Zerre Points

Master Plan Update

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POINT DEFIANCE ZOO & AQUARIUM | TACOMA, WASHINGTON | SPRING 2014

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Fresh faces, new species enliven your Zoo

A LOT NEW TO SEE — ON LAND AND IN THE WATER

Bright eyes peer up from beside a stream in the Asian Forest Sanctuary.

Black-and-white blurs hop from branch to branch in Kids' Zone.

Brightly colored tropical fish dart two and fro in the South Pacific Aquarium.

All are new animal faces at your Zoo over the last few months.

- Two new female Asian small-clawed otters, Bubbles and Blossom, joined the Asian Forest Sanctuary. They are paired with resident males Ed and Munch for breeding. Look for them hanging out by a water feature, engaging visitors with their entertaining otter antics.
- Three Black and white ruffed lemurs joined the Kids' Zone family early this year. The critically endangered animals are native to Madagascar. Tiffany, Saunders and Albert arrived with a Species Survival Plan[®] breeding recommendation. They are a new species at the Zoo.
- Several colorful tropical fish are now swimming in the South Pacific Aquarium Look for the Saddleback butterflyfish in the lagoon or the pool adjacent to the Stingray touch tank. Try to spot the orangish Potter's Angelfish in that same tank, or in the Seahorse area. Keep an eye out for new colorful fish every time you visit. The "seas" of our aquariums are ever changing.

All represent a continuing commitment to conserving endangered species and presenting animals that show the diversity of species and fit in with the themes of various areas of the Zoo, said General Curator Dr. Karen Goodrowe Beck.

The addition of the Black and white ruffed lemurs, more than three years in the making, is particularly exciting to Kids' Zone staff, said Senior Staff Biologist Jennifer Donovan. They're eager to share the story of these animals and spread the message that their populations are in precipitous decline due to habitat loss and exploitation, Donovan said.





LEARNING ABOUT LEMURS

Here's a quick Lemur quiz. See below for answers.

- 1. What do you call a group of Lemurs?
- 2. Where's their native home?
- 3. Some lemurs are exclusively arboreal. What does that mean?
- 4. Are lemurs: a: carnivores; b: primates; c: marsupials
- 5. How many lemurs live in Kids' Zone?

Answers: 1. A troop 2. The island of Madagascar 3. They live in trees 4. b: primates 5. 8: 3 black and white ruffed lemurs; 2 black lemurs and 3 ring tailed lemurs

North Pacific Aquarium: Old friend nears end of useful life

REPLACING AQUARIUM, RENOVATING POLAR BEAR AND ROCKY SHORES EXHIBITS CRUCIAL TO ZOO'S FUTURE

Imagine an aquarium in which Hammerhead sharks cruise and Sea turtles glide amid a colorful world of coral reefs. Listen for waves rushing into a tidal pool teeming with nearshore sea life. Picture Polar bears lumbering across an exhibit twice as large as the space they roam now. All are part of the Zoo's Master Plan, developed through a rigorous, multiyear public process that included citizen input, said Zoo Deputy Director John Houck.

The Zoo Society and Zoo staff worked in conjunction with Metro Parks Tacoma colleagues over the last three years to prioritize Master Plan recommendations. The result is a \$65 million blueprint for addressing the Zoo's most critical and urgent Master Plan needs over the next 10-15 years. Replacement of the North Pacific Aquarium and renovation of the Polar bear and Rocky Shores exhibits are at the top of the list. Faltering life-support systems and extensive salt-water corrosion have put them on borrowed time, Houck said.

With Ocean Commotion event activities highlighting our connection to the sea and International Polar Bear Day this month, it's an excellent time to update Zoo members on these Master Plan needs, Houck said.

When the North Pacific Aquarium opened in 1963, gasoline cost 29 cents a gallon, the average annual wage was about \$5,800 and the Beatles were unknown in the U.S.

Today, the 51-year-old aquarium is perilously near the end of its useful life. Zoo aquarists and maintenance staff regularly struggle to maintain critical life-support systems. Significant structural issues result from decades of salt-water corrosion. An Association of Zoos & Aquariums accreditation team cited significant concerns with the North Pacific Aquarium during its 2012 inspection.

A modest replacement aquarium would cost \$41.5 million, recent figures show. A new aquarium would continue the tradition of showcasing Puget Sound marine life while adding educational depth with exhibits from across the Pacific Rim. (The South Pacific Aquarium, opened in 1989, would remain a home to Stingray Cove, the Zoo's large shark collection and many other species.)

The Zoo's Arctic Tundra home of Polar bears Boris, Blizzard and Glacier also is in urgent need of renovation, Houck said. Heavy use and salt-water corrosion have taken their toll on the once award-winning exhibit, which opened in 1982. Compliance with continually updated standards of care for the increasingly vulnerable species dictates a larger exhibit space for the 900-plus pound bears.

Polar bears are "Arctic ambassadors," and as a signature species at Point Defiance Zoo & Aquarium, have been part of the Zoo family for more than 75 years. Maintaining a home for them and retaining the Zoo's prominence as a leader in global Polar bear conservation requires a new investment, Houck said.

Most recent estimates show it would cost about \$13.7 million to renovate the bears' aging home with one meeting 21st century care and safety standards. A modernized exhibit could accommodate a future Polar bear breeding program as scientists around the world work to conserve this increasingly vulnerable and fragile species.

Improvements totaling about \$4 million also are imperative at the deteriorating and corroded Rocky Shores exhibit, home to walruses and other marine mammals.

Critical upgrades to seawater systems and other necessary work bring the combined cost for the Zoo's most urgent needs to just over \$65 million, Houck said.

"We're proud of the Zoo's stature as a crown jewel in our wonderful park system and of our reputation as a leader in conservation," Houck said. "Crucial improvements are needed to continue that legacy."



Salt-water corrosion and age have taken a toll on the infrastructure of the North Pacific Aquarium. The Giant Pacific octopus is just one of many species that call the aquarium home.

Want to touch a shark? NEW ADDITIONS UP THE "WOW" FACTOR AT STINGRAY COVE

Brown-banded bamboo and Epaulette sharks to make debut this spring

If you thought simply seeing sharks at the Zoo was exciting, get ready.

Come spring, you'll be able to touch them.

Two small shark species — Brown-banded bamboo sharks and Epaulette sharks — are joining their stingray cousins in the South Pacific Aquarium this spring.

Visitors will be able to dip their hands into the tank's warm, tropical waters, brush the skin of these graceful ocean predators, touch their fins and feel their long tails as they slowly swim by.

"It feels a bit like sandpaper," said Neil Allen, the Zoo's Curator of Aquatic Animals.

Adding the small, harmless sharks to the already popular Stingray Cove touch tank was a natural progression in the evolution of the exhibit, Allen said.

Stingray Cove opened last May with dinner-plate sized stingrays. It quickly became a popular stop at the Zoo for visitors eager to feel the rays' velvety surfaces.

"We know that people connect more with animals when they can see them up close — or even reach out and touch them," Allen said. "These small sharks help us tell the story of their species and other imperiled sharks."

Zoo education and aquarium staff at Stingray Cove and in the new Eye-to-Eye Shark Dive program highlight to visitors the perils sharks face in the world's oceans. Millions of sharks are killed each year for their fins or through overfishing practices.

Shark conservation is a major ongoing education mission of Point Defiance Zoo & Aquarium.

The Zoo's newest sharks are petite when compared to the 450-pound, 9-foot-long Lemon shark, Sandbar, Sand Tiger, Nurse and Blacktip Reef sharks in the main South Pacific Aquarium tank.

Epaulette sharks, named for the large black spots that resemble military epaulettes — or shoulder ornaments behind each pectoral fin, are generally less than 3 feet long. They don't swim but rather "walk" along the sandy bottom.

Brown-banded bamboo sharks have barbels at the mouth that look like a cat's whiskers, so they're sometimes called cat sharks. They grow to about 4 feet long.

Both are native to the Western Pacific Ocean. They are nocturnal feeders that live in and around coral reefs and tide pools.

Allen hopes visitors' ability to see and feel these sharks will help people reconsider how they think about sharks and what they can do to protect them.

"We want people to connect with amazing ocean creatures — see them, touch them and be inspired to help conserve them," Allen said.



APRIL 12-13 EARTH DAY PARTY

Zoo animals get special treats and enrichments while humans learn how to shrink their carbon paw prints and take actions to create a healthy, sustainable, green community.



MARCH 15 GO GREEN

Animals throughout the Zoo receive special green enrichment treats and toys. Learn how to be "green" yourself by checking out environment-saving tips at pdza.org and on the Zoo's Facebook page at: https://www.facebook.com/ PtDefianceZoo



MARCH 31-APRIL 4 SPRING BREAK SUPERSTARS

Take a "staycation" but tour the world of animals during Spring Break. We'll put the spotlight on sharks, wild cats, red wolves, elephants and polar bears. There will be a scavenger hunt, and a different animal Superstar each day.



A SPRINGTIME TO SAVOR

JOIN US AT YOUR **ZOO** FOR AN EVENT-PACKED MARCH, APRIL AND MAY

APRIL 19 KALI'S 1ST BIRTHDAY Celebrate with us as Sumatran tiger cub Kali

turns 1 year old. Discover what a tiger gets for her birthday, sign her birthday card and enjoy other special activities.



MAY 3 BUDGIES ARE BACK!

"INDIANA BONES, BARKEOLOGIST" premiers at Wild Wonders Outdoor Theater

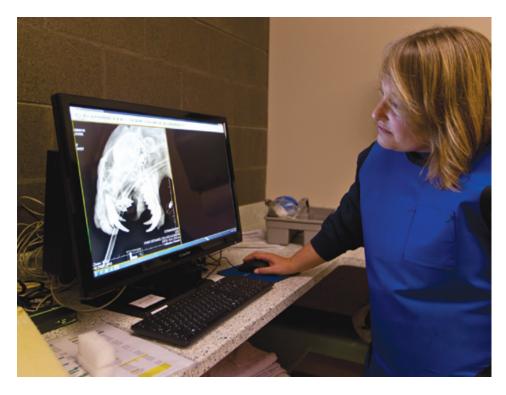
MAY 10 HALF PRICE MOMS' DAY

Make mom smile while you stroll the grounds with her and celebrate a Northwest tradition at the Zoo. All moms will receive half-off general admission.

MAY 11 MARVELOUS MOTHERS

On this special day, bring Mom and join the Zoo in celebrating mothers of every kind. Vote for your favorite Zoo mother on the Zoo's Facebook page at: https://www.facebook.com/ PtDefianceZoo





A big leap forward for zoo veterinarians

ZOOBILEE DONATIONS PAY FOR DIGITAL IMAGING EQUIPMENT THAT HELPS IMPROVE ANIMAL CARE

Point Defiance Zoo & Aquarium put more than \$60,000 in donations raised last summer to good use with the purchase of a digital radiography machine.

Donors gifted the money during the Raise the Paddle event at Zoobilee, the Zoo Society's annual fundraiser held in July. Upon hearing of the need for the machine, one generous individual matched every dollar donated up to \$10,000, spurring others to donate even more.

Those donations have significantly improved the medical and preventive care the Zoo provides its animals. "The new digital imaging equipment has been a fantastic addition," said Head Veterinarian Dr. Karen Wolf.

For example, the instant display of images reduces the time animals must be under anesthesia, Dr. Wolf said. With the older equipment, veterinarians and staff waited for x-ray films to develop before they could make an assessment that would inform their course of action. Eliminating the use of the chemicals needed to develop the old x-ray films also is a bonus.

The quality of the images from the digital radiography machine is also much improved. Take for example, the recent radiographic image of a rockfish with scoliosis of the spine. The fine bones of the animal's skull and even its eyeball are visible, thanks to the new technology.

During a recent exam of Josie, the Zoo's oldest Clouded leopard, images of her cranium instantly appeared on screen, clear and sharp in definition.

"We're also able to adjust the images as we view them," Dr. Wolf explained. And should veterinarians need to consult a veterinary radiologist, they can easily send a digital file of an image anywhere in the world. The





Zoo staff makes use of the equipment on a regular basis; radiographic assessments are often part of the animals' routine check-ups.

"It's greatly improved our diagnostic ability," Dr. Wolf said. "There is a dramatic difference between the new imaging equipment and what we were using. I can't say enough about how much this has helped us."

Zoobilee donors and other members of the community take great pride in the fact that Point Defiance Zoo & Aquarium is a national leader in conservation, education and providing the best possible health care for its animals, said Larry Norvell, Executive Director of The Zoo Society.

"This digital radiography machine helps assure our animals continue to receive the best animal health care available anywhere in our nation," he added.

SAVE THE DATE FOR ZOOBILEE JULY 18

ZOOMAZING CAMPS FOR KIDS

Register your child for summer camp sessions that provide a lifetime of memories. Exclusive members-only registration is now on. In addition to the list below, find the entire schedule of camps and other education programs at pdza.org.

WEEKLONG, ALL-DAY ADVENTURE CAMPS

Fees: \$220 Members; \$250 Non-members

These camps give kids daylong adventures with two different classes providing a deeper knowledge of animals and greater understanding of the world around them.

1st & 2nd Grade Graduates

July 23-27 Where in the World? NEW! 9 a.m.-12:30 p.m. Animal Athletes NEW! 1 p.m.-4:30 p.m.

July 7-11 All Around the Zoo 9 a.m.-12:30 p.m. **Under the Sea** 1 p.m.-4:30 p.m.

July 21-25 Stealthy Stingrays & Sneaky Sharks 9 a.m.-12:30 p.m. Cats & Dogs 1 p.m.-4:30 p.m.

July 28-August 1 Under the Sea 9 a.m.-12:30 p.m. Animal Athletes NEW! 1 p.m.-4:30 p.m.

August 11-15 Where in the World? NEW! 9 a.m.-12:30 p.m. Cats & Dogs 1 p.m.-4:30 p.m.

3rd & 4th Grade Graduates

June 23-27 Sense-ational Animals NEW! 9 a.m.-12:30 p.m. Oceans of Fun 1 p.m.-4:30 p.m.

July 14-18 Build Your Own Zoo 9 a.m.-12:30 p.m. Animal Grossology NEW! 1 p.m.-4:30 p.m.

5th & 6th Grade Graduates

July 14-18 If I Ran the Zoo 9 a.m.-12:30 p.m. **Jr. Zookeeper** 1 p.m.-4:30 p.m.

August 18-22 If I Ran the Zoo 9 a.m.-12:30 p.m. Jr. Zookeeper 1 p.m.-4:30 p.m.

MINI CAMPS

Current and graduate preschoolers Ages 4 and 5 Fees: \$40 Members; \$45 Non-members

Spots & Stripes June 16-17, 9 a.m.-noon August 4-5, 1 p.m.-4 p.m.

P is for Preschooler June 16-17, 1 p.m.-4 p.m. August 14-15, 1 p.m.-4 p.m.

Fabulous Feathered Friends NEW! June 19-20, 1 p.m.-4 p.m. August 11-12, 9 a.m.-noon

Eye Spy NEW! June 30-July 1, 9 a.m.-noon July 24-25, 1 p.m.-4 p.m.

Really Big Zoo June 30-July 1, 1 p.m.-4 p.m. July 21-22, 9 a.m.-noon

Animals on the Move July 10-11, 9 a.m.-noon Aug. 21-22, 1 p.m.-4 p.m.

Kindergarten Graduates Fees: \$55 Members; \$60 Non-members

Creature Feature June 18-20, 9 a.m.-noon Aug. 11-13, 1 p.m.-4 p.m.

Leader of the Pack NEW! June 30-July 2, 1 p.m.-4 p.m. Aug. 13-15, 9 a.m.-noon

Wild Workers NEW! July 7-9, 9 a.m.-noon Aug. 18-20, 1 p.m.-4 p.m.

Home For You & Me July 9-11, 1 p.m.-4 p.m.

You Got to Move It, Move It July 23-25, 9 a.m.-noon Aug. 6-8, 1 p.m.-4 p.m.

Radical Rays June 30-July 2, 9 a.m.-noon Aug. 4-6, 1 p.m.-4 p.m. 1st & 2nd Grade Graduates Fees: \$45 Members; \$50 Non-members

Forest Explorers & Beach Combers June 30, 9 a.m.-4:30 p.m.

In the Zone July 1, 9 a.m.-4:30 p.m.

'Round the Rocky Shore July 2, 9 a.m.-4:30 p.m.

Asia Adventures July 3, 9 a.m.-4:30 p.m.

4th-6th Grade Graduates Fees: \$135 Members; \$160 Non-members (includes materials)

Wild Photographer Aug. 4-8, 9 a.m.-12:30 p.m. Aug. 18-22, 9 a.m.-12:30 p.m.

Wild Artist Aug. 18-22, 1 p.m.-4:30 p.m.

5th & 6th Grade Graduates Fees: \$115 Members; \$130 Non-members

If I Ran the Zoo July 14 - 18, 9 a.m.-12:30 p.m. Aug. 18 - 22, 9 a.m.-12:30 p.m.

Jr. Zookeeper July 14-18, 1 p.m.-4:30 p.m. Aug. 18-22, 1 p.m.-4:30 p.m.

Animal Avengers Aug. 18-22, 1 p.m.-4:30 p.m.

Ages 13-17

Teen Wild Researcher Fees: \$185 Members; \$210 Non-members July 7-11, 9 a.m. - 12:30 p.m.

Teen Wild Photographer Fees: \$135 Members; \$160 Non-members Aug. 11-15, 1 p.m.-4:30 p.m.





Keeping the Vision Alive

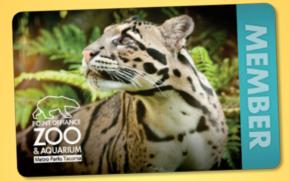
Become a Vision Keeper today with an annual gift of \$500 or more. Your donation helps fund educational programs, new major exhibits, and conservation projects to save endangered species in the wild. Learn more at thezoosociety.org, contact Lawrence Norvell at 253-404-3663 or email Inorvell@thezoosociety.org.

Bring the Zoo home through Adopt An Animal program

An Asian elephant won't fit in your living room, but a stuffed one will. So does a plush Polar bear, a stuffed Sumatran tiger or some 10 other Zoo animals, from Arctic fox to mischievous Meerkats to a wondrous walrus. All are part of The Zoo Society's Adopt An Animal program. Become a Zoo Parent (\$60 donation) or Zoo Friend (\$45) and receive a plush animal, adoption certificate, animal fact sheet and photo. Your gift helps fund animal care and facilities as well as wildlife conservation and

education programs. For more information, go to thezoosociety.org, call 253-404-3651 or email ljohnson@ thezoosociety.org.

RE-member yourself, family and friends



Renew your membership or give one to someone you love and share great memories.

It's a great time to renew your Zoo membership, or purchase one as a gift for family and friends. A membership pays for itself in just a few visits. You get a year full of excitement and memories, with unlimited Zoo visits, discounts on camps and special programs, a subscription to ZooPoints, and admission discounts to Zoolights and our sister zoo, Northwest Trek Wildlife Park. Learn more at pdza.org/membership.