the comment section on this form and, if necessary, in your narrative report. < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-24. Do formal animal training programs provide for the overall health and psychological well-being of the animals participating? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
AC-25. Are "touch pools" integrated into displays adequately managed for the protection of the animals involved? < A + >	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	A
AC-26. Does the institution use animals for education purposes on site (animals that are used outside their normal exhibit or holding areas or are intended to have regular, physical contact with the public within their normal exhibits, e.g., contact area with domestic animals, browse feeding programs with giraffes, lorikeet feeding, etc.)? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A

	<u>YES</u>	<u>NO</u>	<u>N/A</u>	<u>A/Q/U</u>
a. If "yes", please respond to the following: < A + >				
1. Are the species utilized appropriate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
2. Are both the animals and public provided adequate protection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
3. Does the institution make certain that the way in which animals are handled causes no undue stress for the animals?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
4. Are isolation/quarantine facilities adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
5. Are animals kept separate from the rest of the collection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
6. Are animals used being rotated sufficiently?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
AC-27. Does the institution utilize wildlife in off-premises situations (i.e., shopping malls, sporting/events, school programs, theatrical productions, etc.)? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a. If "yes", please respond to the following: < A + >				
1. Are the species utilized appropriate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
2. Are both the animals and public provided adequate protection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
3. Does the institution make certain that the off-premises programs cause no undue stress for the animals?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
4. Is sufficient transportation and care provided when animals are off the premises?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
5. Are isolation/quarantine facilities adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
6. Are animals kept separate from the collection, especially following an appearance off institution grounds?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
7. Are life support systems, designed for aquatic animals shown off-site, adequate?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	_____
8. Are animals used being rotated sufficiently?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
AC-28. Does the institution use animals for photo opportunities with the public? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a. If "yes", please respond to the following: < A + >				
1. Are the species utilized appropriate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
2. Are both the animals and public provided adequate protection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
3. Does the institution make certain that the way in which animals are handled causes no undue stress for the animals?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
4. Are isolation/quarantine facilities adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
5. Are animals kept separate from the rest of the collection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
6. Are animals used being rotated sufficiently?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
7. Are animals being taken off site for photo opportunities?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	A

	YES	NO	N/A	A/O/U
AC-29. Does the water quality methods and controls program appear to be adequate for the aquatic exhibits? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-30. Is the animal collection protected from weather detrimental to their health?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-31. Does it appear that the animals' sociobiological needs are being met?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-32. Are the animal enclosures clean and well maintained?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-33. Does the institution's pest control program appear adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-34. Are enclosure substrates, design features, and "furniture" sufficient to provide shelter for, and meet the behavioral needs of, all specimens displayed, especially those kept in multi-species exhibits?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-35. Does the institution allow the public to feed the animal collection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-36. Is the animal collection identified for the public?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-37. Are endangered species appropriately identified as such?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-38. Does the institution utilize AZA SSP®, vanishing animal, endangered species, and other appropriate logos on all exhibits containing animals with special designations?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	A
AC-39. Does the institution have a written animal enrichment program that incorporates the elements outlined in AZA's Accreditation Standards? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
a. If yes, has a specific staff member or committee been assigned program oversight? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
AC-40. Are there sufficient resources and staff available to implement the animal enrichment program? < A+ >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a. Is there adequate involvement by all departments?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
b. Is enrichment being provided on a regular basis?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
AC-41. Does management carefully scrutinize the origins of collected aquatic animals to minimize environmental damage caused by unacceptable collection techniques (e.g., cyanide collection, etc.)? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-42. Does the institution have current and complete copies of all applicable local, state, federal and/or international permits to collect the animals purchased (including aquatic animals) from all commercial animal collectors utilized? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-43. Does the institution take appropriate measures to ensure the safety of animals during transport? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
AC-44. Does the institution permit hunting of captive wildlife? < A + >	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	A
AC-45. Does the institution utilize auctions, the pet industry, or hunting ranches for the disposal of captive wildlife? < A + >	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	A

COMMENTS: AC-4: Some unbalanced sexual ratios are the result of SSP recommendations. AC-13: The registrar is very efficient & competent. AC-17: Protocol is extremely detailed and elephants are maintained in a well-managed, structured program. AC-23: No deficiencies on the most recent inspection. AC-24: The training program is inconsistent. See narrative. AC-26a3 & AC-27a3: Policy should insure that staff(not volunteers) monitors animal stress levels.AC-26a6 & AC-27a8: Formal standards need to be developed. AC-31: The polar bear is alone and is exhibiting stereotypic behavior. AC-35: There are controlled feeding opportunities at giraffe exhibit. AC-36: Older primate & giraffe signage is in need of replacement & exhibit

labels on reptile exhibits are small and difficult to read. AC-38: Signage includes information on the state of animals in the wild, but not necessarily through the use of the listed logos. AC-39: LZ needs to formalize reporting and oversight. AC-40a & b: There is no current accountability for documentation of activities. AC-40: See comments for AC-39.

VETERINARY CARE (VC)		YES	NO	N/A	A/Q/U
VC-1.	Is there a full-time veterinarian? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a.	If not, indicate the frequency of visits made by the part-time or consulting veterinarian: _____				
VC-2.	In the event of an emergency, when the veterinarian is not on the premises, is the response time adequate? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-3.	Does the institution utilize Carfentanil, M99, M50-50, or other controlled animal drugs? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a.	If yes, are there appropriate protocols established for the use of such animal drugs (i.e., procedures established in the event the veterinarian is not present to administer the drugs)?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
b.	Are the animal drugs stored in a Class 5 or other DEA-approved safe?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-4.	Are protocols for the use of capture equipment being followed? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a.	Is the staff properly trained in the use of capture equipment?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-5.	If chemical capture equipment is used, are established protocols being followed, staff adequately trained, and equipment stored properly? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a.	Are there a sufficient number of staff members trained in the use of chemical capture equipment?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-6.	Is there a program for regular disposal (or removal and separate storage) of outdated animal drugs?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-7.	Is the institution's preventative medicine program adequate and implemented; i.e., TB tests and appropriate vaccinations annually, etc.? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-8.	Does the veterinary care provided the animal collection appear sufficient?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-9.	Does the animal collection appear to be in good health?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-10.	<i>Appearing on Institution Questionnaire only.</i>				
VC-11.	Does the institution normally perform necropsies? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-12.	Are deceased animals disposed of properly?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-13.	Are deceased animals stored away from food?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-14.	Are necropsy results reviewed periodically and subjected to analysis to determine health trends and long-term problems with the collection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-15.	Does the institution maintain up-to-date records on the health of the collection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
VC-16.	Does the institution comply with the FDA requirements for the use of drugs with fishes and in public aquariums? < A + >	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	_____



COMMENTS: C-3: LZ recycles bottles, cans, & other metals, sends manure for composting, has closed water systems on newer exhibit complexes. C-5: LZ has begun dedicating \$.15 from each admission for conservation projects. C-7: The LZ should consider a greater commitment to elephant conservation.

**EDUCATION AND INTERPRETATION (EI)**

	YES	NO	N/A	A/Q/U
EI-1. Is the education department under the direction of a paid professional trained in education programming? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
EI-2. <i>Appearing on Institution Questionnaire only.</i>				
EI-3. Are the institution's educational programs clearly tied to AZA conservation messages? < A+ >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a. If "yes", do the institution's education programs address local <i>and</i> global conservation issues, and the role of zoos/aquariums in conservation?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
b. Do the institution's conservation and education messages relate to it's overall mission?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
EI-4. <i>Appearing on Institution Questionnaire only.</i>				
EI-5. Does the institution have a written education plan for the education program? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a. If "yes", does this plan address the goals and objectives of the department? < A+ >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
EI-6. Do the institution's educational programs meet the needs of its visitors? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a. If "yes", has the institution adequately assessed the needs of under-represented groups and visitors with special needs? < A+ >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
EI-7. Does the facility have educationally focused partnerships with local/national groups, (universities/colleges, nature centers, conservation organizations, museums, governmental agencies, etc.) and are the arrangements/agreements appropriate? < A+ >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
EI-8. Are the education programs evaluated regularly and effectively (including assessment of impact as well as satisfaction)? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
EI-9. Is the animal collection identified and interpreted for the public?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a. If "yes", are exhibit labels and other graphics legible and in good condition?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
b. If interactive exhibits are used, are they in working order?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
c. If docents/volunteers or staff are utilized in interpretive programs, do they appear to be well-trained in both content and interpretive abilities?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
d. Are the institution's messages clearly conveyed by the interpretation?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
e. Does the institution address conservation issues in their interpretation (e.g., referencing related <i>in situ</i> conservation efforts for select species, utilizing AZA SSP logos, etc., as appropriate to the institution's conservation messages)?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
EI-10. Is the volunteer/docent program adequate for the needs of the institution?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
EI-11. <i>Appearing on Institution Questionnaire only.</i>				

EI-12. Do staff members have an adequate and accessible library available? < A+ >

COMMENTS: EI-5: The LZ has a comprehensive education plan. E-6a: The "School in the Zoo" program has been particularly successful with under served and at risk students. E-7: As the only accredited zoo in Kentucky, the LZ is involved with several organizations & institutions. EI-9a: Signage in the older primate & giraffe exhibits is poor. Many exhibit labels on the reptile exhibits are very small and difficult to read. Newer exhibit labels & graphics & way-finding signage reflect present day standards & quality. E-12: The LZ has no formal or professionally managed library.

**RESEARCH (R)**

YES NO N/A A/Q/U

R-1. *Appearing on Institution Questionnaire only.*

R-2. Is the institution's participation in research programs in line with similar-sized institutions? < A >    A

R-3. Are research philosophies and activities consistent with the overall goals and objectives of the institution?    A

R-4/R-5/R-6. *Appearing on Institution Questionnaire only.*

R-7. Does the institution have a means of screening, evaluating, and monitoring research projects? < A >    A

COMMENTS: R-2: The LZ list four projects in 2007.

**GOVERNING AUTHORITY (GA)**

YES NO N/A A/Q/U

GA-1. Is the institution operated or directly maintained by a parent institution, society, business, organization, or agency?    A

GA-2 to GA-5. *Appearing on Institution Questionnaire only.*

GA-6. Are the lines of communication between the director and governing authority clearly defined? < A + >    A

GA-7. *Appearing on Institution Questionnaire only.*

GA-8. Does the governing authority recognize the chief executive officer as the sole official liaison between itself and the staff?    A

GA-9. Does the governing authority recognize the right of the chief executive officer to originate all staff appointments, promotions, and terminations?    A

GA-10. Does the governing authority recognize that the chief executive officer's responsibilities are to the entire governing authority, not to its individual members?    A

GA-11. Is the chief executive officer a member of all committees appointed by the governing authority for the operation of the institution?    A

GA-12. Do the terms of service for those on the governing authority overlap to provide continuity? < A + >    A

COMMENTS: GA-1: The LZ is owned and operated by the Louisville-Jefferson County Metro Government. See narrative. GA-9: The assistant director is officially appointed by the Mayor after recommendation by the zoo director. GA-11: The zoo director is an adhoc member of the Foundation Board.

STAFF (S)		YES	NO	N/A	A/Q/U
S-1.	Do the salaries of the staff appear to be within acceptable limits? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
S-2.	Are current job descriptions on file? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
	a. Have job descriptions been distributed to staff?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-3.	Do staff members have a clear understanding of their jobs?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-4.	Do the chief executive officer and staff members have training and/or experience which makes them capable of decisions consonant with the experience of their peers? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-5.	Does the organization of staff authority lines appear to cause any problems? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-6.	Are staff members provided an opportunity to discuss work-related problems and possible solutions?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-7.	Is there a good working relationship between management and staff?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-8.	Is there a good working relationship between the zoo/aquarium staff and the governing authority?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-9.	Is staff provided an opportunity and encouraged to seek continuing education? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-10.	Is the training provided for the staff and docents/volunteers adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
	a. Are staff members offered training to qualify them for management positions?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-11.	Do the chief executive officer and staff members have access to and knowledge of the literature in the zoological or aquarium field?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-12.	Is the level of staff involvement in AZA activities and other professional organizations in line with that of similar-sized institutions? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-13.	Is there sufficient staff to properly care for the collection and to conduct the institution's programs?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
S-14.	Do staff members appear to have adequate knowledge of the AZA Accreditation Standards and the accreditation process? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A

COMMENTS: S-1: Veterinarian salaries are low given the required level of professional training, skills, & experience. S-3: Management should provide clearer direction & support for the supervisor of training and supervisor of enrichment programs. S-9: Reimbursement for tuition & books is offered. S-10: Supervisory training is not available at the keeper level.

**SUPPORT ORGANIZATION (SO)** (If not applicable, please mark N/A and move to next section.)  N/A

YES NO N/A A/Q/U

SO-1 to SO-4. *Appearing on Institution Questionnaire only.*

- |        |  |                                     |                          |                          |                            |
|--------|--|-------------------------------------|--------------------------|--------------------------|----------------------------|
| SO-5.  | Are the bylaws of the support organization adequate? < A >   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| SO-6.  | Do the stated purposes of the support organization meet the needs of the institution?<br>< A + >                               | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| SO-7.  | Are the purposes being furthered?  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| SO-8.  | Is the relationship of the support organization to the institution mutually agreed upon and observed? < A + >                  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| SO-9.  | Does the support organization exercise unwarranted influence on the institution, its officers, or staff?                       | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| SO-10. | <i>Appearing on Institution Questionnaire only.</i>  |                                     |                          |                          |                            |
| SO-11. | Does the support organization raise funds for the institution? < A + >   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| SO-12. | Does the support organization participate in the decision-making process on how the funds are utilized?                        | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| SO-13. | Are activities sponsored by the support organization appropriate and meeting the goals of both it and the institution? < A + > | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |

COMMENTS: SO-6: The organization holds special events for the purpose of raising funds for the LZ. It has no involvement with the membership program. SO-12: Options are provided by the LZ.

**FINANCE (F)**

YES NO N/A A/Q/U

F-1/F-2. *Appearing on Institution Questionnaire only.*

- |       |   |                                     |                          |                          |                            |
|-------|---|-------------------------------------|--------------------------|--------------------------|----------------------------|
| F-3.  | Does the institution have continuing financial support? < A >   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| F-4.  | Is the total financial support adequate to meet the needs of the institution?   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| F-5.  | Is financial support the recognized responsibility of the governing authority? < A >  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| F-6.  | In the event of financial difficulties, has a plan of action been prepared? < A >   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| F-7.  | Does the insurance protection appear to be adequate for visitors, governing authority, staff, society, docents/volunteers, collection, and physical facilities? < A + > | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| F-8.  | Are sufficient amounts allocated for capital improvements? < A >  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| F-9.  | Is there a separate budget for capital improvements? < A >  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |
| F-10. | <i>Appearing on Institution Questionnaire only.</i>   |                                     |                          |                          |                            |
| F-11. | Are sufficient amounts allocated for conferences, continuing education, maintenance, supplies, training/seminars, etc.? < A >   | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> A |

COMMENTS: F-5: The Metro Government provides about 22% of the LZ's operating funds. F-6: The Metro Government would be responsible for any significant shortfall. F-7: Metro Government is self-insured. F-11: LZ should consider additional support for front line staff.

**PHYSICAL FACILITIES (PF)**

	YES	NO	N/A	A/Q/U
PF-1/PF-2. <i>Appearing on Institution Questionnaire only.</i>				
PF-3. Are veterinary facilities adequate to meet the needs of the collections, including quarantine, isolation, surgery, and holding facilities?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
PF-4. Is there a regular program of both building and mechanical maintenance? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
PF-5. If off-premises facilities are operated, did the team visit the site?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	N/A
a. Are the conditions at the off-site facility acceptable?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	N/A
b. Does the institution appear to be meeting the same criteria at the off-site facility as at the institution?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	N/A
PF-6. Is the institution readily accessible to visitors?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
PF-7. Is heating adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-8. Is lighting adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-9. Is plumbing adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-10. Is the method for disposal of sewage adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-11. Is the method for disposal of toxic/hazardous materials adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-12. Are there adequate provisions for the proper storage and disposal of garbage and animal waste?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-13. Are the buildings in good repair?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-14. Are plantings well-maintained and used to the best advantage in animal exhibits and throughout the facilities?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-15. Do the animal enclosures provide for the physical, social, and psychological well-being of the specimens displayed throughout the year?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-16. Do aquatic exhibits provide sufficient space or sufficient volume of water for the physical and psychological well-being of the inhabitants?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
PF-17. Are the aquatic water circulation and life support systems adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A

COMMENTS: PF-3: The animal hospital should be improved & expanded. PF-4: The preventive maintenance schedule & program should be formalized. PF-6: Several doors on older exhibit buildings can be difficult to open for people with disabilities. The new play ground appears to have no apparatus available to children with disabilities. PF-10: The LZ has three separate sewer systems-sanitary, storm and contaminated storm. There is a settlement system for the latter. PF-13: The appearance of some of the older buildings needs refreshing. PF-14: The LZ is an accredited botanical garden.

**SAFETY/SECURITY (SS)**

	<u>YES</u>	<u>NO</u>	<u>N/A</u>	<u>A/O/U</u>
SS-1. Is first-aid readily available to the staff and the public? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-2. Is the staff adequately trained in first-aid? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-3. Is the staff adequately trained in CPR? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-4/SS-5. <i>Appearing on Institution Questionnaire only.</i>				
SS-6. Is the Risk Management or Safety Audit Plan adequate? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-7. <i>Appearing on Institution Questionnaire only.</i>				
SS-8. Do employees have access to and knowledge of Material Safety Data Sheets? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-9. Are the alarm systems and emergency procedures adequate in the event of an attack or injury by a large or venomous animal? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-10. Is the written procedure adequate in the event of an animal escape? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-11. Is the written procedure adequate in the event of an emergency, including natural disasters? < A >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-12. Are staff members trained for emergency situations? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-13. Are emergency drills conducted regularly? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-14. Are fire extinguishers and alarms readily available? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-15. Is the staff sufficiently trained in the use of fire extinguishers? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-16. Are employees adequately trained to deal with HazMat and bio-toxic disposal? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-17. Is the communication system quickly accessed in the event of an emergency?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Q
SS-18. If employees are working within the vicinity of ozone generation or hypochlorite (chlorine) systems, are they properly trained to handle emergency conditions involving release of these chemicals? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-19. Are there enough alarms or indicators in the event of environmental and life-support system failures? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-20. Are staff members/volunteers who handle animals adequately trained regarding common zoonosis? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-21/22. Do OSHA-mandated confined space entry and lock out/lock in procedures appear to be followed? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-23. Is ground fault interrupt electrical service supplied to wet environments and aquatic exhibits? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-24. Is the dive safety program adequate for this institution? < A + >	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	_____
a. Does the institution comply with commercial diving safety standards established By the Occupational Safety and Health Administration?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	_____
b. Does the institution claim the exemption from commercial diving standards for "scientific diving" and have an appropriate diving control board and diving safety manual?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	_____

	YES	NO	N/A	A/O/U
SS-25. Is service from fire and police departments, as well as ambulance services readily available?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-26. Are there adequate procedures for exhibit servicing without causing danger to the staff?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-27. Are service areas sufficiently protected from visitor access?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-28. Are there adequate facilities for crating and transporting animals?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-29. Are all exits clearly marked?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-30. Do all exits open outward?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-31. Are all exits equipped with panic hardware?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-32. Is the animal collection protected from natural and human hazard, including cover and escape areas?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-33. Is the public protected from the animal collection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-34. Is protection for the collection and grounds provided 24 hours a day? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-35. If 24-hour security personnel are not provided, does the institution have adequate protection during the hours when security personnel are not present? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-36. Is the security program providing sufficient protection? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-37. Do the institution's security personnel utilize firearms? < A + >	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	A
SS-38. Are firearms kept in a secured area? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a/b. <i>Appearing on Institution Questionnaire only.</i>				
c. Is the staff adequately trained in the use of firearms?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
SS-39/SS-40. <i>Appearing on Institution Questionnaire only.</i>				
SS-41. Is the perimeter fence independent of all animal enclosures? < A + >	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A

COMMENTS: In general, written emergency and safety policies & programs are very comprehensive. SS-17: The animal department should have a separate radio channel from the rest of zoo operations. Additional spare radios are recommended to compensate for those out for repair. SS-31: Where necessary.

GUEST SERVICES (GS)	YES	NO	N/A	A/O/U
GS-1. Are there adequate parking spaces for visitors, staff, and volunteers?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-2. Does the institution have amusement rides/playground areas near or on the institution grounds?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
a. If "yes", are they located a sufficient distance from animal exhibits?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-3. Does the institution have animal rides?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	A
If "yes":				
a. Is the institution's animal ride policy adequate?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	_____

b.	Are the animals rotated or replaced regularly?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	_____
c.	Are adequate safety precautions in place to protect visitors, staff, and the animals?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	_____
GS-4.	Is the number of public food service facilities adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-5.	Is the selection and quality of food items adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-6.	Is the number and location of refreshment stands adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-7.	Is the number and location of drinking fountains adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-8.	Are drinking fountains clean and operating properly?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-9.	Are gift facilities adequate and reflective of the institution's mission?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-10.	Is there adequate public transportation to the institution?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-11.	Is the number and location of restrooms adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-12.	Are the restrooms maintained in a sanitary condition?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-13.	Are the restrooms wheelchair accessible?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-14.	Is the gate handout/map adequate to guide guests through the institution?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-15.	Are directional signs and maps adequate in number, location, and clarity to guide guests through the institution?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-16.	Is guest transportation on institution grounds available and adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-17.	Is the number and location of benches and rest areas adequate?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-18.	Are there adequate, well-maintained strollers and wheelchairs available to guests?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-19.	Are staff members/volunteers welcoming and friendly towards guests?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-20.	Are the grounds neat and clean?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-21.	Are the sidewalks and roadways in good repair?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-22.	Is the general impression given by the exhibits positive and acceptable?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-23.	Are the exhibits arranged to demonstrate an education theme?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A
GS-24.	Are the exhibits presented in a scientific and aesthetic manner?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	A

COMMENTS: GS-2: Carousel, train, & tram GS-13: Some restroom doors are difficult for people with disabilities to open.

**OTHER PROGRAMS/ACTIVITIES (OP)**

OP-1. *Appearing on Institution Questionnaire only.*

OP-2. Are the brochures, reports, newsletters, and other publications produced by the facility appropriate and adequate? < A + >

YES   NO   N/A   A/O/U

        A

- OP-3. Is the facility reasonably following the goals included in the master plan? < A + >                  A
- OP-4. If the facility has a strategic plan, are the goals being evaluated and met? < A + >                  A

COMMENTS: The strategic plan is comprehensive and being followed by LZ Administration and Foundation Board.

**MISCELLANEOUS (M)**

YES    NO    N/A    A/Q/U

M-1/M-2/M-3. *Appearing on Institution Questionnaire only*

- M-4. Has any member of the institution's staff ever been found guilty of violating wildlife regulations enacted by any of the various states of any agency of the U.S. Government or those of a foreign country? < A + >                  A

- M-5. Is any member of the institution's staff currently under investigation for alleged violation of any wildlife regulations enacted by any of the various states or any agency of the U.S. Government or those of any foreign country? < A + >                  A

COMMENTS: \_\_\_\_\_

Rev: 10-06

**SEE NEXT PAGE FOR VISITING COMMITTEE'S LIST OF CONCERNS  
AND POINTS OF PARTICULAR ACHIEVEMENT**

## List of Concerns/Achievements

### PART I:

#### Items of Concern Noted by Visiting Committee

**INSTITUTION DIRECTOR:** •IMPORTANT• The items listed below were of noted concern during the inspection. Please address as many of these concerns as possible prior to the Commission's meeting. •Status reports and estimated completion schedules are expected for items that cannot be finished by the time of the hearing. It is possible that, after reviewing all supporting materials (including the Visiting Committee's written report), the Commission may have issues or concerns to be addressed during the meeting *that are not included below*. [NOTE: •all items must be addressed, regardless of whether they are designated as "Major" or "Lesser".]

A written report to the Commission on how you are responding to these concerns must be submitted by the established deadline (check with the Director, Accreditation Programs if uncertain of date). The written report is for informational purposes only. At the hearing, the Commission will ask for a verbal update on additional progress made *after* the written report was submitted. The Commission cannot accept written reports during the hearing as they do not have time to read them.

#### MAJOR CONCERNS

The veterinary staff is highly skilled and provides quality medical care to the collection. The hospital facility, however, is lacking. There is limited capacity to house animals under medical care and quarters are cramped for routine medical and diagnostic procedures. In addition to increasing holding space, the hospital building should be renovated to provide for a more functional treatment room and a room designated for radiology.

The visiting committee is concerned about the general welfare and stereotypical behavior of the single polar bear and recommends that the bear's medical condition and weight be assessed and that the stereotypical behavior be studied to determine its frequency and potential contributing factors.

The visiting committee recommends that animal department radio communications be placed on a second zoo-wide channel and that the number of radios available to animal staff be assessed.

#### LESSER CONCERNS

The salaries of the veterinary staff are low given the required level of professional training, skills, & experience and should be reviewed.

Several facilities, including the new playground at Glacier Run, within the LZ pose accessibility issues for people with disabilities. The LZ should have an ADA accessibility survey done to assess the need for improvements.

The application of animal training programs is inconsistent. The visiting committee recommends that behavioral management training becomes a mandatory training component for all animal staff.

The visiting committee recommends a review of the enrichment coordinator's role and the accountability of the supervisors' implementation of the enrichment program.

A review of the frequency of use of program animals should be conducted and the establishment of an appropriate frequency of use standard for each animal should be established.

**PART II:**  
**Points of Particular Achievement Noted by Visiting Committee**

**INSTITUTION DIRECTOR:** During the inspection the Visiting Committee was particularly impressed with the items listed below.

The LZ enjoys significant support from the Metro Government Mayor and Chairman of the Board of the Louisville Zoo Foundation.

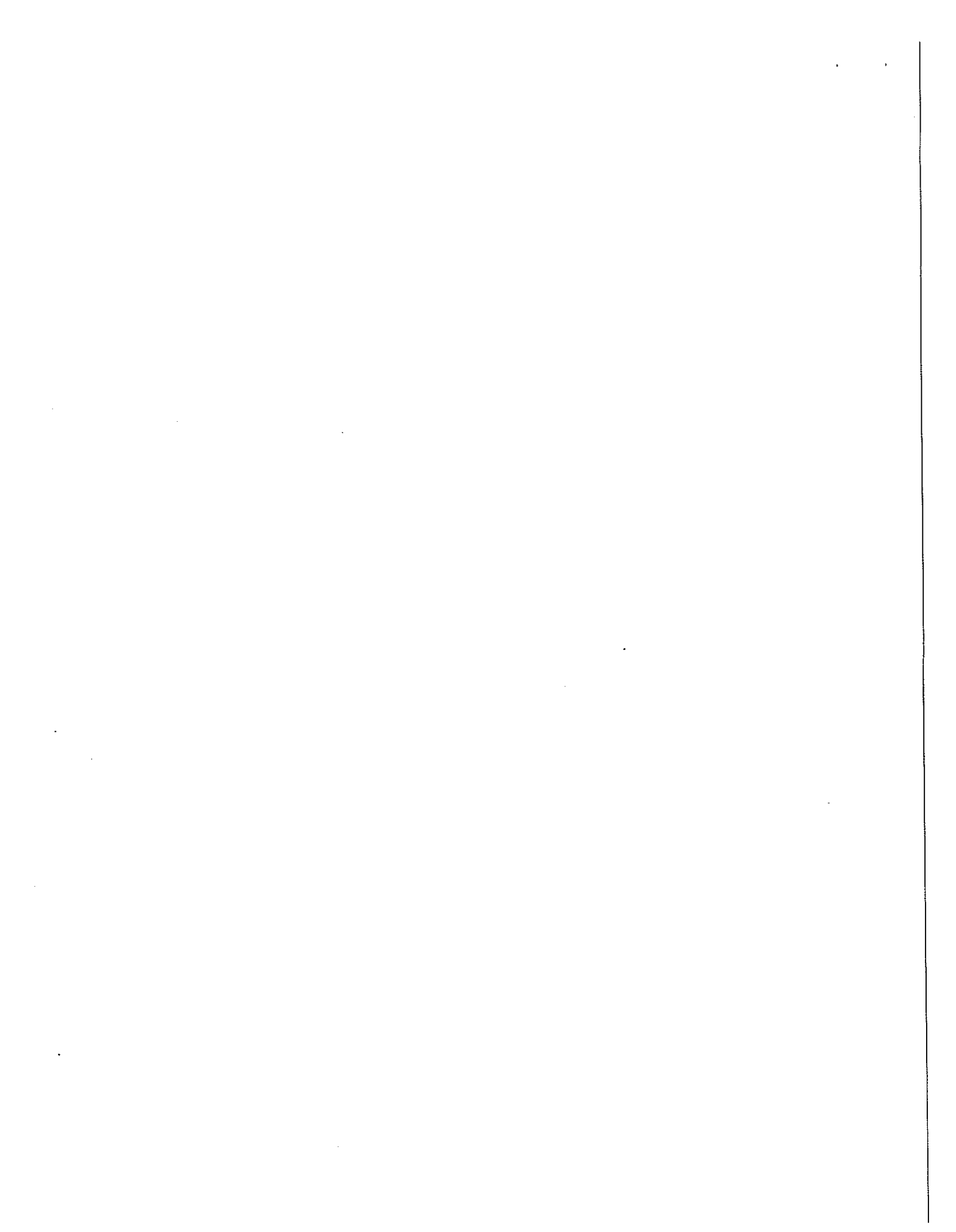
Amongst staff, morale is high and there a real sense purpose and pride in working at the LZ.

The animal records are in excellent condition and the registrar is very competent efficient.

The LZ has a comprehensive strategic plan and there is a true commitment to see it succeed by the LZ Foundation Board.

There solid elephant management program, renovation of the facility, and the successful birth of the baby indicates the institution's dedication to the SSP program.

The exhibit and animal management principals of the Islands exhibit complex remain inovative and progressive and enhance the complexity of expeiences of the animals in those areas.



**Louisville Zoological Garden  
AZA Accreditation Inspection Narrative Report  
5-7 December 2007**

On 5-7 December 2007 the Accreditation Visiting Committee (VC) of Charles Wikenhauser, Chairman; John Lehnhardt; and Michael Barrie, DVM inspected the Louisville Zoo (LZ) on behalf of the AZA Accreditation Commission. The LZ was cooperative and forthright with all requests for information.

The VC reviewed the concerns of the previous inspection and found that all issues have been satisfactorily addressed. Although, the VC did have some concerns in the area of capital improvements in the veterinary hospital, these concerns are not the same as those noted during the previous inspection. Said concerns are addressed later in the narrative report.

Below you will find a list of staff, Board Members, and Metro Government officials interviewed:

John Walczak, Director  
Mark Zoeller, Asst, Director  
Steve Wing, General Curator  
Maureen Horrigan, Marketing Manager  
Carol Miller, Business Manager  
Roy Burns, Veterinarian  
Zoltan Gyimesi, Associate Veterinarian  
Jill Gorsky, Development Manager  
Marcelle Gianelloni, Public Education Supervisor  
William McCoy, Public Education Coordinator  
Steven Goodwin, Zoo Facilities Manager  
Cathy Bowling, Personnel Supervisor  
Deborah Belt, Membership Supervisor  
Enos Pray, Guest Services Supervisor  
David Campbell, Elephant Supervisor  
Elaine Huddleston, Zoo Registrar  
William Nay, Horticulture Supervisor  
Jerry Abramson, Mayor  
Bill Summers, Deputy Mayor  
Mark Wheeler, Foundation Board Chairman  
Tom O'Brien, Friends of Zoo Board Chairman  
Diane Taylor, Volunteer Coordinator  
William McMahan, Taxonomic Curator  
Gary Michael, Taxonomic Curator  
Candace McMahan, Zoo Area Curator  
Jane Franklin, Animal Training Supervisor  
Virginia Crossett, Veterinary Hospital Supervisor  
Gary Johnson, Keeper II

Guy Graves, Keeper II  
Gregory Frazier, Keeper II  
Beverly Turgeon, Keeper II  
William Bird, Keeper II  
Brian Hettinger, Keeper II  
Dawn Muncie, Keeper II  
Brent Webb, Keeper II  
Misty Newkirk, Keeper II  
Laura Willoughby, Keeper II  
Richard Laird, Keeper I  
Amanda Adams, Keeper II  
Angelyn Cox, Keeper II

### GENERAL INFORMATION

The LZ officially opened to the public on 2 August 1968. With the exception of the HerpAquarium, exhibits are generally organized in a zoogeographic theme and spread throughout the zoo site. The LZ is owned by the Louisville/Jefferson County Metro Government and operated through the Louisville Zoo Foundation, Inc. The mission of the LZ is "To better the bond between people and the planet...through emphasizing Conservation, Education, Scientific Study, and Recreation in all aspects of the LZ's exhibits, programs, facilities, and activities."

### ANIMAL COLLECTION

The condition and level of care provided the animal collection is excellent. The collection plan is well thought out and the record keeping system is well managed and up to date. Some unbalanced sex ratios exist, but are the result of SSP recommendations. There were no deficiencies cited on the most recent USDA inspection. Overall, the keeper staff is very experienced and dedicated. They are proud of their jobs and their institution and are supportive of the direction in which the leadership is taking the zoo. There is a mix of both newer and older facilities, all of which are well maintained, with a master plan in place to gradually replace the older facilities; some of the newer facilities are exemplary. The exhibit and management principals of the Islands exhibit complex remain innovative and progressive. The rotational use of multiple habitats among five species provides a complexity of experiences for the animals and an excellent activity level for the public.

The only animal in the collection, which raised concern with the VC, was the singly housed polar bear. He appears thin and his coat is in less than optimal condition. The bear was observed in his outdoor facility four times during the accreditation visit and he exhibited what the VC interpreted as stereotypic behavior on three of the occasions. In discussion with the keepers in the area, they indicated that the stereotypic behaviors of the animal had been under study, but there had not been any observations recently. When the keepers were asked about their training program and its frequency, they indicated that training was done regularly and that the bear would come to the training door and exhibit this behavior whenever a keeper was in the back. When the VC reviewed the training log, there had been no entries since March of 2004. If training is being done, it is not being documented. The Coordinator of Enrichment, who is also the supervisor of the area,

when asked did not know what was being done for the bear with regard to enrichment. The animal is scheduled to leave sometime in the next year, and the facility is planned for demolition in preparation for a new polar bear habitat. Nonetheless, in the interim, enrichment should be provided and documented, and efforts undertaken (and documented) to address the bear's stereotypic behavior. Information gleaned will be valuable for the institution that receives this animal and may be useful for incorporation into the management and design features of the new facility at the LZ.

Overall, enrichment protocols are well defined and, in most areas, there was significant enrichment evident and in use. However, the enrichment coordinator has no oversight, process for review, or accountability of implementation of enrichment throughout the zoo. The enrichment coordinator's role and accountability for enrichment implementation should be better defined.

The Behavioral Management Training Program (BMTP) is well defined in the submitted materials and the Supervisor of Training appears competent and motivated. The institution should consider implementing the program throughout the Zoo.

There are controlled feeding opportunities at the giraffe exhibit. However, the VC was unable to observe this activity due to the weather conditions.

The education animal protocols and volunteer and staff training materials are well developed. The animals all appeared to be in good condition and well cared for. However, there are no established standards for frequency of use for the program animals. There is potential for individual animals to be overused by volunteers without a set of guidelines or standards for frequency of use. The VC recommends a review of the current program animal use frequency and the establishment of appropriate use standards for each animal.

The elephants appear to be in excellent condition and are well trained in a free contact management system. The institution has renovated the facility and followed through on their commitment to SSP recommendations to breed their viable African female through artificial insemination. The successful birth of the calf, acceptance by the first time mother, and integration with the older Asian female in the herd is a testament to the skill and dedication of the elephant staff and the zoo leadership. The free contact management program is safe and well managed. The staff is very experienced and there is excellent stability within the program. Over the course of the last year, the program has received significant scrutiny and oversight due to the pregnancy and birth of the calf. This has ensured excellent safety systems and protocols. There has been an in depth, ongoing review of the program, though somewhat informal. It is an accreditation requirement that formal safety reviews with written reports be conducted semi-annually. The current use of overnight chaining is appropriate as the welfare of the calf and control of the mother and aunt can be better insured within this type of management approach. However, continuing need for overnight chaining should be reviewed on an ongoing basis and reduction or elimination considered as the elephants gain further confidence in the new situation.

Older primate and giraffe signage is in need of replacement and exhibit labels on reptile exhibits are small and difficult to read. Exhibit signage includes information on the state of the animals in the wild, but not necessarily through the use of the listed logos.

### **VETERINARY CARE**

The animal health program is effective and comprehensive. Under the direction of Dr Roy Burns, the department staff includes two full-time veterinarians, two veterinary technicians and a hospital keeper. Currently one of the veterinary technicians is on a leave of absence. The department utilizes MedArks, a zoo-based medical records system. The preventive medicine program is well developed and appropriate. The hospital building has limited capability to hold animals, especially larger ones. There is a room designated for surgery and for animal treatments but because of lack of space, the rooms are also used for other functions including storage of equipment. There is no separate radiology room. Quarters are generally cramped. Many medical procedures are done out in the zoo as a result. Consideration should be given to updating and improving the hospital facility. Please see comments regarding the polar bear under the Animal Collection section.

### **CONSERVATION**

Overall, the LZ is an active participant at an appropriate level in AZA conservation programs. The LZ has also been a major contributor to in situ conservation as a captive breeding facility for the reintroduction of the black-footed ferret. They have contributed locally to reptile and amphibian studies. The zoo is developing a conservation fund and endowment by dedicating \$0.15 from every zoo entry ticket purchased. As noted before, the elephant program has made a significant contribution to the SSP with the birth of their African elephant calf. An area of opportunity exists to increase their contribution to in situ elephant conservation by increasing their financial contribution to TAG/SSP supported conservation through the MOU with the International Elephant Foundation. Current contributions to date have been \$200. Possibly some of the annual revenue from the ticket sale fund could be dedicated to this area of need.

The LZ recycles plastic, cans, and other metals, sends manure for composting, and has closed water systems on newer exhibit complexes.

### **EDUCATION and INTERPRETATION**

The LZ has consistently provided sound and innovative conservation education programming since inception. The MetaZoo Education Center, a prototype for zoo education centers, opened in 1981 and still remains the hub of educational programming. The "School in the Zoo" program has been particularly successful with underserved and at risk students. As the only AZA accredited zoo in Kentucky, the LZ is involved with organizations, institutions, and colleges in joint conservation education efforts. The LZ also manages the education program and staff for the Louisville Nature Center near the zoo.

Newer exhibit labels and graphics and way-finding signage reflect present day standards and quality. However, signage in the older primate and giraffe exhibits is poor and many of the labels on the reptile exhibits are very small and difficult to read. The LZ has no formal or professionally managed library. The VC recommends that the LZ consider establishing a centrally located and easily accessible library providing a current source of scientific journals and reference materials. The Education Department trains and maintains a solid group of docents that assist in various programs.

### **RESEARCH**

Ongoing research is identified in the materials provided. Most of the projects involve collaboration and participation with outside research projects. The volume is appropriate for the size of the institution. The Louisville Research Committee is composed of the Veterinarian, Curator, keepers and an outside scientist. There is a well-defined written research policy. There is an impressive list of papers written and presented/published by the staff during the inter-inspection period.

### **GOVERNING AUTHORITY**

The LZ is owned by the Louisville/Jefferson County Metro Government. The Louisville Zoo Foundation, Inc. provides over-site and is a direct liaison with the Metro Government. Members of the Foundation Board are appointed by the Mayor of Metro Government and serve staggered terms. The zoo director is an ad hoc member of the Foundation Board. The Foundation, in conjunction with the LZ staff, has developed a strategic plan and is fully engaged in its implementation through its committee structure. The Foundation solicits and holds funds, separate from Metro Government funds, for various programs and capital projects. The Foundation is responsible for the performance evaluation of the zoo director. The Chairman of the Foundation Board expressed extremely high confidence in the leadership and management ability of the zoo director and the commitment and professionalism of the senior staff. The Mayor of the Metro Government expressed the same sentiments. The Mayor also indicated that although the assistant zoo director position is an appointment by the Mayor, it would only be at the recommendation of the zoo director.

### **STAFF**

The VC observed that, throughout the LZ, morale is high and there is a real sense of purpose and pride in working at the zoo. This was further supported by a meeting with about 75% of the keeper and area supervisor staff where participants were upbeat and shared many positive comments about the LZ's operation and management. Employees have a good understanding of their jobs. The supervisor of training and supervisor of enrichment programs would benefit from stronger direction from management. Opportunities for participation in professional meetings and a tuition reimbursement program are available and should be utilized more by front line staff. Through the Metro Government, the employees receive a typical personnel benefit package. When appropriate, at risk employees have access to a preventive medical program for diseases such as TB, rabies, etc. It is the opinion of the VC that veterinarian salaries are low given the required level of professional training, skills, and experience.

### SUPPORT ORGANIZATION

The Friends of the Louisville Zoo, Inc. holds special events for the purpose of raising funds for the LZ. It has no involvement with the membership program that is operated by the LZ. The Friends Board and the LZ administration mutually agree upon the use of the funds generated by the organization.

### FINANCE

The LZ is owned and operated through the Louisville Zoo Foundation by the Louisville/Jefferson County Metro Government, which provides 22% of the LZ's operating budget. The Metro Government is ultimately responsible for any significant shortfalls in revenue that would result in a year-end deficit. The LZ has done an excellent job of earning or raising the remaining 78% of its operating budget. This has caused the LZ to be frugal in assigning spending priorities. The Metro Government is self-insured with additional catastrophic event coverage. Management and supervisory staff have sufficient funding for participation in professional meetings and training. The LZ should consider additional support for front line staff.

### PHYSICAL FACILITIES

The general condition of the buildings and grounds is acceptable. However, the appearance of some of the original buildings needs refreshing. It is the opinion of the VC that the veterinary hospital should be improved and expanded. There is limited capacity to house animals under medical care and quarters are cramped for routine medical and diagnostic procedures. The hospital building should be renovated to provide a more functional treatment room and a room designated for radiology.

While there appears to be a program of building and mechanical maintenance, the VC recommends that the schedule and program be formalized. Several doors on older exhibit buildings can be difficult to open for people with disabilities. The new playground appears to have no apparatus available to children with disabilities. The LZ should consider accessibility for all guests as improvements are made. The LZ has three separate sewer systems – sanitary, storm, and contaminated storm. There is a settlement system for the latter. The LZ is also an accredited botanical garden with much of its plant material identified for the visitor.

### SAFETY/SECURITY

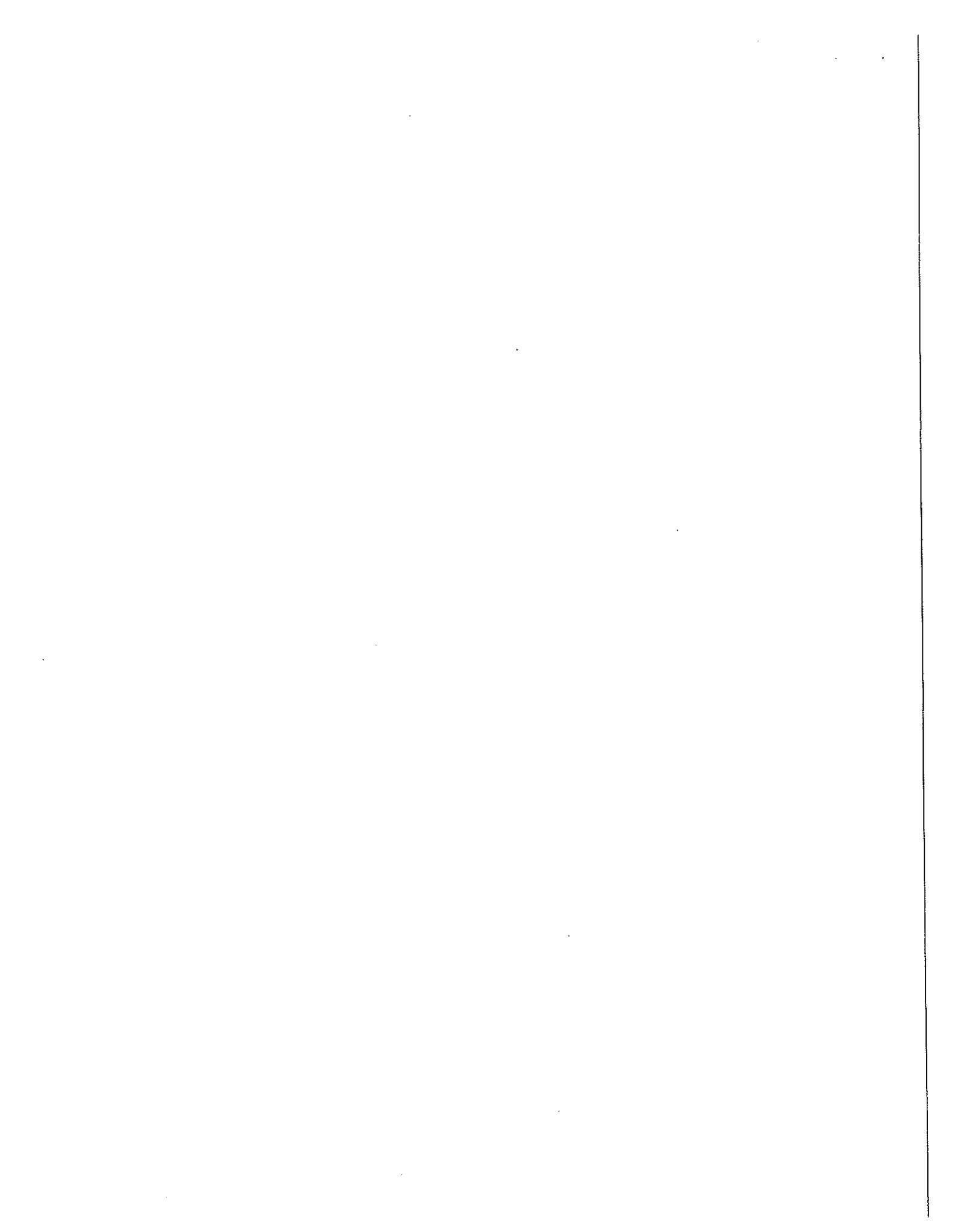
In general, written emergency and safety policies are very comprehensive. First aid provided by trained staff is available to visitors and staff. Animal escape procedures are adequate with staff knowledgeable about them. Drills are conducted on a regular basis. The circumstances regarding a previous bite by a beaded lizard were properly investigated and corrective measures were taken. There are alarms and monitors for light support systems. After hours security is provided by night keeper staff, who are required to make regular checks of zoo facilities. As hand held radio traffic increases zoo-wide, the animal department should have a separate radio from the rest of zoo operations. Additional spare radios are recommended to compensate for those out for repair.

### **GUEST SERVICES**

The LZ has a train, carousel, and rubber wheeled tram. It has also installed a large "splash pad" facility with an accompanying playground. While the time of year limits the number of food facilities that were open, they were attractive, clean, and had appropriate menus. The main gift shop was open and well organized and stocked with appropriate merchandise. Restrooms were plentiful and clean. Although, some restroom doors are difficult for people with disabilities to open. The grounds were clean and neat and sidewalks were in good repair. In general, exhibits are organized in a zoogeographic theme.

### **OTHER PROGRAMS**

The LZ's strategic plan is comprehensive and dynamic and is being followed by staff. The Foundation Board has truly bought into the plan and given committees imperative tasks to complete.



AZA Concerns and Responses  
Louisville Zoological Garden

**MAJORY CONCERNS**

- 1) The veterinary staff is highly skilled and provides quality medical care to the collection. The hospital facility, however, is lacking. There is limited capacity to house animals under medical care and quarters are cramped for routine medical and diagnostic procedures. In addition to increasing holding space, the hospital building should be renovated to provide for a more functional treatment room and a room designated for radiology.**

**Response to Concern (#1)**

The current veterinary hospital (Animal Health Center) at the Louisville Zoo meets the needs of the collection and is adequate for implementation of the Zoos animal health programs. Attached is a floor plan with photos of the facilities.

Much of the veterinary care occurs in the animals' holding areas. Veterinary staff typically makes house calls to obtain histories and make initial observations of clinical cases. Exams via manual restraint usually occur at the animals' holding facility. For large animal examinations requiring sedation, examinations usually are performed in their enclosures, bringing the "Hospital" to them, eliminating transport time and keeping anesthesia duration to a minimum.

The surgery room is used for more than surgery (radiology, ultrasonography) but is disinfected regularly and there have been no problems with infected surgical sites.

In recent construction of new exhibits (Herpaquarium, Islands, Gorilla Forest, Lorikeet Landing), quarantine or isolation holding has been incorporated into the exhibits, serving as quarantine when needed and serving as additional animal holding at other times. The quarantine facilities at Islands and Gorilla Forest is approved and registered by the CDC for quarantine of imported primates.

The Louisville Zoo has a network of veterinary medical and human medical consultants and has short notice availability for advanced imaging such as MRI and CT within 3 miles of the Zoo.

Louisville Zoo recognizes its Animal Health Center is dated and will evaluate the need for remodeling and/or replacement of the facilities along with other facilities needs in the next Master Plan process that should take place in the next year.

- 2) **The visiting committee is concerned about the general welfare and stereotypical behavior of the single polar bear and recommends that the bear's medical condition and weight be assessed and that the stereotypical behavior be studied to determine its frequency and potential contributing factors.**

### **Response to Concern (#2)**

Carnivores at the Louisville Zoo typically receive a preventative health exam every 2 years. The polar bear's exam scheduled for early 2007 was postponed due to an anticipated pre-shipment exam. However, shipment was delayed. The polar bear is scheduled for a preventative health exam in January (possibly February) of 2008.

A behavioral study was started in 2006 in conjunction with Dr. Brent White, Professor of Psychology, Centre College in Danville Kentucky. Dr. White has a long history with the Louisville Zoo, studying woolly monkeys and orangutans and now also involved with gorilla behavior research. We are assessing the bear's behavior and are determining his activity patterns in the current exhibit, including the periods of stereotypy. We will then continue the observations at his interim facility and then compare the data with his behavior when he returns to Louisville in the new Glacier Run exhibits. Changes in facility design, time on and off exhibit, frequency of training and enrichment are being evaluated. Preliminary data from Dr. White indicate that the frequency of stereotypy are actually quite low, but do increase when keepers are in the area and when the bear is anticipating interaction with the staff. This assessment is confirmed by the keeper and curatorial staff by anecdotal observations.

- 3) **The visiting committee recommends that animal department radio communications be placed on a second zoo-wide channel and that the number of radios available to animal staff be assessed.**

### **Response to Concern (#3)**

The Zoo met with its two-way radio contractor, Radioland, to assess the possibility and benefits of adding a second channel to its radio system. The Zoo purchased 15 new radios this year and will continue to involve the animal managers in the distribution of these units. In addition to the two-way radios, the Zoo also maintains a public address system throughout the park and an extensive phone network that covers nearly the entire campus.

## **LESSER CONCERNS**

- 1) The salaries of the veterinary staff are low given the required level of professional training, skills, and experience and should be reviewed.**

### **Response to Lesser Concern (#1)**

- 2) Several facilities, including the new playground at Glacier Run, within the LZ pose accessibility issues for people with disabilities. The LZ should have an ADA accessibility survey done to assess the need for improvements.**

### **Response to Lesser Concern (#2)**

The Louisville Zoo commissioned two accessibility studies in recent years. The reports, from Spalding University Occupational Therapy Program and the Center for Accessible Living, listed needed improvements and achievements. In its summary the Spalding study noted:

“The Louisville Zoo was very accessible. ... The facility used methods such as the “zoo keys”, the petting zoo, and signs with enlarged writing and no glare surfaces to allow people with visual impairments to enjoy their visit to the Zoo...Overall, the Louisville Zoo did an excellent job working to provide a wonderful experience to be enjoyed by all.”

Since this time, the LZG has continued to prioritize and implement these improvements. The Zoo was particularly honored to win the “Breaking Barriers Award for Accessibility to the Disabled” given by the Metro Disability Coalition in 1998. Facilities that have been added or renovated since the studies, including the three playgrounds, are fully compliant with the American with Disabilities Act Accessibility Guidelines (ADAAG). The Little Tikes playground structures meet or exceed Handicap Accessibility

Requirements (ADA compliant), CPSC (Consumer Product Safety Commission) guidelines, and meets ASTM (American Society for Testing Materials) guidelines. The Glacier Run Splash Park was designed to engage and offer splash opportunities to guests of all abilities, though this may not have been readily apparent in its winterized state.

In addition to the facilities work, the Zoo ensures all rides, train, carousel, and tram, are ADA compliant and that interpreters can be made available upon request.

- 3) The application of animal training programs is inconsistent. The visiting committee recommends that behavioral management training becomes a mandatory training component for all animal staff.**

#### **Response to Lesser Concern (#3)**

The newest Louisville Zoo strategic plan, currently in its final draft states:

Expand animal training programs and continue to be innovators

- Dedicate Animal Training Supervisor's time to training throughout the Zoo
- Formalize the animal training programs.
- Make operant conditioning and animal training a top priority zoo-wide; train and empower all keeper staff to be trainers
- Research what is state-of-the-art, implement and take the next step

Animal training and management has been given priority focus at our institution. Each animal department member is engaged in behavior training at some level. A formal training program for staff members was begun in 1996. Due to several time-consuming projects that redirected our training supervisor (birth of elephant calf, hand-raising of 3 siamangs), no formal training classes have been recently offered. This has been rectified and we have scheduled training classes for January and February 2008. In addition, all of our animal managers will be reviewing their animal training programs which includes goals, staffing and record-keeping.

- 4) The visiting committee recommends a review of the enrichment coordinator's role and the accountability of the supervisors' implementation of the enrichment program.**

#### **Response to Lesser Concern (#4)**

The enrichment coordinator's role is being reviewed. The animal management staff, which meets regularly once a week, has allotted time at each of their meetings to discuss a new list of duties and responsibilities, as well as what authority the coordinator will have. Goals will be established for each animal area and progress periodically reviewed.

- 5) **A review of the frequency of use of program animals should be conducted and the establishment of an appropriate frequency of use standard for each animal should be established.**

**Response to Lesser Concern (#5)**

Currently the zoo utilizes a tracking system developed by the MetaZoo keeper and an animal curator that takes into account each individual animal's disposition, health, and level of training. Staff or docents requesting animals need to have their request submitted to the keeper at least one week prior to use. Staff and docents may request an individual animal, but the final assignment is determined by the keeper. Frequency of use guidelines have been established for the raptors and psittacines.

The general curator, education curator and MetaZoo keeper have met and are evaluating each animal's records and will be establishing frequency of use guidelines.