

Call for proposals

Caribbean Research: a multi-disciplinary approach

2016 2nd call for proposals

Contents

1	Introduction		1
	1.1	Background	1
	1.2	Available budget	1
	1.3	Validity of the call for proposals	1
2	Aim	1	2
3	Guidelines for applicants		
	3.1	Who can apply	3
	3.2	Project consortium	3
	3.3	What can be applied for	4
	3.4	When can applications be submitted	6
	3.5	Preparing an application	6
	3.6	Specific conditions	6
	3.7	Submitting an application	7
4	Assessment procedure		
	4.1	Procedure	8
	4.1.1	Eligibility of proposals	8
	4.1.2	Evaluation of applications	8
	4.1.3	Funding decision	9
	4.1.4	Timetable	9
	4.2	Criteria	9
5	Contact details and other information		11
	5.1	Contact	11
	5.1.1	Specific questions	11
	5.1.2	Technical questions about the electronic application system ISAAC	11
6	Annexes		12
	6.1	Scientific context	12
	6.2	Topics of local and regional interest	16
	6.3	The Caribbean Netherlands Science Institute (CNSI) at St. Fustatius	18

1 Introduction

1.1 Background

Since the constitutional reform in 2010, Bonaire, Sint Eustatius and Saba are municipalities of the Netherlands. As a consequence the Dutch government is directly responsible for these Caribbean islands and the marine system surrounding them. The islands of Aruba, Curaçao and Sint Maarten in contrast are autonomous countries within the Kingdom of the Netherlands. As part of an initiative to stimulate research on and about the Caribbean islands of the Kingdom, The Netherlands Ministry for Education, Culture and Science (OCW) funded the NWO-programme "Caribbean Research: a multi-disciplinary approach".

This is the second call for proposals within the framework of this programme. The NWO-division Earth and Life Sciences (ALW) is responsible for carrying out the call. The divisions Humanities and Social Sciences have contributed to the development of the call and will be involved in its implementation.

1.2 Available budget

The total budget available for this call amounts to a maximum of M€ 4.6.

1.3 Validity of the call for proposals

This call for proposals is valid until the closing date May 31, 2016, 14:00 hrs. (CET).

2 Aim

The NWO-programme Caribbean Research: a multidisciplinary approach aims at:

- strengthening the scientific knowledge base on and about the Caribbean islands of the Kingdom of the Netherlands;
- encouraging collaboration and partnerships between Dutch research institutions and Caribbean partner organizations;
- fostering sustainable development and innovation in the Caribbean region
- contributing to regional capacity development by engaging regional individuals (e.g., scientists, students, professionals, citizens) and organizations in joint research projects.

This call for proposals addresses issues of local and regional interest and suggests innovative ways to foster sustainable development in the broadest sense of the word. The focal area of this call for proposals are the six Caribbean islands of the Kingdom of the Netherlands. Research proposals must relate to questions and issues relevant to one or more of these islands. Projects may nevertheless consider a wider area in the Caribbean region. In this second call for proposals applicants are required to collaborate with individuals and organizations from one or more Caribbean islands of the Kingdom of the Netherlands.

Research projects should be framed within the context of "Small Island Developing States" (SIDS) which is an internationally recognized concept endorsed by the United Nations. Although the Caribbean islands of the Kingdom of the Netherlands are not considered SIDS this concept is highly relevant for the whole insular Caribbean region characterized by specific challenges and vulnerabilities with respect to environmental, economic, socio-cultural and public health issues. A more detailed description of the framework and themes for this call for proposals can be found in appendix 6.1. In addition, applicants are encouraged to build on the topics of local and regional interest which were identified during an informal consultation of stakeholders from the Caribbean islands of the Kingdom of the Netherlands (appendix 6.2).

Capacity development, knowledge sharing and outreach activities specifically aimed at the Caribbean region will be considered essential elements in all proposals. Bridging disciplinary borders, especially between the natural/technical sciences, social sciences and humanities, creating links between different types of research (academic and applied), and effectively joining two or three circles of the people-planet-profit space (for details see appendix 6.1) will contribute to funding success.

3 Guidelines for applicants

3.1 Who can apply

Each proposal has a principal applicant who is subject to the general NWO $\underline{\text{terms}}$ and conditions 2015^1 for granting.

Researchers from the following knowledge institutions can act as principal applicant and submit proposals:

- Dutch universities:
- NWO and KNAW institutes;
- the Netherlands Cancer Institute;
- the Max Planck Institute for Psycholinguistics in Nijmegen;
- researchers from the DUBBLE Beamline at the ESRF in Grenoble;
- Naturalis Biodiversity Center;
- Advanced Research Centre for NanoLithography (ARCNL);
- UNESCO-IHE Institute for Water Education²;
- Royal Netherlands Meteorological Institute (KNMI)¹;

The following rules apply to principal applicants:

- Principal applicants must hold a doctor's degree and/or be professor;
- Principal applicants must have a paid appointment with one of the abovementioned institutions for at least the duration of the application process and the proposed research project;
- The salary of the principal applicant cannot be financed from this grant;
- Scientists holding a zero-time position and emeritus professors cannot act as principal applicants.

The principal applicant has to submit the application on behalf of the project consortium and is responsible for the scientific cohesion of the whole project, the results as well as for the financial accounting.

Within this call a researcher may submit no more than two applications, and may only submit once as the principal applicant. This means that he/she can act as the principal applicant for one application and may act as co-applicant for another application, or may act as co-applicant for two different applications.

3.2 Project consortium

Consortia applying for funding must consist of at least two different partners that include:

- the principal applicant, employed by a Dutch knowledge institution (see 3.1);

¹ It is possible that the English version of this document is not yet available when this call for proposals is published. We refer to the Dutch version in the meanwhile and the English version will become available soon.

² Researchers from these institutions can submit a proposal provided that the proposed project contains a cooperation with a university or KNAW/NWO research institute. The active cooperation must be apparent from contributions by the university/research institute to the proposed research project, in terms of personnel or material.

 at least one partner from a not-for-profit organization³ based on a Caribbean island of the Kingdom of the Netherlands, hereafter called "primary Caribbean partner(s)".

Additional consortium partners are welcomed and encouraged:

- researchers from Dutch knowledge institutions (see 3.1) may act as coapplicants;
- other partners from public or private organizations based on a Caribbean island of the Kingdom of the Netherlands;
- any Dutch or international private or public organization.

All consortium members have to be involved in the formulation of the research questions, in the development of the proposal and in the execution of the research project. A letter of commitment from all consortium partners is required. The proposal should explain the relevance of participation of each consortium member. Evidence of active engagement of consortium members will be an important element in the assessment of project proposals and may be demonstrated through:

- references to involvement in project preparation;
- active involvement as partner(s) during the execution of the project;
- links between the proposed research project and ongoing projects of regional institutions, authorities, NGOs, and/or policy implementation.

All organisations participating in a consortium must be registered as a legal person.

3.3 What can be applied for

The maximum amount of funding which can be requested is k€ 600 per proposal.

The funding can only be used for:

- I. Personnel costs (60-80% of the requested budget)
 - a) Salaries for PhD students and post-docs in the Netherlands
 Salaries for temporary scientific personnel (PhD students, post-docs)
 employed by a Dutch knowledge institution which is part of the applying consortium. These personnel costs are funded in accordance with the latest version of NWO-VSNU agreement on salary costs (see online salary tables);
 - b) Salaries for PhD students and post-docs based in the Caribbean Salaries for temporary scientific personnel (PhD students and post-docs) employed by a knowledge institution based on a Caribbean island of the Kingdom of The Netherlands. The regulations and salary scales of the employing institution should be guiding for determining the amount of salary;
 - c) Salaries for other personnel based in the Caribbean Salaries for personnel other than PhD students or post-docs at a not-forprofit organization based on a Caribbean island of the Kingdom of the Netherlands (referred to as Caribbean personnel). The regulations and salary scales of the employing organization should be guiding for determining personnel costs. Salaries in this category must not exceed the maximum gross (before tax) fulltime monthly rates of € 2500 for support staff, € 4000 for junior staff and € 6000 for senior staff.

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³ For instance: research and (higher) education institutions, public entities and NGO's.

d) Bench fee

For each appointed PhD and post-doc (in the Netherlands and in the Caribbean region), a bench fee of maximum € 5000 is made available as a contribution to the researcher's personal costs of carrying out the project⁴;

II. Material costs

- a) Equipment and consumables (max. 25% of total personnel costs) Costs necessary for carrying out the proposed research, such as small instruments and consumables. The added value of each material costs item must be explained in the application. Funding cannot be requested for standard equipment such as computers, standard software and other standard facilities for research departments.
- b) Travel costs (max. 10% of the requested budget)

 Travel expenses and accommodation costs for the principle applicant, coapplicants, appointed PhD students and post-docs, other researchers who are members of the applying consortium⁵, and for all not-for-profit consortium partners based on a Caribbean island of the Kingdom of The Netherlands. Travel expenses for consortium partners are excluded from all other categories and covered only via this category.
- c) Capacity development, knowledge sharing and outreach (5–10% of the requested budget)
 - Capacity development and training activities directed towards individuals and groups other than the junior researchers (PhD students, post-docs) directly involved in the project, such as developing courses for stakeholders, professionals or students on one or more Caribbean islands of the Kingdom of the Netherlands;
 - The organization of at least one master class, workshop, communication activity in the Caribbean region, dissemination of results and organization of international events.

Each proposal must contain at least one temporary research position (PhD student or post-doctoral researcher) at a Dutch knowledge institution and a minimum employment of Caribbean personnel.

The minimum employment for PhD students is 1.0 FTE for four years. The minimum employment for post-doctoral researchers is 0.5 FTE for two years. The maximum employment for post-doctoral researchers is 1.0 FTE for three years. The total duration of a project is at least two years and not more than five years.

The minimum total employment by Caribbean personnel should be equivalent to 0.2 FTE over the duration of the project. This total effort may be the sum of multiple

⁴ The bench fee is intended to provide a stimulus for the scientific career of the PhD / post-doc working on the project and can, for instance, be used for the thesis defense and printing costs, travel to and attendance of conferences, courses and publication.

⁵ Only members of the applying consortium employed by organizations listed under 3.1. can apply for travel costs.

personnel and may be concentrated during a period between the beginning and end of the project.⁶ Applicants are encouraged to involve regional personnel above the minimum requirement formulated above.

The project proposal should explain how it will plan, organize and budget the foreseen activities

3.4 When can applications be submitted

The closing date for submission of proposals is May 31, 2016, 14:00 hrs. (CET).

Applications that are submitted after the deadline will not be included in the procedure.

3.5 Preparing an application

Your application consists of the application form and a letter of commitment from each consortium partner.

- Download the application form for this call from the electronic application system <u>ISAAC</u> or from NWO's website (on the <u>grant page</u> for this programme);
- Complete the application form;
- Save the application form as a pdf file and upload it in ISAAC;
- Upload the commitment letters in ISAAC.

When preparing your application please take into account that the proposal will be read and evaluated both by expert reviewers and an independent international assessment committee.

3.6 Specific conditions

Consortium and partners

The composition of the consortium should comply with the criteria provided in paragraph 3.2. The research institute employing the principle applicant will take responsibility for the secretarial duties, the day-to-day management and financial affairs of the project. The principle applicant represents the consortium and will act as the point of contact in dealings with NWO.

Awarded projects must provide a fully completed and signed Collaboration Agreement before the start of the project. NWO provides a template for the Collaboration Agreement.

General guidelines and conditions:

The 'NWO regulation on granting $2015^{1/2}$, and the 'Agreement on Payment of Costs for Scientific Research' are applicable to applications.

⁶ Example: in a project with a duration of four years two people could work for 0.2 FTE during the first two years or 0.1 FTE for the whole duration of the project.

NWO Code of Conduct regarding Conflict of Interests:

The 'NWO Code of Conduct regarding Conflict of Interests' applies to all persons and NWO personnel involved in the assessment and decision-making procedure for this call for proposals.

Nagoya Protocol:

The Nagoya Protocol became effective on 12 October 2014 and ensures an honest and reasonable distribution of benefits emerging from the use of genetic resources (Access and Benefit Sharing; ABS). Researchers who make use of genetic sources from the Netherlands or abroad for their research should familiarize themselves with the Nagoya Protocol (www.absfocalpoint.nl). NWO assumes that researchers will take all necessary actions with respect to the Nagoya Protocol.

Start of the project

The project starts within half a year after the grant has been awarded and after the Collaboration Agreement has been signed and forwarded to NWO. The project starts by appointing the first PhD student or post-doctoral researcher. If the project does not start within this time frame, the awarded research grant can be withdrawn.

3.7 Submitting an application

An application can only be submitted to NWO via the online application system <u>ISAAC</u>. Applications not submitted via ISAAC will not be considered. A principal applicant must submit his/her application via his/her own ISAAC account. If the principal applicant does not have an ISAAC account yet, then this should be created at least one day before the application is submitted to ensure that any registration problems can be resolved on time. If the principal applicant already has an NWO-account, then he/she does not need to create a new account to submit an application.

When you submit your application to ISAAC you need to enter several additional details online. Make sure you allow enough time for this.

For technical questions please contact the ISAAC helpdesk, see Section 5.2.1.

⁷ It is possible that the English version of this document is not yet available when this call for proposals is published. We refer to the Dutch version in the meanwhile and the English version will become available soon.

4 Assessment procedure

4.1 Procedure

The procedure does not include a pre-proposal stage. The NWO Earth and Life Sciences Board will nominate an independent international assessment committee that will evaluate the proposals. The committee will consist of renowned, international experts with relevant backgrounds, preferably familiar with the Caribbean region.

The assessment committee is an advisory body of The NWO Earth and Life Sciences Board. The committee will advise on the quality and prioritization of the proposals, according to the criteria mentioned in section 4.2. The NWO Earth and Life Sciences Board issues a decision to grant or reject the applications.

The <u>NWO Code of Conduct on Conflicts of Interest</u> applies to all persons and NWO staff involved in the assessment and/or decision-making process.

NWO gives all full proposals a <u>qualification</u>. The qualification will be made known to the researcher in the same letter in which he or she is also informed about NWO's decision whether or not to award funding.

4.1.1 Eligibility of proposals

The first step in the assessment procedure is to determine the admissibility of the application. NWO will do this using the conditions stated in Chapter 3 of this call for proposals.

Applications will only be considered eligible and taken into further consideration if:

- the application form has been filled out in a correct and complete way, or the principle applicant has complied with the request to submit a corrected version of the application in time;
- the application is written in English;
- the principle applicant meets all criteria given in section 3.1;
- the consortium meets all criteria given in sections 3.2;
- the requested budget meets all criteria given in section 3.3;
- the application is consistent with the purpose and themes of this call;
- the application is submitted via ISAAC;
- the application is submitted before the deadline;
- the project can start within six months after the grant has been awarded.

In cases where it is possible to correct the application, the applicant shall be given 48 hours to modify the application. If the application is not corrected by the relevant deadline, it shall not be considered for assessment. If the corrected application is approved, it shall be selected for further assessment.

4.1.2 Evaluation of applications

The evaluation procedure consists of three phases:

A. Applications selected for further assessment are sent to independent experts for peer review. At least two international referees are to issue an assessment report for each proposal, based on the applicable criteria (see section 4.2).

- B. Applicants are given the opportunity to respond to the referees' comments by means of a short, written rebuttal, addressed to the international assessment committee.
- C. The assessment committee shall use the proposal content, the external referee reports and the rebuttals to make an independent assessment of each application. The assessment committee may reach conclusions that differ from the judgment by referees, as the panel analyzes and compares all applications, reviews and rebuttals. The members of the assessment committee shall discuss all applications during a meeting, using the applicable criteria (see section 4.2) as a basis. The meeting will result in a recommendation regarding the ranking of all applications.

4.1.3 Funding decision

The NWO Earth and Life Sciences Board takes a decision about granting based on the advice of the assessment committee. The Board has the right not to use the entire budget, depending on the number and quality of the applications.

4.1.4 Timetable

18 February 2016	Publication call for proposals and event at Naturalis
31 May 2016	Deadline for submitting proposals
June - July 2016	Consultation referees
August 2016	Applicants may submit rebuttals
September 2016	Assessment committee prioritizes applications
October 2016	Board of ALW takes funding decision

Allocation of funds

4.2 Criteria

All applications are evaluated according to a fixed set of criteria described below. The two main criteria will be considered equally important. Each of the criteria will be scored on the following nine-point scale: Excellent = 1; Very good = 3, Good = 5; Moderate = 7; Poor = 9. Projects eligible for funding must reach a score of "very good" or higher on both main evaluation criteria.

Evaluation criteria for applications

I. Originality and scientific quality

October/November 2016

- Originality and innovative aspects, potential to generate new knowledge and insights;
- Scientific quality of the proposal regarding aims and objectives, approaches and methods, effectiveness and feasibility;
- Scientific quality of the applying consortium: national and international links, publications, expertise, access to necessary equipment and facilities.
- II. Regional relevance and impact, capacity development:
- Relevance for the Caribbean, in particular for the islands of the Kingdom of the Netherlands;

- Urgency and appropriateness in terms of the thematic context described in Annex 6.1 and Annex 6.2;
- Prospects for research uptake and potential for short and/or long-term application of the envisaged research results in the Caribbean region;
- Degree and quality of collaboration, added value of links with/among regional organizations, institutions and facilities;
- Quality and added value of the capacity development strategy; potential for improving the capabilities of individuals and institutes to learn and innovate, the ability to share knowledge and create a supportive research and learning environment;
- Quality and added value of the communication and outreach plan; contribution to the development of a Caribbean knowledge network; adequacy and feasibility of the communication strategy;
- Potential for long-term knowledge relations among consortium partners.

5 Contact details and other information

5.1 Contact

5.1.1 Specific questions

For specific questions about this call for proposals please contact:

Dr. J.F. Stuefer, telephone: +31(0)70-349 44 72 Dr. N. van den Berg, telephone: +31(0)70-349 44 05

E-mail: alwcariben@nwo.nl Link: www.nwo.nl/cariben

5.1.2 Technical questions about the electronic application system ISAAC

For technical questions about the use of ISAAC please contact the ISAAC helpdesk. Please read the manual first before consulting the helpdesk. The ISAAC helpdesk can be contacted from Monday to Friday between 10:00 and 17:00 hours CET on +31 (0)900 696 4747. Unfortunately, not all foreign telecom companies support calling to 0900-numbers. However, you can also submit your question by e-mail to isaac.helpdesk@nwo.nl. You will then receive an answer within two working days.

6 Annexes

6.1 Scientific context

Small Island Developing States (SIDS)

Research projects should be framed as much as possible within the context of Small Island Developing States (SIDS) which is an internationally recognized concept endorsed by the United Nations¹. Not all Caribbean islands, including the Dutch Caribbean, are on the UN list of SIDS. Nevertheless, this concept is highly relevant to the whole insular Caribbean, a region dominated by small island states and territories which face specific vulnerabilities inherent to their size and developing status. Although islands are characterized by a small size and restricted numbers of people, population densities are relatively high and the availability of natural resources is limited, resulting in specific challenges with respect to **environmental**, **economic**, **socio-cultural** and **public health issues**.

Economically, SIDS are characterised by extreme dependence on external energy resources, international trade, mono-economies, high costs of public administration, transport, communication and infrastructure, as well as limited opportunities to develop economies of scale. Social vulnerabilities of SIDS relate to small populations, social and economic inequalities, high costs and limited diversity of educational facilities, epidemiological transition, migration and brain drain. Colonial and post-colonial developments have resulted in complex internal and external political and cultural dynamics.

Resilience is at stake in terms of environment and human health as well as from an economic, social, political and cultural perspective. Given this high impact, there is less room for error in SIDS than in other countries and regions.

Due to small, scattered populations of biological species and high levels of genetic unicity, biological resources are generally threatened. Their sustainable management is a major challenge as most resources, as well as human population and economic development, are concentrated in the coastal zone. This calls for an integrated approach addressing crucial interactions between land and sea, people and nature. Biological resources as well as cultural heritage are also vulnerable to climate change, sea-level rise and natural calamities such as hurricanes. Moreover, many Caribbean islands currently lack appropriate legislation to effectively protect these resources.

Sustainability (people-planet-profit)

Research projects should support sustainable development in a broad sense. For development to be sustainable it needs to be integrated in a socio-cultural, economic and environmental context. Sustainable development may be portrayed as the intersections between three general focal areas (Figure 1), implying that sustainable development can only be realized by integrating the interests of people, planet (environment) and profit (economy). Proposals with a critical and innovative look at synergies and conflicts between economic, biodiversity and socio-cultural perspectives are welcomed as they can both enable win-win situations and address trade-offs that are part of societal choices affecting sustainable development. In addition, there is a need to address how society deals with environmental systems, not only with respect to the impact of humans on the natural system but also by accounting for the ways in which humans relate to their natural environment.

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https://sustainabledevelopment.un.org/topics/sids

People – Challenges of small-scale Caribbean islands: governance, public health, education, heritage and identity

Some 7500 years after colonization by continental indigenous populations and just over 500 years after European conquest, the insular Caribbean is a distinct ecological and culture area, both unified and partitioned by centuries of migrations, slavery and racial divides, (de)colonization, creolization and globalization. The contemporary Caribbean faces environmental degradation and is characterized by small-scale, dependent economies, socioeconomic and cultural inequalities in terms of public health and education, diversity of post-colonial political arrangements and ethnic, cultural and linguistic heterogeneity.

Research proposals should have the potential for making a significant contribution to the sustainable development of the insular Caribbean, for instance with respect to the following themes:

- Major challenges to our understanding include the quality and functioning of local governance, how to build on best practices developed in the region and how to take into account the particular challenges of governance in non-sovereign SIDS at large. What is the role of government, communities and other sectors of civil society, how do they interact to create economic and environmental sustainability in island settings?
- What are the economic and sociocultural challenges to public health and how can locally suitable health care systems be enhanced and sustainable prevention strategies be implemented?
- How can formal and informal education best face the challenges of multilingual insular societies, characterized by their small scale, intensive migrations and historical patterns of underachievement?
- What were, and are the consequences of the intense migrations, colonialism and slavery on the socioeconomic development of small-scale insular societies, on social cohesion, as well as on insular and group identities, kinship and gender issues?
- Practices and debates on cultural heritage management and how these are affected by local, regional and transnational, as well as colonial and postcolonial power relations and identities.

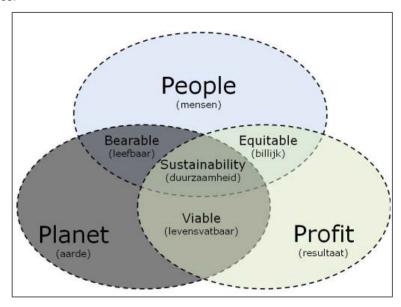


Figure 1: People-Planet-Profit. The three core areas and their intersections depicted in this figure provide the main realms for which projects will be considered.

ii This is a non-exhaustive list of subjects; proposals are not restricted by this list of topics.

2. Planet - Small island ecosystems

Caribbean islands are known for their high species richness. Terrestrial and fresh water fauna and flora are characterized by high species concentrations with many unique elements, depending on each island's size, climate, topography, geology, and degree of isolation. Because islands are small land masses with relatively long shorelines, coastal ecosystems form an integral part of island life. Besides supporting biodiversity, these unique island ecosystems provide many services. Coral reefs, mangroves and seagrass beds provide nutrition and coastal protection for island communities. They attract large numbers of tourists as dive sites and are a source of sand for white beaches. Tourists are further attracted by the unique landscapes and by the cultural and historical heritage these islands have to offer.

Research proposals should focus on optimizing the use of ecosystems while preventing loss of their functions and services by human developments. Examples of relevant issues are:

- The limited size of small islands ecosystems makes them and the human populations they support, vulnerable to climate change effects such as sea level rise, coral bleaching, drought, and salt water intrusion, which may undermine livelihoods related to sectors such as tourism, agriculture and fisheries.
- High numbers of tourists challenge food security by depleting local resources (agriculture, fisheries) and cause pollution.
- Deforestation, overgrazing and land development projects lead to habitat degradation, erosion and loss of valuable nutrients. Run-off as a result of these activities negatively affects coastal ecosystems.
- Maritime economic activities impact on habitats by harbour constructions and facilitate the settlement of non-native species.
- Overexploitation of limited freshwater resources and lack of wastewater treatment result in water scarcity, spreading of waterborne diseases and deterioration of water quality.
- Endemic island species usually occur in small populations and are easily replaced by nonnative species. Exotic species can cause damage to local crops or cattle, or act as vectors for diseases and become dangerous for human health.

3. Profit - The challenge of creating profit at small islands

Profit is the economic value created by companies and organizations for society at large, going beyond the internal profit made by these entities. The profit dimension in Figure 1 is also used as a synonym for recent concepts such as green economics, ecosystem services and natural capital. Because of its societal nature, profit can be generated by individuals, businesses, nonprofits and government entities alike.

Given the unique characteristics of small islands, creating profit is generally more challenging than in larger economies. Small populations, limited resources, relative remoteness and expensive infrastructure, susceptibility to natural disasters, the inability to develop larger markets, vulnerability to external shocks, excessive imports dependence, and fragile environments constrain the opportunities for sustainable development. Therefore, the impact of environmental change will be far more significant compared to larger countries and will affect ecosystems as well as economic sectors such as fisheries, tourism, mining, maritime transportation and the offshore finance and insurance industry. For example, tourism is the single largest earner of foreign exchange in many islands in the Caribbean region, including the Dutch Caribbean. The main challenge is to develop a mature economy with the necessary infrastructure while simultaneously sustaining the island attractiveness to vacationers.

The economic and environmental dynamics faced by small islands provide opportunities as well as threats for building local resilience to these changes. Possible responses in the Dutch Caribbean

Chapter 6: Annexes /

include land-use planning and conservation zoning, promoting entrepreneurship, and community based management. The challenges in defining effective responses lie in the context in which these measures should be implemented, taking into account the local specificities of each island. Moreover, maximizing profit will often require entities to think differently than in the past, thereby abandoning old paradigms. Finally, to design adaptation strategies, full understanding of economic, cultural and environmental changes is crucial, taking into account the various scales (e.g. comanagement at the local level, regional partnerships at trans-boundary level).

6.2 Topics of local and regional interest

Results of informal consultation

When preparing this call for proposal, NWO conducted an informal consultation of stakeholdersⁱⁱⁱ from the islands of the Kingdom of the Netherlands in order to identify topics of high local and regional interest. The list of topics presented below is neither exhaustive nor exclusive. The list aims at providing applicants with specific information on local and regional needs and wishes with respect to this call. Applicants are encouraged to build on this valuable source of information when preparing their proposals^{iv}. All topics mentioned below can be embedded in the scientific context of SIDS and Sustainability (people–planet–profit).

Social & Economic Issues | Small Islands

- Causes and consequences of youth unemployment and migration (immigration and emigration) incl. brain drain and retaining knowledge workers;
- Economic, social and institutional resilience of 'Small Island States';
- Entrepreneural ecosystems and leadership in small communities;
- Political dynamics, governance and jurisdiction in small communities, constitutional arrangements;
- Circular economy and ecological footprint, responsible innovation;
- Importance of socio-cultural differences between the European and the Caribbean part of the Netherlands.

Education & Identity

- Multilingualism, language problems especially in primary and secondary education;
- Participation in education, quality and yield, incl. alignment with the labor market;
- Cultural identity and self-image, cross-cultural competencies, (social) history, migration, self-determination, racism and slavery;
- Learning society, life-long learning, sustainability of education system;
- Tangible and intangible cultural heritage, incl. (underwater) archeology.

Sustainability

- Sustainable agriculture and horticulture, fisheries and aquaculture (incl. cross-overs with healthy diet, nutrition);
- Integral water management, drinking water, cisterns, irrigation, waste water and flooding;
- Generation and use of sustainable energy sources, reduction of fossil energy dependence;
- Sustainable waste management;
- Socio-economic aspects of sustainable tourism, including medical tourism;
- Small scale as a challenge for sustainability^v.

Value of Nature

Nature conservation and nature restoration;

- Biodiversity conservation, under water and on land, incl. invasive species issues;
- Ocean acidification and pollution, incl. impact on corals;
- Migration of whales and sharks, importance of shark sanctuary;
- Social acceptance of nature protection and environmental management.

iii Research and education institutions, local authorities, and others.

^{iv} Proposals dealing directly or indirectly with one or more topics on this list will not automatically receive higher scores. However, they may more easily earn interest and support from Caribbean partners thereby facilitating the compulsory regional embedding of projects.

^v E.g., how to realize sustainable services (such as waste management and others) on a very small scale

Chapter 6: Annexes /

Health

- Healthy nutrition: availability, acceptance, costs of healthy food;
- Dealing with / reducing obesity and diabetes;
- Vector transmitted diseases such as Chikungunya, Dengue.

6.3 The Caribbean Netherlands Science Institute (CNSI) at St. Eustatius



Introduction

The Ministry of Education, Culture and Science (OCW), through the Netherlands Organisation of Scientific Research (NWO), set-up and developed the Caribbean Netherlands Science Institute at St Eustatius (CNSI). The institute has a multifunctional objective. It serves a facilitating role for research and education for a wide spectrum of disciplines, relevant for a sustainable socioeconomic and ecological development of St Eustatius and the Caribbean Netherlands, and the wider Kingdom of the Netherlands and the Caribbean in general. The objective is to realise a permanent Netherlands scientific presence in the Caribbean, serving capacity building and sustainable development. CNSI is enabled by the NIOZ Royal Netherlands Institute for Sea Research and aims to facilitate all relevant scientific disciplines (marine and terrestrial; natural sciences, life sciences, social and economic sciences and humanities) for basic, strategic, applied and societal and policy relevant research.

Functions

The function of CNSI is to make available facilities for research, education and outreach, and to support related activities. The facilities of the institute include (see also www.cnsi.nl):

- a) Office and working space
- b) Laboratory space and equipment (basic equipment, auto analyser for the analyses of ammonium, phosphate, silicate and nitrite/nitrate in (sea) water, Coulter for particle size distribution, (epi-fluorescence) microscopes and binocular microscopes, dryer, freeze dryer, refrigerator, freezer, (analytical) balances)
- c) Outside mesocosm facility with running sea water (filtered and unfiltered) and service laboratory
- d) Test field for e.g. agricultural experiments
- e) (Class) room for workshops, colleges, education, etc.
- f) Exhibition space
- g) IT facilities, Multimedia facilities
- h) (Electronic) Library / information facility
- i) Means of transport (bicycles, car, boat)
- j) Accommodation



Based on these facilities, the institute provides assistance for and facilitation of:

- a) Research projects
- b) Legally liable research tasks
- c) Courses, training and education
- d) Meetings, exhibits, excursions



Mission

The mission of the institute is:

- 1) To strengthen the cooperation between the Caribbean and the European part of the Kingdom of the Netherlands, involving local, regional and international partners and knowledge networks focussed on the region;
- To offer a (public) visitors centre and a meeting place for Caribbean Netherlands stakeholders, local organisations, scientists, lecturers, local and Netherlands government delegates;
- 3) To maintain accommodation and a research and education base for scientists, students and lecturers, for fundamental, strategic, applied and societal and policy relevant research, outreach and education;
- 4) To foster capacity building by providing the infrastructure for (nature) education for local schools, nature organisations and farmers, academic and vocational education / training, and organising courses, workshops and meetings in cooperation with local organisations;
- 5) To encourage a sustainable socioeconomic impulse in the region.



Ambition

The ambition is to develop CNSI as an authoritative expert and facility centre in the north eastern Caribbean, acknowledged in the Caribbean Netherlands and the wider Caribbean region, positioned at the intersection of science, research, education, management and governance. This ambition will be reached when the institute starts functioning as entry point and liaison office for CNSI-relevant activities in the Caribbean, and when it is actively involved in and contributes to research and management of knowledge domains relevant to the Caribbean region.

In addition CNSI aims to contribute to strengthening of the cooperation between the Caribbean islands in the fields of nature conservation, education, management and research and where possible to contribute to legally liable research tasks and to support sustainable socioeconomic development of the Dutch Caribbean islands.

Organisation

CNSI serves the wider scientific and educational communities. It is governed by Royal NIOZ, assisted by a Steering Group consisting of representatives of relevant (academic) institutions. CNSI staff consists of a director, administrative support, a laboratory assistant, domestic staff and field assistance.

Besides, CNSI has a User Group assisting the director with advice relevant for the development of research facilities, and outreach and education activities.

Relevance for NWO research programme

With respect to research projects financed by the NWO Caribbean Programme CNSI can play an important role in supporting, facilitating and organising research activities:

- 1) It provides accommodation for researchers during their stay at St Eustatius;
- 2) It provides work space and laboratory facilities;
- 3) It provides ICT facilities (including video conferencing);
- 4) A car and a boat are available for research at the island and its coastal waters;
- 5) Through its Caribbean network it may mediate in organising research facilities that are not available at CNSI, e.g. larger research vessels, submarine and specific laboratory facilities at other Caribbean institutions;
- 6) If sufficient demand exists it may invest in relevant additional research infrastructure and equipment;
- 7) Specific equipment can (temporarily) be installed and used at the institute;
- 8) It may support laying out (outdoor) experimental set-ups;
- 9) Samples could (temporarily) be stored (dry, cool, frozen).



For using its facilities CNSI will charge a moderate and in cases negotiable fee.

More information is available from http://www.cnsi.nl/

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