



DIRECTORATE OF TERTIARY EDUCATION
BILINGUAL HIGHER EDUCATION
MINISTRY OF EDUCATION AND
TRAINING OF VANUATU

CALL FOR EXPRESSIONS OF INTEREST

Introducing a Bilingual University Degree Program in the Field of Environmental Science

DATE OF PUBLICATION: APRIL 30TH, 2019

DATE AND TIME OF CLOSING: JUNE 28TH, 2019, 4 PM VANUATU TIME

Table of Content

A.	Context	3
В.	Eligible Institutions	4
C.	Submission of Proposals	4
D.	Evaluation Criteria	5
E.	Terms and Conditions of program attribution	5
 E	Annovos	6

A. CONTEXT

The Directorate of Tertiary Education of the Ministry of Education and Training of Vanuatu has been given the mandate to develop bilingual university courses in partnership with regional and international higher education institutions in accordance with the principles of the 2016-2030 National Sustainable Development Plan and the 2016-2020 Policy on Post-School Education and Training (PPET or PEFP in French). To this end, the Directorate of Tertiary Education is launching this invitation of expression of interest in order to select one or more academic institutions likely to offer or contribute to the teaching and implementation of a bilingual French-English Bachelor's degree located to Port Vila (Vanuatu) in the following area:

Environmental Sciences

The choice of the establishment of this Program of study is justified by the need to train competent local managers and science-conscious officials in the particularly vulnerable context of Vanuatu, ranked the most vulnerable country in 2016 by the World Risk report, because of the natural disaster risks of the area and the effects of climate change.

B. ELIGIBLE INSTITUTIONS

In the framework of this Call for Expressions of interest, priority will be given to universities that will demonstrate the ability of delivering a Degree Program, the contents of which will cover the areas listed below:

- > The award of a university Bachelor's degree program which can be jointly accredited with the Vanuatu National University
- > Structure your academic training proposal in such a way it is able to attract regional and international partnership (through university consortium and joint accreditation and awards)
- Academic program to be taught in English and French languages, with provision to enrol and integrate all students coming from national education system through language strengthening mechanisms
- Contextualised multidisciplinary academic program offering a common core of learning in biology, chemistry, geology, mathematics and computer science as well as cross-cutting courses in the field of project management, data analysis and processing, spatial information management systems, environmental legal aspects and traditional knowledge.
- An academic program that enables the offer of optional subjects towards a particular major or specialisation in its final year (Year 3)
- A Degree Program that naturally graduates students for post-Graduate studies (Master's Degree and PhD levels) A Degree Program that makes provision for practical internship training, with opportunities for university mobility

C. SUBMISSION OF FILES

The application file must be drawn up in agreement with the president of the university, whose reasoned opinion is requested as an appendix to the application.

Projects can be submitted by June 28th, 2019, 4 PM, Vanuatu time

The file should be sent by e-mail to the Tertiary Education Director to the following address:

atjiobang@vanuatu.gov.vu

An electronic copy of the file should be sent to:

metsanp@vanuatu.gov.vu

avivier@vanuatu.gov.vu

D. **EVALUATION CRITERIA**

The offers will be instructed by the Directorate of Tertiary Education of the Ministry of Education and Training of Vanuatu which will bring together for the occasion a jury composed of members of the various public departments concerned.

The criteria applied during the selection of the university or universities will be available upon request.

E. TERM OF PROJECT ATTRIBUTION

The results of the call for applications will be sent to universities by email by August 9th, 2019.

F. ANNEXES

- 1. Lien vers le plan national de développement durable du Vanuatu 2016-2030
 - https://www.nab.vu/sites/default/files/event_attachments/Day%202%20-%20NSDP%20Presentation.pdf
- 2. Synthèse de l'atelier national du 26 septembre 2018
- 3. Profils de diplômés

SYNTHESIS

Consultation Workshop on the implementation of a Bachelor in Environment in the framework of the creation of the Vanuatu National University

Wednesday 26th September

Participants

- Brooks Rakau, Geology and Mines Unit
- Richard Shing, Vanuatu Kaljoral Senta
- Christopher Bartlett, Climate Change SPC/GIZ
- Gordon Willie, Lands, Survey and Registry
- Fabrice Tevanu, former physics teacher in Year 14
- Rodenas Taveu Baereleo, Department of environment
- Erickson Sammy, Department of water Resources
- Fremden Shaddrack, Vanuatu skills partnership
- Gwen Tari, Department of Agriculture and rural Development
- Felicity Nilwo, CDU/MoET
- Vincent Lebot, CIRAD/VARTC
- Wycliff Bakeo, DSPPAC
- Willy Missack, Oxfam
- Georges Maeltoka, Tertiary Directorate, MoET
- Pierre Metsan, PEO Higher Education, MoET
- Anne-Sophie Vivier, MoET

This consultation workshop on the implementation of a Bachelor in Environment has been organized by the Tertiary Directorate of MoET in order to identify key priorities sectors which should constitute the foundation of the course.

Three questions were asked to groups of participants. Below is a synthesis of the answers given by the three groups.

1. What are the needs in your sector?

The areas mentioned are:

- Hydrology
- Hydrogeology
- Agriculture economics
- Econometrics
- Project Management
- Land use planning
- Sustainable resource management
- Management of introduced/invasive species
- Control and Management of pesticides
- Transformative adaptation
- Biochemistry
- Climate change
- GIS and mapping
- Policy development and analysis
- Applied Research
- Environmental monitoring: methodology, data collection, data analysis, data presentation
- Traditional knowledge
- Education and culture
- Resident Specialist specific flora and fauna fields

2. For which types of jobs?

The participants gave a list of jobs which is not exhaustive:

- Hydrogeologist
- Hydrologist
- Water quality analyst
- Biochemist
- Agriculture economist
- Econometrist
- GIS specialist and mapping officer for all sectors
- Geologist
- Volcanologist
- Seismologist
- Environmental engineer
- Soil scientist
- Environmental legal officer
- Hydraulic engineer
- Data analyst
- Project manager
- Planner environmentalist

- Teacher
- Protected areas manager
- Farm production manager
- Eco-tourism specialist
- Technicians in biology: artificial insemination, plant breeding, aquaculture, silviculture
- Technicians in social environment
- Botanist
- Marine biologist
- Ornithologist

3. How the Bilingual French-English aspect can be implemented in the course delivery?

The participants who were not linguistic specialists, gave some interesting ideas about how to implement bilingualism:

- Recruit bilingual lecturers English/ French, ni-Vanuatus lecturers and tutors
- Implement a semester of intensive English for francophones/ Intensive French for Anglophones
- Provide the possibility for the students to deliver their assignment in the language they are comfortable with
- Anticipate a pre-exposure through Alliance française course participation, strengthening French/English courses in both primary and secondary
- Provide adhoc English or French lessons throughout the program
- Promote Research in bilingual ways

Summary

All participants agreed on the necessity to extend sciences in Higher Education at a national level.

For the implementation of the Bachelor in Environment, they mentioned the need to provide solid fundamentals all along the three years by including in the curriculum compulsory courses in Biology, Chemistry, Physics and Statistics. In addition, optional courses can be chosen by students depending on their wish for career guidance.

All participants also agreed that this Bachelor degree should be designed as an applied training, emphasizing on practical and applied Research.

There were also comments on the need to create pathways from vocational and technical trainings which are provided by VIT or others.

GRADUATE PROFILE

Department of Climate Change

Professional Profile

- Environmental engineer
- Environmental lawyer
- Conservation Scientist
- Legislators
- Climate change specialist
- Environmental protection specialist
- GIS Specialist
- Data analysts
- Environmentalist

Core skills

- Analytical
- Interpretation of historical and future climate change trend for the world, pacific and Vanuatu
- Report writing
- Research skills
- Negotiation
- Scientific analysis
- Problem solving
- Innovative thinking
- Good with statistics

Specialties

- Understanding changes impacts, effects and adaptive and mitigated initiatives to climate change
- Knowledge on legal groundings for climate change matters
- Knowledge on environmental conservation and protection with regards to climate change
- Scientific analysis on climate change data for future projections within local context
- Promoting policies to protect the environment and reduce environmental issues such as climate change
- Developing ways to reduce or prevent pollution and improve the health of the planet and its inhabitants
- Researching climate change and developing ways to protect the environment

GRADUATE PROFILE

Vanuatu Fisheries Department

Professional Profile

- Coastal Fisheries Management
- Aquaculture specialist/ mariculture specialist
- Marine/Fisheries Biologist
- Fisheries Data Analyst
- Fisheries Economist
- Fisheries Risk Analyst
- Fisheries Project Manager
- Fisheries Spatial specialist GIS specialist

Core skills

A Graduate should be able to offer sound knowledge of coastal fisheries management and development:

Technical skills and knowledge on Fisheries science and data management Technical skills and knowledge on Fisheries investment and Development

Specialties

- Provide best advice to coastal fisheries management
- Can analyse data and provide understandable information for public
- Computer literate and software skills
- Can produce quality report
- Data management

GRADUATE PROFILE

Vanuatu Meteorology and Geo-Hazard Department

Professional Profile

- Geophysician
- Seismologist
- Volcanologist
- Tsunami scientist
- Risk analyst
- Geologist
- Geothermal specialist
- Geochemist
- Land Surveyor
- Satellite imagery analyst
- Climatologist
- Meteorologist
- Geospatial analyst
- Earth scientist

_

Core skills

On successful completion of the Bachelor of Environment, the graduate should be able to:

- Monitor and Forecast volcanic eruptions and identity potential hazards
- Determine potential seismic hazards and inform on earthquake parameters
- Provide guideline in Tsunami evacuation planning
- Assess and inform on Tsunami, earthquake and volcano impact
- Climatologist: data analyst, research, communication, software skills, climate prediction
- Meteorologist: weather map analysis, weather prediction, software skills
- Geospatial analyst: GIS skills, data analyst, communication, software skills

Specialties

- IT skills
- Computer programming
- Telecommunication engineering
- Geographical Information system
- Database management and archive
- Sampling methodology
- Webmanagement
- Climatologist: climate science, climate change science
- Meteorologist: climate science, weather system
- Geospatial analyst: GIS, Geography, Development