TEAM 51

IN THE INTERNATIONAL COURT OF JUSTICE

AT THE PEACE PALACE

THE HAGUE, THE NETHERLANDS

QUESTIONS RELATING TO PRIOR INFORMED CONSENT AND BENEFIT SHARING IN THE CONTEXT OF DE-EXTINCTION (ANECOYON V. RIDUS)

ANECOYON

APPLICANT

V.

RIDUS

RESPONDENT

MEMORIAL FOR THE RESPONDENT

THE 30th STETSON MOOT COURT COMPETITION

2025-2026

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QUESTIONS PRESENTED

I. WHETHER RIDUS'S CONDUCT COMPLIED WITH OR VIOLATED THE PRIOR INFORMED CONSENT PROVISIONS OF THE CBD AND THE NAGOYA PROTOCOL, TO THE EXTENT THEY ARE APPLICABLE.

II. WHETHER ANECOYON'S REFUSAL TO CONSENT BASED ON ITS OBJECTIONS TO DE-EXTINCTION IS COUNTER TO THE CBD'S OBJECTIVES.

III. WHETHER, AS AN INITIAL MATTER, DSI USED FOR DE-EXTINCTION ACTIVITIES IS "BIOTECHNOLOGY" FOR PURPOSES OF THE CBD AND THE NAGOYA PROTOCOL.

IV. IF SO, WHETHER THE SIDNEY ANIMAL PARK IS A USER OF DSI ON GENETIC RESOURCES FOR PURPOSES OF CBD DECISION 16/2 AND WHETHER THE SIDNEY ANIMAL PARK IS ENGAGED IN COMMERCIAL ACTIVITY COVERED BY A SECTOR CURRENTLY LISTED IN CBD DECISION 16/2.

STATEMENT OF JURISDICTION

Anecoyon and Ridus have submitted by Special Agreement their differences concerning questions relating to Prior Informed Consent and Benefit Sharing in the Context of De-Extinction and transmitted a copy thereof to the Registrar of the International Court of Justice ("Court"). The Registrar acknowledged receipt of the notification of the Parties regarding this matter. Therefore, Anecoyon and Ridus have accepted the jurisdiction of the Court pursuant to Article 40(1) of the Statute.

STATEMENT OF FACTS

Anecoyon is a lower-middle-income country, while its neighbor, Ridus, is a high-income country. Both States are parties to the Convention on Biological Diversity ("CBD") and the Nagoya Protocol on Access and Benefit Sharing ("Nagoya Protocol").

The Royal Panther once inhabited the area that is now the territory of Anecoyon and Ridus and went extinct approximately 6,000 years ago. In 2009, the Anecoyon Ministry of Natural Resources loaned the best-preserved specimen to the National Museum of Ridus. On 16 September 2020, the National Museum of Ridus extracted DNA from the Royal panther fossil and intended to create a Royal panther reference genome and use the digital sequence information for the "de-extinction".

On 19 December 2024, two panthers were produced through this process and are currently being raised at the Sidney Animal Park. It is now one of the largest tourist destinations in Ridus, and the revenue from the panther-viewing charge is used to care for the two panthers.

On 22 April 2025, Anecoyon reiterated its objection to the use of its genetic resources for the de-extinction project, calling for financial contributions to the Cali Fund. Ridus disagreed, arguing the project isn't covered by CBD Decision 16/2. Both nations agreed to discuss benefit sharing under the Nagoya Protocol, with Ridus acknowledging financial thresholds for the Sidney Animal Park.

Despite attempts to negotiate, the dispute remained unresolved, and both States have agreed to bring the matter before the International Court of Justice ("ICJ").

SUMMARY OF ARGUMENT

Pleading I

Ridus complied with the prior informed consent provisions of the CBD and the Nagoya Protocol. Prior informed consent is not required because Ridus accessed the fossil before the Nagoya protocol entered into force, and alternatively, Article 2 of the CBD does not cover resources collected from extinct species. Also, the Royal Panther's range included what is now the territory of Ridus, and Ridus has a claim to its DNA. Moreover, even if prior informed consent is required, Ridus has obtained it through the loan agreement in 2009.

Pleading II

Anecoyon's refusal to consent to the de-extinction of the Royal Panther contradicts the goals of the CBD. The CBD's objectives include conserving biological diversity and promoting the sustainable use of species. De-extinction can support conservation by reintroducing species, saving ecosystems, and enhancing biodiversity. It also promotes the sustainable use of species through research, education, and public engagement. Therefore, Anecoyon's stance against de-extinction is misaligned with these objectives, as it undermines efforts to conserve and sustainably use biodiversity.

Pleading III

The use of DSI for de-extinction activities does not constitute "biotechnology" as defined under the CBD and the Nagoya Protocol. Under the interpretive rules of the Vienna Convention on the Law of Treaties, the ordinary meaning of "biotechnology" excludes DSI, as DSI is not derived from living organisms or their derivatives, and its application in de-extinction results in organisms, not products or processes. The context, object, and purpose of the CBD and

Nagoya Protocol further demonstrate a deliberate regulatory distinction between technology and information, with DSI falling squarely within the scope of scientific information exchange under Article 17 of the CBD. Subsequent practice of the contracting parties confirms that DSI is not treated as biotechnology, reinforcing this interpretation.

Pleading IV

Even assuming arguendo that DSI used for de-extinction constitutes biotechnology, the Sidney Animal Park bears no obligation to contribute to the Cali Fund. The Park is not a "user" of genetic resources, as it does not utilize genetic resources for research and development or biotechnological application, but rather engages solely in animal conservation, care, and rewilding. Furthermore, the Park's activities do not constitute "commercial activities" within any sector listed in CBD Decision 16/2. It is classified under ISIC 9103 for zoological gardens, which is excluded from the Decision's indicative list, and its operations are fundamentally non-commercial in nature and purpose, being conducted by a non-profit entity with all revenue directed toward conservation objectives.

ARGUMENT

I. RIDUS'S CONDUCT COMPLIED WITH THE PRIOR INFORMED CONSENT PROVISIONS OF THE CBD AND THE NAGOYA PROTOCOL.

Under the CBD and the Nagoya Protocol[1], Prior Informed Consent ("PIC") means the consent of the government of the country of origin, which must be obtained before gaining access to genetic resources[2]. Here, Ridus complied with the PIC obligation because it is not necessary in this case **[A]**, and even if it is required, Ridus had obtained it **[B]**.

A. Prior Informed Consent under the CBD and the Nagoya Protocol Was Not Required in This Case.

The PIC obligation was not required for Ridus's accessing of fossils falls outside the **[1]** temporal scope, **[2]** alternatively, the subject matter scope under the two conventions.

1. Ridus's Conduct Falls Outside the *Temporal Scope* of Article 6 of the Nagoya Protocol Because Its Access to the Fossil Occurred Before the Protocol Entered into Force.

According to Article 28 of VCLT[3], a treaty has no retroactive effect[4]. It applies only to accidents occurring after it enters into force[5]. Here, Anecoyon and Ridus became Parties to the Nagoya

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[1] Art. 6(1), Nagoya Protocol on Access to Genetic Resources and the Fair and Equitable Sharing of Benefits Arising from their Utilization to the Convention on Biological Diversity, October 29, 2010 [*hereinafter* Nagoya Protocol]; Art. 15, Convention on Biological Diversity, June 5, 1992, 1760 U.N.T.S. 79 [*hereinafter* CBD].

[2] Guidelines to Assist in the Preparation of Institutional Policies based on the "Principles on Access to Genetic Resources and Benefit-sharing", Australian National Botanic Gardens (2000).

[3] Art. 28, VCLT.

[4] Olivier Corten, et. al., *The Vienna Conventions on the Law of Treaties: A Commentary*, Oxford University Press, 720 (2011).

[5] The Island of Palmas Case (or Miangas) (United States of America v. The Netherlands), Award, PCA (ad hoc), IAA Reports 1928, 845; Ben Juratowitch, et. al., *Article 28 of the VCLT. In: General International Law in International Investment Law*, Oxford University Press, 84

Protocol in 2015[6], but Anecoyon had loaned the fossil of the Royal Panther to Ridus in 2009[7], which was before the date the Protocol entered into force for the two countries[8]. Thus, the Nagoya Protocol cannot be applied to this access.

Moreover, Article 6(1) of the Nagoya Protocol[9] indicates that access to genetic resources is subject to the provider Party's prior informed consent[10]. "Access" means acquiring a specimen of a genetic resource[11], at the point in time when the biological sample crosses a border[12], the PIC obligation is triggered when accessing[13], "for utilization" is used as the purpose of accessing[14]. In practice, the EU Regulation[15] implementing the Nagoya Protocol is clear that it does not apply to genetic resources accessed prior to the entry into force of the Protocol[16].

In this case, even the utilization of fossil in 2020 is occurring after the Protocol entry into force[17],

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(2024).

6 Para. 11, record.

7 Para. 15, record.

8 Thomas Greiber, et. al., *An Explanatory Guide to the Nagoya Protocol on Access and Benefit-sharing*, International Union for Conservation of Nature and Natural Resources, 98 (2012).

9 Art. 6(1), Nagoya Protocol.

10 Tomme Rosanne Young, *An International Cooperation Perspective on the Implementation of the Nagoya Protocol*, 453 (2012); Elisa Morgera et. al., *Unraveling the Nagoya Protocol: A Commentary on the Nagoya Protocol on Access and Benefit-sharing to the Convention on Biological Diversity*, 137 (2014).

11 Art. 2(3), Act on Access to and Utilization of Genetic Resources and Benefit-sharing, Statutes of the Republic of Korea, Act No. 14533 (2017); Art. 3(3), European Regulation No. 511/2014.

12 Morten Walløe Tvedt, et. al., *Implementing the Nagoya Protocol on ABS: A Hypothetical Case Study on Enforcing Benefit Sharing in Norway*, The Journal of World Intellectual Property, 385 (2011).

13 Annex, CETAF Code of Conduct on Access and Benefit-Sharing, 3 (2018).

14 Preamble, CETAF Code of Conduct on Access and Benefit-Sharing, 5 (2018).

15 Art. 2(1), European Regulation No. 511/2014.

16 Study to Identify Specific Cases of Genetic Resources and Traditional Knowledge Ass ociated with Genetic Resources that Occur in Transboundary Situations or for Which it i s not possible to Grant or Obtain Prior Informed Consent, CBD/SBI/3/15/Add.1, 5(2020).

17 Para. 16, record.

which does not constitute the point in time for the PIC obligation[18]. Therefore, the conduct of accessing happened before it entered into force[19], so Ridus has no obligation to obtain prior informed consent from Anecoyon.

2. Ridus's Conduct Falls Outside the *Subject Matter Scope* of Article 15 of the CBD and Article 6 of the Nagoya Protocol Because the Resources Used by Ridus Were Collected from Extinct Species and Not from Anecoyon.

According to Article 15(5) of the CBD and Article 6(1) of the Nagoya Protocol[20], when accessing genetic resources from the country of origin of such resources[21], prior informed consent is required[22]. Here, Ridus did not have such an obligation because resources from fossils are not "genetic resources" **[a]**, or Ridus itself is the "providing country" of Royal Panther **[b]**.

a. "Country Providing Genetic Resources" does not cover resources collected from extinct species.

i. The text's ordinary meaning does not apply to extinct species.

"Genetic resources" means genetic resources of actual or potential value[23], and "genetic material" means any material of plant, animal, microbial, or other origin containing functional units of heredity[24]. "Heredity" means the process by which characteristics are given from generation

[18] Art. 2(1), European Regulation No. 511/2014.
[19] Para. 15, record.
[20] Art. 15, CBD; Art. 6(1), Nagoya Protocol.
[21] Art. 2, CBD.
[22] Elisa Morgera, et. al., *Unraveling the Nagoya Protocol: A Commentary on the Nagoya Protocol on Access and Benefit-sharing to the Convention on Biological Diversity*, 137 (2014).
[23] Art. 2, CBD.
[24] Art. 2, CBD.

through the genes[25], which are made up of DNA[26], the functional units of DNA and RNA material that are found within all living cells[27].

However, in the present case, Ridus's conduct is based on the fossils of the Royal Panther[28], which went extinct approximately 6,000 years ago[29], and does not include living cells. Therefore, the fossil cannot be interpreted as "genetic material", and the resources collected from it cannot be defined as "genetic resources".

ii. The object and purpose confirm this interpretation.

The terms of the treaty should be interpreted to give effect to the parties' intentions[30]. A treaty's preamble establishes the context for interpretation[31], reflects the intentions of the parties. The preamble of CBD emphasizes the maintenance and recovery of viable populations of species in their natural surroundings[32], indicating that the role for *ex-situ* approaches is to provide an "insurance policy" against species or genetic resource extinction in nature[33]. Thus, the primary purpose of the CBD is to protect existing biological resources, excluding those that have become

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[25] Helen Pearson. *What is a gene?* Nature, 398-401 (2006); Cambridge Dictionary, available at <https://dictionary.cambridge.org/us/dictionary/english-chinese-simplified/heredity>, accessed 31 October 2025.
[26] John Waller, *Heredity: A Very Short Introduction*, Oxford University Press, 102 (2017).
[27] Hassan Raza, *Basics of Physical and Functional Units of Heredity*, Journal of Genetic Disorders and Genetic Reports, 1 (2021).
[28] Para. 16, record.
[29] Para. 7, record.
[30] The Corfu Channel (U.K. v. Alb.), Judgment, ICJ Reports 1949, 24-5; Application of the International Convention on the Elimination of All Forms of Racial Discrimination (Geor. v. Russ. Fed.), Preliminary Objections, Judgment, ICJ Reports 2011, 133-34.
[31] Richard Gardiner, *Treaty Interpretation*, Oxford International Law Library, 205 (2015).
[32] Preamble, CBD.
[33] Lyle Glowka, et. al., *A Guide to the Convention on Biological Diversity*, International Union for Conservation of Nature and Natural Resources, 11 (1994).

extinct. Therefore, the fossil cannot be interpreted as a genetic resource.

b. Ridus itself is the "Providing Country" of Royal Panther.

Firstly, "Country providing genetic resources" in Article 2 of the CBD[34] was defined as the country supplying genetic resources collected from *in-situ* sources where the resources exist within ecosystems and natural habitats[35]. Here, the Royal Panther once inhabited the area that is now the territory of both Anecoyon and Ridus, where fossils and bone remnants of the species have been found in both countries[36]. Therefore, since Royal Panther once inhabited Ridus's territory, Ridus is also the origin country and has no prior informed consent obligation to Anecoyon when accessing these resources.

Secondly, Article 11 of the Nagoya Protocol[37] addresses situations in which the same genetic resources are found *in-situ* within the territory of more than one Party[38]. The same genetic resources mean the species share the specific genetic or biochemical characteristics utilized[39]. Moreover, the species exist in ecosystems that range prior to the recent era of human translocation[40], the country where these species are now living in *in-situ* conditions would be considered under the Convention as the country of origin[41].

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[34] Art. 2, CBD.
[35] Thomas Greiber, et. al., *An Explanatory Guide to the Nagoya Protocol on Access and Benefit-sharing*, International Union for Conservation of Nature and Natural Resources, 98 (2012).
[36] Para. 6, record.
[37] Art. 11, Nagoya Protocol.
[38] Thomas Greiber, et. al., *An Explanatory Guide to the Nagoya Protocol on Access and Benefit-sharing*, International Union for Conservation of Nature and Natural Resources, 134 (2012).
[39] Thomas Greiber, et. al., *An Explanatory Guide to the Nagoya Protocol on Access and Benefit-sharing*, International Union for Conservation of Nature and Natural Resources, 134 (2012).
[40] Gurdial Singh Nijar, *An Asian Developing Country's View on the Implementation Challenges of the Nagoya Protocol*, 248 (2013).
[41] Lyle Glowka, et. al., *A Guide to the Convention on Biological Diversity*, International Union

Therefore, since Royal Panther's historical range included Ridus's present territory[42], Ridus has a claim to it and does not have to inform Anecoyon.

B. <u>Even if Prior Informed Consent Was Required, Ridus Complied with This Obligation through the Loan Agreement with Anecoyon.</u>

According to the loan agreement by Anecoyon and Ridus in 2009[43], the loan of fossil was for "educational and scientific research". "Scientific research" employs rigorous scientific methods to collect, analyze, and interpret data[44]. The basic research, including "studying the structure of DNA," is one of the scientific research types[45], and genetics is the branch of science concerned with genes, heredity, and variation in living organisms[46].

Furthermore, modern bio-sciences have led to the rapid growth of scientific research on the genetic basis of life[47]. During the Fifth meeting of the parties to the CBD, the panel emphasized that it is possible that the ultimate use and value of materials meant for research cannot be predicted when prior informed consent is sought[48], thus, the mutually agreed terms need to cover a broad enough range of circumstances to cover any possible future uses.[49]

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for Conservation of Nature and Natural Resources, 18 (1994).

[42] Para. 6, record.

[43] Para. 15, record.

[44] Syed Amin Tabish, *Scientific Research. In: Health Care Management: Principles and Practice*, Springer Nature Singapore, 560 (2024).

[45] Muhammad Hassan, *Scientific Research-Types, Purpose and Guide*, available at < https://researchmethod.net/scientific-research/>, accessed 31 October 2025.

[46] Qiuyan Wang, et. al., *Maternal factor OTX2 regulates human embryonic genome activation and early development*, Nature Genetics (2025).

[47] Elisa Morgera, et. al., *Unraveling the Nagoya Protocol: A Commentary on the Nagoya Protocol on Access and Benefit-sharing to the Convention on Biological Diversity*, 3 (2014).

[48] Para. 112, UNEP/CBD/COP/5/8 2 (1999).

[49] Para. 113(b), UNEP/CBD/COP/5/8 2 (1999).

Here, Ridius's conduct, including extracting DNA from the Royal panther fossil[50], mapping the genome of the Royal panther[51] are all belong to scientific research. Therefore, Ridus has obtained prior informed consent from Anecoyon,

II. ANECOYON'S REFUSAL TO CONSENT BASED ON ITS OBJECTIONS TO DE-EXTINCTION IS COUNTER TO THE CBD'S OBJECTIVES.

According to Article 15(2) of the CBD[52], parties must not place restrictions on genetic resource access that run counter to the Convention's objectives[53]. However, Anecoyon's refusal to consent based on objections to de-extinction is counter to the objectives of conservation of biological diversity **[A]** and the sustainable use of its components**[B]**.[54]

A. Under Articles 8 and 9 of the CBD, the Refusal Is Counter to the Objectives of the Conservation of Biological Diversity.

Firstly, Article 8 of the CBD addresses the *in-situ* conservation of ecosystems, wild species, and genetic diversity[55], and sets out the main set of Convention obligations to conserve biological diversity[56]. Also, in some cases, the components of biological diversity can be conserved outside their natural habitats under Article 9[57]. Thus, these articles are important to ensure that integrative

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[50] Para. 16, record.
[51] Para. 21, record.
[52] Art. 15(2), CBD.
[53] Thomas Greiber, et. al., *An Explanatory Guide to the Nagoya Protocol on Access and Benefit-sharing*, International Union for Conservation of Nature and Natural Resources, 76 (2012).
[54] Art. 1, CBD.
[55] Art. 8, CBD.
[56] Thomas Greiber, et. al., *An Explanatory Guide to the Nagoya Protocol on Access and Benefit-sharing*, International Union for Conservation of Nature and Natural Resources, 39 (2012).
[57] Art. 9, CBD.

and coordinated measures are taken for species and habitat conservation and sustainable use[58].

Secondly, the use of de-extinction supports conservation and biodiversity[59]. Reintroduction through de-extinction also carries the potential to save dying ecosystems which lost a keystone species and have no available replacement[60], serving to present more options, highlighting the great gain to biodiversity the method provides[61].

Here, the extinction of the Royal Panther is likely due to overhunting by the Blytheae people[62], which strongly suggests that it did not become extinct due to unsuitable climatic conditions or other natural factors, but rather as a result of human destruction. Thus, there is a high probability that leopards could survive after reintroduction and protection, thereby enhancing biodiversity. Therefore, Anecoyon's demand for the return of fossils and abandonment of this project runs counter to the goal of protecting biodiversity.

B. Under Article 12 of the CBD, the Refusal Is Counter to the Objectives of the Sustainable Use of Species.

Article 12 of the CBD is concerned with research and training[63], the contracting parties shall establish and maintain programs for training in the identification, conservation, and sustainable

[58] Thomas Greiber, et. al., *An Explanatory Guide to the Nagoya Protocol on Access and Benefit-sharing*, International Union for Conservation of Nature and Natural Resources, 52 (2012).
[59] Jay Odenbaugh, *Philosophy and ethics of de-extinction*, Cambridge Prisms Extinction, 4 (2023).
[60] *IUCN SSC Guiding Principles on Creating Proxies of Extinct Species for Conservation Benefit*, IUCN Species Survival Commission, 2 (2016).
[61] Bob Fischer, et. al., *If De-Extinction Doesn't Satisfy, Why Not?* American Entomologist, 20 (2025).
[62] Para. 6, record.
[63] Art. 12, CBD.

use of biodiversity[64]. Education on what biodiversity is, why it is important for people, and how it can be conserved or sustainably used is essential if the loss of biodiversity is to be halted[65].

De-extinction could help to promote sustainable use of species. *Firstly*, it provides opportunities to study the long-term effects of future conservation applications while ensuring animal welfare[66]; *Secondly*, it catalyzes broader conservation efforts, attracting new funding and inspiring collaborative efforts among scientists, policymakers, and communities[67]. This creates a conservation flywheel where technological advancements and heightened public engagement mutually reinforce biodiversity preservation efforts[68]. *Moreover*, de-extinction provides opportunities to inspire new generations of conservation biologists, combining genetics, ecology, and ethics[69].

Here, Ridus has succeeded in the de-extinction project which two panthers were produced through this process[70], and they are raised in the Sidney Animal Park and exhibited to visitors[71]. The park, as both a scientific tool and a cultural touchstone, bridges the laboratory research and public

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[64] Elisa Morgera, et. al., *Nature Conservation: Natural Lands and Biological Diversity: B. Convention on Biological Diversity (CBD)*, Yearbook of International Environmental Law, 268-9 (2014).
[65] Bronwyn Arthur, *A Commentary on the Convention on Biological Diversity*, Victoria University of Wellington, 40 (1993).
[66] Stephen D. Turner, et. al., *De-extinction technology and its application to conservation*, Oxford University Press, 11 (2025).
[67] Kate Elizabeth Jones, *From dinosaurs to dodos: who could and should we de-extinct*, Frontiers of Biogeography, 22 (2014); *Colossal raises $200 million to bring back the dodo*, Nature Biotechnology, 155 (2025).
[68] Josh Donlan, *De-extinction in a crisis discipline*, Frontiers of Biogeography, 27 (2014).
[69] Stephen D. Turner, et. al., *De-extinction technology and its application to conservation*, Oxford University Press, 17 (2025).
[70] Para. 32, record.
[71] Paras. 33, 34, record.

engagement with biodiversity more relatable to diverse audiences. Therefore, Anecoyon's demand for the abandonment of de-extinction is counter to the Convention's objectives of promoting sustainable use of species.

III. DSI USED FOR DE-EXTINCTION ACTIVITIES IS NOT "BIOTECHNOLOGY" FOR PURPOSES OF THE CBD AND THE NAGOYA PROTOCOL.

Anecoyon alleges that the DSI derived from the Royal Panther fossil constitutes "biotechnology" under the CBD and the Nagoya Protocol, thereby triggering benefit-sharing obligations. However, DSI used for de-extinction activities does not constitute biotechnology according to treaty interpretation rules under Articles 31 and 32 of VCLT.

A. The Text's Ordinary Meaning of "Biotechnology" under Article 2 of the CBD and Nagoya Protocol Does Not Include DSI.

Particular provisions are to be interpreted to give them their fullest weight and effect consistent with the normal sense of the words.[72] Article 2 of the CBD and the Nagoya Protocol explicitly defines "biotechnology" as "any technological application that uses biological systems, living organisms, or derivatives thereof, to make or modify products or processes for specific use." [73] DSI is excluded because it does not originate from living organisms or their derivatives, as exemplified by its extraction from non-living fossils **[1]**, and its application in de-extinction activities does not involve making or modifying products or processes, since the outcome, the

[72] Malgosia Fitzmaurice et. al., *Treaty Interpretation and The Vienna Convention on The Law of Treaties: 30 Years On*, Martinus Nijhoff, 155 (2010); Sir Humphrey Waldock, Third Report on The Law Of Treaties, U.N. Doc. A/Cn.4/167 & Add.1-3, 55 (1964).
[73] Art. 2, CBD and Nagoya Protocol.

Royal Panthers, are organisms rather than products **[2]**.

1. DSI Does Not Come from Living Organisms or Their Derivatives.

The word "biotechnology", etymologically, comes from Greek, and "Bio" means "life"[74], which indicates that only when technology uses living cells or any of their components can it be considered as "biotechnology".

Article 2(e) of the Nagoya Protocol explicitly defines "derivatives" as "a naturally occurring biochemical compound resulting from the genetic expression or metabolism of biological or genetic resources."[75] "Genetic expression" refers to the flow of information from genes to proteins within living cells,[76] while "metabolism" encompasses the entire series of biochemical reactions essential for sustaining life.[77] The occurrence of these processes fundamentally presupposes the existence of living organisms.[78]

However, in this case, the DSI was extracted from a non-living fossil.[79] Fossils are the mineralized remains[80] of ancient organisms whose original life activities have long ceased, and they no longer undertake any genetic expression or metabolism. Therefore, the fossil itself does not meet the legal

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[74] Online Etymology Dictionary, available at <https://www.etymonline.com/cn/word/biotechnology>, accessed 1 Nov 2025.
[75] Art. 2(e), Nagoya Protocol.
[76] Shackelford, T.K. *Encyclopedia of Sexual Psychology and Behavior*. Springer Nature Switzerland AG, 1-7 (2024).
[77] *Black's Law Dictionary Online,* available at <https://thelawdictionary.org/metabolism/>, accessed 26 October 2025.
[78] CBD Working Group on ABS, *Report of the expert meeting on definitions*, UNEP/CBD/WG-ABS/7/2, paras 9-10, refers to 'organism's metabolism' in that regard.
[79] Para. 16, record.
[80] Rafferty, John P. *Geological Sciences; Geology: Landforms, Minerals, and Rocks*. New York: Britannica Educational Publishing, 6 (2012).

definition of a "derivative," and consequently, the DSI extracted from it inherently falls outside the scope of "originating from living organisms and derivatives thereof".

2. DSI Used for De-extinction Activities Does Not Make or Modify Products and Processes.

DSI used for de-extinction activities does not constitute the making or modification of "products or processes" because the resurrected Royal Panther is an organism, not a product.[81]

Firstly, regardless of the specific criteria employed, the ability to grow, reproduce, respond to stimuli, metabolism,[82] or individuality[83], in this case, the resurrected Royal Panther exhibits all the defining characteristics of an organism and should be recognized as an animal.

Secondly and similarly, animals created through cloning, which share the same objectives of restoring genetic lineages and protecting biodiversity with CRISPR-based de-extinction activities[84], have already been acknowledged as living entities within international frameworks.[85]

B. <u>The Context, Object, and Purpose of the CBD and Nagoya Protocol Clearly Differentiate the Regulatory Rules of Technology and Information.</u>

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[81] Para. 39, record.

[82] Jagers et.al., *Evolution and transitions in complexity. The science of hierarchical organization in nature*. Springer International Publishing AG, 49-50 (2016).

[83] Clarke, E. *Origins of evolutionary transitions.* Journal of Biosciences, 1-14 (2013); Pradeu, T. *Organisms or biological individuals? Combining physiological and evolutionary individuality*. Biology & Philosophy, 797-817 (2016).

[84] Para. 31, record.

[85] Scientific Opinion of the Scientific Committee on a request from the European Commission on Food Safety, Animal Health and Welfare and Environmental Impact of Animals derived from Cloning by Somatic Cell Nucleus Transfer (SCNT) and their Offspring and Products Obtained from those Animals, The EFSA Journal, 767 (2008).

When interpreting a treaty, it should be considered as a whole and in the context of the entire text.[86] An examination of the overall framework of the CBD reveals that its drafters intentionally treated "technology" and "information" as distinct matters of regulation, establishing separate rules for each.

Firstly, a treaty's preamble establishes the context for interpretation,[87] reflects the intentions of the parties,[88] and is necessary to understand the treaty's object and purpose.[89] The Nagoya Protocol Preamble emphasizes that the fair and equitable sharing of economic value is intended to be a key incentive for the conservation of biological diversity and the sustainable use of its components.[90] If the focus of benefit sharing shifts to intangible information, any incentives provided by the ABS mechanism to preserve physical ecosystems and species will be greatly reduced.[91] Moreover, the preamble also notes that the protocol acknowledges ongoing work in other international forums relating to access and benefit-sharing.[92] Regarding DSI in the plant field, the International Treaty on Plant Genetic Resources for Food and Agriculture ("ITPGRFA") establishes a Global Information System to facilitate the exchange of information,[93] instead of

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[86] Gardiner, Richard, *Treaty Interpretation*, 1st Edition, Oxford International Law Library, 7 (2010); Waldock, Third Report, Yearbook of the ILC, vol II, 55 (1964).
[87] Richard Gardiner. *Treaty Interpretation*, Oxford University Press, 205 (2015).
[88] Documents of the second part of the seventeenth session and of the eighteenth session including the reports of the Commission to the General Assembly, Yearbook of the ILC, 175, 220, U.N. Doc. A/CN.4/SER.A/1966/Add.1.
[89] Rights of National of the United States of America in Morocco (Fr. v U.S.), Judgment, ICJ Reports 1952, 176, 183-4, 197-8.
[90] Preamble, Nagoya Protocol.
[91] International Chamber of Commerce, Digital Sequence Information on and Benefit Sharing: ICC Submission to the CBD, 3 (2019). https://www.cbd.int/abs/DSI-views/2019/ICC-DSI.pdf.
[92] Preamble, Nagoya Protocol.
[93] Art. 17, International Treaty on Plant Genetic Resources for Food and Agriculture ("ITPGRFA"); Williamson, H.F., Leonelli, S. *Towards Responsible Plant Data Linkage: Data*

directly considering the DSI as biotechnology.

Secondly, the structural parallelism between Article 16 and Article 17 also provides evidence for the distinction. Article 16 emphasizes the access and transfer of "technology"[94] because the physical and biological materials have a value that can be transferred as part of the ABS transaction.[95] In contrast, Article 17 emphasizes the exchange of information from scientific research.[96] Here, "information" has a wide range, including knowledge, data, research results, and so on.[97] Open exchange of DSI can largely promote sustainable use and conservation of biodiversity.[98] However, an expansive interpretation of "biotechnology" to encompass DSI would severely hinder the exchange of vital scientific information.[99] In this case, DSI is, in essence, the "scientific research information" envisaged under Article 17. Ridus complied with the obligations of information exchange by making the DSI publicly available.[100]

C. <u>The Subsequent Practice Shows Contracting Parties Did Not Consider DSI as Biotechnology.</u>

Challenges for Agricultural Research and Development. Springer Nature Switzerland AG, 183-200 (2023).

[94] Art. 16, CBD.

[95] Roger Chennells et.al., *Indigenous Peoples, Consent and Benefit Sharing: Lessons from the San-Hoodia Case*, Springer Nature Switzerland AG, 78-9 (2009).

[96] Art. 17, CBD.

[97] Glowka, L, et al., A Guide to the Convention on Biological Diversity, IUCN Gland and Cambridge University Press, 92 (1996).

[98] International Chamber of Commerce, Digital Sequence Information on and Benefit Sharing: ICC Submission to the CBD, 2, 3 (2019). https://www.cbd.int/abs/DSI-views/2019/ICC-DSI.pdf.

[99] Royal Society Science Policy Center Working Group, Science as an Open Enterprise, Royal Society, 7 (2012); Jonathan Tennant et. al., *The Academic, Economic and Societal Impacts of Open Access: An Evidence-based Review*, 632 (2016).

[100] Para. 28, record.

To avoid restricting general terms to a single interpretation[101] and to take into account changes in interpretation over time[102], Article 31(3)(b) of the VCLT allows interpretation through subsequent practice by the parties.[103] In treaty interpretation, the terms of the treaty should be interpreted to give effect to the parties' intentions.[104]

Nowadays, a sound majority of parties to the CBD and the Nagoya Protocol do not even have domestic regulations that consider the use of digital sequence information as the utilization of the genetic resources.[105] Moreover, Australia[106] and Japan[107] explicitly object to this view. These subsequent practices may reflect the intention of the contracting parties that they don't consider DSI as biotechnology.

IV. SIDNEY ANIMAL PARK IS NOT A USER OF DSI ON GENETIC RESOURCES FOR PURPOSES OF CBD DECISION 16/2 AND THE SIDNEY ANIMAL PARK DOES NOT CONSTITUTE COMMERCIAL ACTIVITY COVERED BY A SECTOR CURRENTLY LISTED IN CBD DECISION 16/2.

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[101] Reservations to the Convention on the Prevention and Punishment of the Crime of Genocide, Advisory Opinion, ICJ Reports 1951, 15.
[102] Malgosia Fitzmaurice, *Dynamic (Evolutive) Interpretation of Treaties*, Hague Yearbook of the ILC, 101 (2008).
[103] Art. 31(3)(b), VCLT.
[104] Art. 31(4), VCLT; The Corfu Channel (U.K. v. Alb.), Judgment, Compensation, ICJ Reports 1949, 244; Application of the International Convention on the Elimination of All Forms of Racial Discrimination (Geor. v. Russ. Fed.), Preliminary Objections, Judgment, ICJ Reports 2011, 133-34.
[105] CBD, Ad Hoc Technical Working Group on Digital Sequence Information on Genetic Resources. Montreal, Canada, 27, CBD/DSI/AHTEG/2020/1/5.
[106] Digital Sequence Information on Genetic Resources: Submission of views and information and call for expression of interest to undertake studies Submission by Australia, (2019). https://www.cbd.int/abs/DSI-views/2019/Australia-DSI.pdf.
[107] Japan Views and information on the use of digital sequence information on genetic resources in the biodiversity field, (2017). https://www.cbd.int/abs/DSI-views/JAPAN-DSI.pdf.

Even assuming that DSI used for de-extinction activities constitutes "biotechnology", the Sidney Animal Park bears no obligation to contribute to the Cali Fund. Firstly, it is not a "user" of DSI because it does not utilize genetic resources **[A]**. Secondly, the Sidney Animal Park does not constitute commercial activity covered by a sector currently listed in CBD Decision 16/2 **[B]**.

A. The Sidney Animal Park Is Not a User of DSI on Genetic Resources Because It Does Not Utilize Genetic Resources.

"User" means a natural or legal person that utilizes genetic resources or traditional knowledge associated with genetic resources.[108] And the term "utilization of genetic resources" means to conduct research and development on the genetic and/or biochemical composition of genetic resources, including through the application of biotechnology as defined in Article 2 of the CBD.[109] Applications of biotechnology mean the application of scientific and engineering principles to process biological agents for the production of goods and services.[110]

However, in this case, Sidney animal park only engaged in animal conservation work, including providing habitats, implementing animal care,[111] and conducting rewilding projects[112], and has never involved research on their genetic composition or biotechnological development. Therefore, it does not qualify as a user of DSI.

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[108] Preamble (17), European Regulation No. 511/2014; Annex (a), CETAF Code of Conduct on Access and Benefit-Sharing (2018).
[109] Art. 2(c), Nagoya protocol.
[110] Robert Bud. *The Uses of Life: A History of Biotechnology*. Cambridge University Press, (1993).
[111] Paras. 33, 40, record.
[112] A4, clarifications.

B. The Context, Object, and Purpose of the CBD and Nagoya Protocol Clearly Differentiate the Regulatory Rules of Technology and Information.

Sidney Animal Park's operations fall outside the scope of the monetary benefit-sharing mechanism under the CBD. First, the Park's formal classification under internationally recognized standards places it in a category explicitly excluded from the indicative sector list under CBD Decision 16/2 **[1]**. Second, the essential nature and purpose of its activities are fundamentally non-commercial and aligned with core conservation objectives, a distinction recognized in analogous international frameworks **[2]**.

1. Sidney Animal Park Is Classified as a Zoological Garden under ISIC 9103, Which Does Not Fall in Any Sector Listed in Enclosure I of CBD Decision 16/2.

CBD Decision 16/2 explicitly provides an indicative list of sectors that may benefit directly or indirectly from the use of DSI on genetic resources.[113] Only users in these listed sectors conducted commercial activities are expected to contribute to the global fund in Enclosure I.[114] Article (b) of Enclosure VI specially states the indicative list of sectors has took into consideration the experience of the multilateral mechanism for the fair and equitable sharing of benefits from the use of DSI on genetic resources as well as new technical and commercial developments,[115] which shows that the list is restrictive and not expansive.

Notably, Article 2 of Enclosure I emphasizes the reference to the International Standard Industrial

[113] Art. 1, Enclosure I, Decision adopted by the Conference of the Parties to the Convention on Biological Diversity on 1 November 2024, CBD/COP/DEC/16/2 [*hereinafter* CBD Decision 16/2].
[114] Art. 2, 3, Annex, CBD Decision 16/2.
[115] Art. (b), Enclosure VI, CBD Decision 16/2.

Classification ("ISIC"), which provides an objective, internationally recognized framework for categorization.[116] The ISIC code 9103 is dedicated to Botanical and Zoological Gardens and Nature Reserves Activities,[117] which are separate from the ISIC codes that correspond to the sectors in Enclosure I.[118]

2. Sidney Animal Park Does Not Conduct Any Commercial Activities.

Under CBD Decision 16/2, only commercial users of DSI are encouraged to contribute.[119] But the Convention does not explicitly define the term "commercial activities,"[120] and in this absence, instructive guidance can be drawn from analogous international frameworks.[121] CITES Resolution 5.10 defines an activity that can generally be described as commercial if its purpose is to obtain economic benefit[122], and is directed toward resale, exchange, provision of a service, or any other form of economic use or benefit.[123] However, from the beginning, the purpose of the Sidney animal park's activities is conservation and rewilding **[a]**, and to the outcome, all economic benefits are used for providing habitat and caring for the animals **[b]**.

a. <u>The purpose of the Sidney animal park's activities is conservation and rewilding.</u>

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[116] Art. 2, Enclosure I, CBD Decision 16/2.
[117] ISIC Code 9103, Botanical and Zoological Gardens and Nature Reserves Activities, available at <https://siccode.com/isic-code/9103/botanical-zoological-gardens-nature-reserves-activities>, accessed 27 Oct 2025.
[118] Para. 40, record.
[119] Art. 2, 3, Annex, CBD Decision 16/2; Para 41, record.
[120] Definition of 'primarily commercial purposes', CITES Resolution 5.10 (Rev. COP19), 1.
[121] Guidelines to Assist in the Preparation of Institutional Policies Based on the "Principles on Access to Genetic Resources and Benefit-Sharing", Australian National Botanic Gardens (2000).
[122] Dispute Regarding Navigational and Related Rights (Costa Rica v. Nicaragua), ICJ Reports 2009, 244.
[123] Art. 1(b), Definition of 'primarily commercial purposes', CITES Resolution 5.10 (Rev. COP19).

Purpose is defined by Black's law dictionary looks to designs or goals of programs.[124] The purpose of introducing the two panthers to the park was to provide habitat and near-term care for the animals,[125] constituting the initial *ex-situ* phase of the rewilding initiative in cooperation with the Ridus government.[126] Sidney Animal Park operated in the style of a safari park,[127] which provides a transitional environment for this rewilding project. In addition, the long-term objective is reintroducing subsequent panther generations into a government-protected reserve,[128] which is not a recent justification but has been evidenced by the Park's record, including the prior successful reintroduction of captive-born white rhinoceros to a designated area in Africa.[129]

b. Sidney Animal Park is operated by a non-profit corporation and all economic benefits are used for providing habitat and caring for the animals.

Sidney Animal Park is operated by a non-profit corporation, and has been accredited by the World Association of Zoos and Aquariums.[130] And the revenue, including the specific panther-viewing fees, is legally and practically committed to covering the substantial costs of animal care, habitat provision, and supporting captive breeding programs for other species.[131] Notably, the additional panther-viewing fees are approved by the Ridus government for care and provision of habitat for the two panthers,[132] as they do not belong to Sidney animal park but are state property according

[124] Bryan A. *Black's Law Dictionary*, West Publishing, 1271 (2004).
[125] Paras. 33, 40, record.
[126] Paras. 33, 35, record.
[127] A2, clarifications.
[128] Para. 36, record.
[129] A4, clarifications.
[130] Para. 33, record.
[131] Para. 35, record.
[132] Para. 33, record.

to the domestic law of Ridus.[133] The fact that an institution charges admission fees does not automatically render its activities commercial.[134] Any excess funds are directed towards conservation, not distributed as profit, which demonstrates that revenue generation is a means to achieve a conservation end, not an end in itself.

Moreover, members of the Panthera can see these panthers for free.[135] And the planned wildlife tourism project is explicitly designed to be operated by the indigenous Panthera communities.[136] These measures guarantee the fair rights of indigenous people to access benefits from the de-extinction activities, which comply with the purpose of the CBD.[137]

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[133] Para. 32, record.
[134] Annex (a), CETAF Code of Conduct on Access and Benefit-Sharing (2018).
[135] Para. 34, record.
[136] Para. 36, record.
[137] Preamble and Art. 8(j), CBD.

CONCLUSION AND PRAYER FOR RELIEF

Respondent, Ridus, respectfully requests the Court to adjudge and declare that:

1. Ridus has complied with all applicable obligations under the Convention on Biological Diversity and the Nagoya Protocol, including those relating to prior informed consent and access to genetic resources;
2. Anecoyon's refusal to consent to the de-extinction of the Royal Panther is inconsistent with the objectives of the CBD, including the conservation of biological diversity and the sustainable use of its components;
3. Digital Sequence Information used for de-extinction activities does not constitute "biotechnology" within the meaning of the CBD or the Nagoya Protocol;
4. The Sidney Animal Park is not a user of DSI on genetic resources under CBD Decision 16/2, nor is it engaged in commercial activity within any sector listed therein;

Consequently, Ridus bears no obligation to share monetary or non-monetary benefits with Anecoyon in relation to the de-extinction of the Royal Panther.

Respectfully submitted,

AGENTS FOR THE RESPONDENT