

IPBES template for the submission of requests, inputs and suggestions on short-term priorities and longer term strategic needs that require attention and action by IPBES as part of its future work programme.

UNESCO CHAIR ON SUSTAINABILITY

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Date of submission:

Submission from: IPBES member: Angela Maria Moreno Barros

Observer allowed enhanced participation in line with decision IPBES-5/4: use indigenous and local knowledge and request the Multidisciplinary Expert Group, with the support of the task force on indigenous and local knowledge systems

MEA(s): _____

United Nations body: UNESCO Chair of sustainability – Universitat Politècnica de Catalunya

Expert on, and holder of, indigenous and local knowledge: Angela Maria Moreno Barros

Other Stakeholder(s): _____

Please provide the following information for any request and, where relevant, for any inputs and suggestions (additional attachments can also be submitted):

Request/input/suggestion:

Information to accompany requests submitted to the Platform (see also Decision IPBES-1/3 Procedure for receiving and prioritizing requests put to the Platform):	
1.	Relevance to the objective, functions and work programme of IPBES: In the Plenary of the Intergovernmental Scientific-normative Platform on Biodiversity and Ecosystem Services, held in Bonn (Germany) from March 7 to 10, 2017. The topic "Indigenous and Local Knowledge Systems. In which, in decision IPBES-4/3, the plenary approved the procedures for using indigenous and local knowledge systems. Therefore, a project is proposed that seeks the recovery of the Intangible Cultural Heritage of the Zenúes indigenous people, associated with the management of water cycles, through the implementation of Appropriate Ancestral Hydro technologies, for the adaptation to extreme weather events with episodes of drought , and for the control of floods in rainy seasons, guaranteeing food security and the

	improvement of production systems, which increase economic income and improve the quality of life of communities in the region.
2.	<p>Urgency of action by IPBES in the light of the imminence of the risks caused by the issues to be addressed by such action:</p> <p>The Zenúes Indians carried out the greatest hydraulic work known in pre-Columbian America, with practical results that today fill us with astonishment. They were superior to their contemporaries of the territories that today make up Mexico, Peru, Ecuador, Bolivia, Surinam and Venezuela, and began their activity, according to the archaeologists Roy Schelmon and James Parsons, with innovative and later perfected techniques of water management in the area of Bajo San Jorge, which later spread to the rivers of the Sinú, Cauca and Magdalena rivers, as well as to that immense interior delta that integrates what is now known as 'Depresión Momposina'. They understood the zenúes, the process of gradual sinking of the watery lands of the 'Depresión Momposina', which according to scientific calculations of geologists is located at a rate of 0.9 and 2.5 mm per year, pre-flooding, of the that they were only victims five times in the two thousand years when they controlled the area, building their houses on elongated artificial platforms three to four meters high, according to the archaeological analyses of clayey strata, that vestiges have remained about the behavior of water levels in such periods.</p> <p>All this knowledge is in danger of extinction, for this reason measures are proposed to safeguard the material and immaterial heritage of the Zenú community, and also to put into practice techniques and knowledge that help to face the problems that today are unfortunate in the current societies and for this community were a blessing.</p>
3.	<p>Relevance of the requested action in addressing specific policies or processes:</p> <p>The project seeks the recovery of the Intangible Cultural Heritage of the Zenúes indigenous people, associated with the management of water cycles, through the implementation of Appropriate Ancestral Hydro technologies, for the adaptation to extreme climatic events with episodes of drought, and for the control of floods in rainy seasons, guaranteeing food security and the improvement of production systems, which increase economic income and improve the quality of life of communities in the region.</p>
4.	<p>Geographic scope of the requested action, as well as issues to be covered by such action:</p> <p>According to DANE statistics, in the department of Córdoba for the year 2016, poverty reached an incidence of 44.8%, much higher compared to the national average (28.0%), placing this department as one of the poorest in the region and the country. In this context, the experience gained in approaching the most needy communities and maximizing the positive impacts that can be generated in the local-regional context is fundamental, through the design and implementation of strategies that favor innovation processes. environmental and socio-economic, allowing sustainable development.</p> <p>In this particular project, it is intended to work in the Molina township, belonging to the municipality of Tuchín, Córdoba (located within the zone considered Zenu Ancestral Territory), articulating synergies between institutional, community and academic actors, to recover the traditional knowledge of This ethnic group, by means of a pilot model that incorporates and adapts the technologies related to its hydraulic systems, to the current context of adaptation to extreme climatic events, with episodes of drought and for flood control during the rainy season; thus improving the conditions to guarantee the food security of the communities of the region and generate profitability from the start-up of productive projects, decreasing the associated poverty rates.</p>
5.	<p>Anticipated level of complexity of the issues to be addressed by the requested action:</p> <p>The proposal consists in the recovery of ancestral knowledge and its application for the solution of the problems generated by floods and droughts nowadays. For this reason, tasks will be carried out in different areas: geological, anthropological, economic, cultural, engineering,</p>

	among others, in order to be able to cover the Zenú culture from different scenarios and understand their practices.
6.	<p>Previous work and existing initiatives of a similar nature and evidence of remaining gaps, such as the absence or limited availability of information and tools to address the issues, and reasons why IPBES is best suited to take action:</p> <p>Several entities, universities, organizations, among others, have been working for a few years on the recovery and implementation of zenu knowledge, on the management of their hydraulic system, which aims to solve the problems of floods and droughts. Colombian territory every year. One of these great examples is the agreement made in 2011 between the National University (U.N.) and the National Planning Department to carry out studies on the modeling of hydraulic flows and propose alternatives for territorial development and territorial planning plans.</p> <p>There are recognitions to projects that seek to recover the traditions, knowledge and ancestral practices. Like the recognition by the Botanic Gardens Conservation International network, to a project headed by Doris Benítez. Which I recover hectares in the department of Antioquia, for the cultivation of cane arrow, in addition, of included in the school curricula activities and studies, in order to preserve the identity of the Zenú culture.</p> <p>BioCaribe is developing activities that allow processes to restore the natural system in 5 ecosystem and social corridors, Paramillo - Acandí, Paramillo - Bajo Sinú, Corchal - Los Colorados and Coral of Rosario - Gulf of Morrosquillo, which have allowed to restore more than 60 km of water rounds and generate sustainable productive projects benefiting more than 1,000 families. Likewise, 1,284 hectares that contribute to ecosystem connectivity have sustainable production plans.</p> <p>There are several initiatives, projects carried out among other activities, which have the objective of recovering the material and immaterial heritage of the Zenú culture, but there is still a lot of work to be done, since it is a culture that was almost extinct, with knowledge and practices that nowadays it would give solution to environmental and food problems that are the daily life of the Colombian territory. But unfortunately during the time of the colonization of the Spanish to America, many of the manuscripts containing their knowledge were burned and destroyed.</p>
7.	<p>Availability of scientific literature and expertise for IPBES to undertake the requested action:</p> <p>Archaeological research has been carried out by groups of experts including Clemencia Plazas, Ana María Falchetti, Juanita Sáenz Samper and Sonia Archila, thanks to the sponsorship of entities such as the Gold Museum and Cerromatoso SA, they have managed to unravel the techniques of the Zenú Hydraulic Society, as is the work that summarizes his work, published by the bibliographic collection of the Banco de la República. Also, they have analyzed the fruitful work of these pre-Columbian ancestors, who without so many illusions or technical elements managed to overcome a hostile environment, taking into account the limitations of the time in which they had to live, which they knew how to get profit, using the natural environment without damaging it; contrary to what happened with the unjustly named 'civilization' that arrived with the Spanish conquest, which in less than five hundred years threw overboard a huge, but at the same time simple effort of sustainable coexistence with the environment, of which the Zenos were authentic teachers.</p>
8.	<p>Scale of the potential impacts, and potential beneficiaries of the requested action:</p> <p>The planned activities aim to achieve the objectives set, to influence the strengthening of the Zenú identity in relation to the agricultural practices associated with the management of water cycles in its territory and its consequent economic development at the local-regional scale. Among the main results of the project are the development of a demonstration pilot in the body of water that links ancestral knowledge with sustainable technologies, guaranteeing agricultural and aquacultural production with added value, and appropriate conditions for its commercialization. Taking into account a characterization of solid waste and basic sanitation</p>

	<p>conditions of the community, design and implementation of environmental strategies and indicators. As well as, an accompaniment to the population in initiatives of entrepreneurship and business formulation, this in order to turn the region into a national model of community eco-development, sustainable and low carbon, reducing the local unemployment rate , with the generation of new jobs linked to the diversification of community development, improving the quality of life and, at the same time, strengthening the processes and institutions of local indigenous governance.</p>
9.	<p>Requirements for financial and human resources, and potential duration of the requested action:</p> <p>The alliance presented is aimed at promoting the development of the region in the medium and long term. We have consolidated strategic partners of the public and private sector, specialized in different topics to carry out this project. Efforts, resources, and capacities of the parties of the alliance will be added to boost processes that, from the economic point of view, the social and environmental cohesion; they can forge profits tending to a sustainable development. This is possible, by leveraging the institutional offer from the local, regional and national levels.</p>
10.	<p>An identification of priorities within multiple requests submitted:</p> <p>The discovery of such culture and methods has awakened in the scientific and governmental circles of the world, as in the case of the Dutch government, which has proposed alternatives for the recovery of the hydraulic science of the Zenu, as a way of rescuing a space of the most suitable for the agro-pisci-industry in the world, there has not yet been a clear policy on the part of the public administrations that after the flood someone helps them to not be poorer than before, in contrast to what happened with their Zen ancestors, who took advantage of the floods and silty sediments left by them.</p>
11.	<p>Any other relevant information (including a list of any attachments provided):</p>