STATE PROJECT IMPLEMENTATION UNIT NATIONAL CYCLONE RISK MITIGATION PROJECT PHASE-II DEPARTMENT OF DISASTER MANAGEMENT & CIVIL DEFENCE GOVERNMENT OF WEST BENGAL

Tran Bhawan, 5th Floor, 87 A, S. N. Banerjee Road, Kolkata 700 014 Ph. No.: 033-2264-0275/2214-3526, Fax: 033-2214-1378, Email: sencrmp2@gmail.com Date: 11.12.18 Advt No:10/DM/SPIU/NCRMP-II/18

World Dank towards the cost of National Cyclone Risk Mitigation Project Phase - II (NCRMP - II) and it intends to apply the proceeds to payments for goods, works related services and consulting services under this Project. 2. The Government of West Bengal is also recipient of the credit and the West Bengal State Project Implementation Unit, Department of Disaster Management & Civil Defence, Government of West Bengal will implement the relevant component of the Project in West Bengal, 3, State Project Implementation Unit, Department of Disaster Management & Civil Defence, Government of West Bengal

is inviting applications for the position given in the table below, 4. Expected closing date of the project is 15th March, 2021and the staff for this project will be selected based on contract/ co-terminus with the project. However, the continuation will be subject to review, 5. Increment of salary during this period will be completely based on involvement in the project, performance and output. SI No Designation No. of Post Salary in Rs /Month

01. 140.	Designation	140. 01 1 000	outury in resumonan
1.	GIS Specialist	01 (One)	₹ 30,000.00
General Conditions: 1. Details on Qualification and Scope and Nature of work for the Post mentioned above will be available on the website www.wbdmd.gov.in. 2. In all cases, experience in any World Bank Assisted / International Agency funded project / Project preparation cell will be preferred 3. Persons working in Government / Public Sector Undertakings / Autonomous Organizations should submit their application through proper channel. 4. Candidates will have to produce the proof of details furnished in their applications, in original, as and when required 5. Applications received after due date, unsigned applications, applications without mentioning the post for which applied, applications not followed by the copy through proper channel (wherever applicable) and applications incomplete in any respect, will not be considered. 6. Only Indian Nationals needs to apply. 7. Canvassing in any form will be a			
disqualification. 8. It may be noted that if, at any stage, it is discovered that an attempt has been made by			
the applicant to wilfully conceal or misrepresent the fact, his / her candidature will be summarily rejected			
or his / her employment terminated. 9. The applications must be sent in neatly hand written or typed out			
A4 size paper. 10. Interested qualified persons may send applications to the above mentioned address			

Sd/-Project Director, SPIU, NCRMP-II, Disaster Management & Civil Defence Department Govt. of West Bengal

within 30(thirty) days upto 17.00 hrs on 15.1.19.

The Government of India has received financing in the amount of US\$ 270 million equivalent from the

OFFICE OF THE PROJECT DIRECTOR SPIU, NCRMP II DISASTER MANAGEMENT & CIVIL DEFENCE DEPARTMENT GOVT. OF WEST BENGAL TRAN BHAVAN, 5TH FLOOR

87A, S. N. BANERJEE ROAD, KOLKATA-700 014 PH. 033 2264-0275

Email id -sencrmp2@gmail.com,Website: www.wbdmd.gov.in NATIONAL CYCLONE RISK MITIGATION PROJECT - Phase -II Project ID: P144726

Terms of Reference (TOR) for hiring GIS Specialist in proposed World Bank funded NCRMP -II (P144726)

1. Background

- oThe Government of India has initiated a number of initiatives to reconcile the aims of protection of life and livelihood of coastal communities; conservation of ecological resources in the coastal and marine areas; and, promotion of economic activities that have necessarily to be located in the coastal regions. As one of the different initiatives, the Government of India along with the respective State Governments is implementing a World Bank financed project called the "National Cyclone Risk Mitigation Project" (NCRMP-II). The Project has specific objectives to support the long-term vision of the Government by (a) building national capacity for implementation of National Cyclone Risk Mitigation Project approach in the country, and (b) piloting the approach in the states of Gujarat, Orissa and West Bengal. The National Component of the Project focuses on expanding the institutional capacity and knowledge base needed for National Cyclone Risk Mitigation Project. The State Components include capacity building at the state level, preparation of National Cyclone Risk Mitigation Infrastructures, and a range of complementary local pilot investments.
- oThe coastal districts of West Bengal are vulnerable to severe cyclonic storms. South 24 Parganas, North 24 Parganas and PurbaMedinipur experience frequent tropical cyclones, having disastrous consequences on the lives of human beings as well as animal population of the region. It must be mentioned here that the vulnerability due to cyclones cannot be determined solely by its frequency of occurrence, the vulnerability depends on associated storm surge, coastal inundation or flooding and socio economy of the affected region.
- oThe Sundarban Delta Complex which has geo-genetic link to the tectonic Bengal Basin known for its startling coastal landforms that include back dunal mudflats, back swamps, saltmarshes and tidal creeks enshrouded with mangrove vegetation, low gradient supratidal and intertidal shores with mud bank, swales and berms, rivulets, tidal flats etc. However despite the mind boggling floral and faunal diversity Sundarban is very much vulnerable to natural hazards e.g. storm surge, flood, tidal wave, cyclone etc. Moreover due to rising sea level, the existing coastline is retreating at alarming rate which is symptomatic to some impending natural catastrophes. The inhabitants of the Sundarban estuary probably have acclimatized themselves how to live on facing the nature's wrath. Sundarban is still recuperating from the brunt of Cyclone Aila that devastated thousands of hectares of once fertile agricultural land adjoining the mangrove forests into a wasteland. The loss of human life and property is beyond any estimation in real terms. The aftermath of these kinds of cyclones and storm surges is on the livelihood of the people at large as due to the ingress of saline sea water into the lush green fertile fields used for paddy cultivation, these tracts of land rendered useless for any kind of agricultural activities.
- oThe NCRM Project understands that fructification of the project can be done only when the people living on the vulnerable coastal zones can be safeguarded to a certain extent from the natural calamities like flood, cyclone, hail storm, thunder squall and sometimes even to tsunamis that occurred due to geo-morphological, climatic and seismic conditions.
- o After the enactment of Disaster Management Act, 2005, there has been a major shift in the disaster management strategy of this State Government from a relief centric response to a composite approach based on preparedness, prevention & mitigation.
- o Department of Disaster Management& Civil Defence, Government of West Bengal (DoDM&CD) has been entrusted with the construction, operation and maintenance of the proposed Multi-Purpose Cyclone Shelters (MPCS) as envisaged in the NCRM Project (Phase II). The estimated cost of the project is around 621crores. Department of Disaster Management has been assigned this project component because it plays a pioneering role in establishing necessary systems, structures, programs, resources, capabilities for reducing disaster risks in the State in order to save human lives andproperty, avoid disruption of economic activity and damage to environment and also to ensure the continuity and sustainability of development.

oThe construction of MPCS will not only pave the way for increase the communities resilience during calamity, but also opening avenue for social coordination and enhanced the capacity to shoulder responsibility by operating the shelters in a gainful pro-social way.

oThe MPCS has a multi-pronged approach in catering to the needs especially of the disadvantaged sections of the populace through a string of activities such as:-

- a) Minimization of loss of lives, property and livestock by providing it shelters during cyclone calamity
- b) MPCSs will act nodal points for receipt and dissemination of cyclone warnings
- c) MPCSs will provide the warehousing facilities of essential stocks/ items for post disaster usage
- d)The nodal points for carrying out post disaster response and relief activities will be from MPCSs
- e) MPCSs will also provide temporary protection from the heavy downpour during the monsoon and also from the scorching heat during the summer to the shelter less people
- f) Basic health services like immunization programmes can be administered through these MPCSs
- g) MPCSs will act as models for safe construction in vulnerable seismic zones.
- 2. Expected closing date of the project: 15th March, 2021.
- **3. GIS Infrastructure –** Departmentof Disaster Management& Civil Defence,GoWB is the PMU to manage all the work relating to construction of 150 Multi-Purpose Cyclone Shelters under NCRMP-II Project in the eighteen coastal blocks namely- Gosaba,Basanti,Kultali,Mathurapur-II,Kakdwip,Patharpratima,Namkhana and Sagar of district South 24 Parganas;Hasnabad, Minakhan,Sandeshkhali-I,Sandeshkhali-II,Hingalganj of district North 24 Parganas and Ramnagar-I,Ramnagar-II,Deshpran,Contai-I and Khejuri-II of district Purba Medinipur. The PMU requires extracting different GIS and remote sensing based information from the available resources.For this purpose, the PMU needs to have the services of a GIS expert for the project on purely temporary and contractual basis.

4. Educational qualification & Experience

BE/B.Tech.in Computer Science/IT/Electronics or Post Graduate Qualification in IT/Computer Science with minimum six years' experience including two years' experience preferably in GIS related projects in Environment/Disaster Management/Tourism

OF

Master degree in Geo-informatics with minimum four years' experience preferably in GIS related projects in Environment/Disaster Management/Tourism

OR

Bachelor degree in Geo-informatics with minimum six years' experience preferably in GIS related projects in Environment/Disaster Management/Tourism.

5. Desirable

- (i) PG Diploma in Computer Application,
- (ii) Good oral and written communication skills. Passionate and confidant Team worker Ability to work effectively as a team member.

6. Statement of objectives and deliverables:

- Prepare site wise map of each mouza of completed, ongoing and proposed MPCS.
- Link village information and inputs with maps and conduct analytical thematic map and analysis as required by the senior officers.
- Analyze remote sensing satellite data and carry out change detection based on baseline data.
- Give active support to SPIU, NCRMP-II, West Bengal for its day to day work.
- Demarcate position of MPCS, Villages, GPs covered under NCRMP-II.

7. Scope of work:

- Geo-referencing & Fusion of LISS-III- PAN Data received from NRSC, Prepare Land use /Land cover maps of areas under NCRMP-II & other areas as may be specified.
- Demarcate position of MPCS, Villages, GPs covered under NCRMP-II project. Locations/areas where
 these project/schemes are being implemented have to be updated regularly. As and when
 information is received, the database shall be updated for further use.
- Carry out change detection in NCRMP-II area using RS data procured from NRSC.
- Rectify the divisional maps of NCRMP-II as per field verification.

- Prepare MPCS wise map of each location of NCRMP-II project and printing them at required scale. Develop GIS related strategy.
- To perform integrated and computerised Geographic data systems analyses to address specific issues/problems of the cyclone / flood affected areas of West Bengal.
- Plan and develop GIS related information system on the web. Quarterly performance report to be prepared for appraisal.
- Any other project related work assigned by PIU.

8. Schedule for completion of tasks:

All works should be completed within stipulated time limit. Time of completion of each work may be overlap to one another.

9. Data, services and facilities to be provided by the Client:

As consultant has to work at the premises of this SPIU office and make field visits to all project area as needed. In no case he or she will be allowed to carry any data outside the premises withoutwritten permission of authorities.

10. Final outputs (reports) that will be required of the consultant:

Data in form of Coverages, Shape files, Geodatabase of all areas covered through this assignment has to be generated/edited and updated. Hard copies of maps will be given to field staff or any other person only after permission of SPIU.

11. Duration of assignment

- The candidate selected for the assignment is expected to commence work within three working daysafter the announcement of result.
- The staff for this Project will be selected based on contract / co-terminus with the Project. However, the continuation will be subject to review.
- The assignment will be initially for 12 months and may be extended for a further period of one yeardepending on the Performance, output and involvement in the Project.

12. Terms of Payment

Consolidated remuneration of Rs.**30,000**/- in respect of the services performed during the Term of Contract, at the end of every calendar month based on the satisfactory report from concern authority.

Allowances, costs & expenses:

- Allowances will be paid as and when the employee is on tour as per the rule forced by GoWB
- No other perks & allowancesadmissible.

13. Other conditions of contract

- 1. The employee shall be responsible for arranging his own residential accommodation, medical expenses and insurance.
- 2. The employee shall not claim absorption in any Government Establishment.
- 3. The employee shall be entitled to leave as follows with prior approval of the Project Director or his authorised Officer:
- i. Sick leave based on medical certificate and evidence.
- ii.Casual leave for a maximum of 10 days for every calendar year. Anything beyond10 days shall be onlypermitted without payment, to be proportionatelyadjusted from the monthly salary.
- iii. The employee shall be liable for taxes as per the I.T Act.
 - All reports, notes, drawings, specifications, statistics, plans and other documents and data compiled or made by the employee while performing the duties shall be the property of the employer and upon termination of the engagement shall be disposed of as the employer directs.
 - Except with the written consent of the employer, the employee shall not divulge to any
 person not use for own purpose, any information relating to services, the project or the
 employer, including information in respect of rates of remuneration and conditions of
 employment.

14. Application Requirement:

Interested Indian nationals between **18-40** years applying for the post shall provide the following documents;

An application addressed to The Project Director, State Project Implementation Unit, National Cyclone Risk Mitigation Project Phase - II (NCRMP - II), Tran Bhawan, 5th Floor, 87 A, S. N. Banerjee Road, Kolkata - 700 014, Phone No.: 033-2264-0275, Email: sencrmp2@gmail.com.

- o Indicating clearly the post applied for;
- o Copies of Academic transcript (Graduation, Madhyamik as the case may be);
- o Copies of Training Certificates (Computer / GIS / Driving as the case may be);
- o Copiesof work experience certificates;
- oCopies of Medical Certificate.

15. Selection Criteria:

o Applicants not producing any of the documents specified in Clause 15 (Application Requirement) willnot be eligible for the interview. They should bring original documents at the time of interview.

o Short listing will be decided by the Project Director, SPIU based on the academic merit ranking.

o50 % of the weight age will be given for oral assignment and
oRemaining 50% will be assessed based on the academic, training and experience. The candidate will be finally selected based on the above weight age on the merit ranking.

o The candidate upon selection will undertake legal agreement.

16. Application submission deadline:

Interested applicant shall submit application along with all above mentioned documents to the office of the Project Director, SPIU, Department of Disaster Management& Civil Defence, GovernmentofWest Bengal, Tran Bhawan, 5th Floor, 87 A, S.N. Banerjee Road, Kolkata 700014 latest by **15.1.19**.

17. Ownership

SPIU, NCRMP-II, West Bengal in the Department of Disaster Management& Civil Defence, GoWB will have ownership of the data/reports. The consultant will have no right of claim to the products developed and shall not replicate them without prior consent of SPIU, NCRMP-II, West Bengal in the Department of Disaster Management& Civil Defence, GoWB.

18. Arbitration

In the event of any dispute between the GIS Specialist for NCRMP-II in West Bengal and the SPIU for NCRMP-II in West Bengal, the Government of West Bengal will be the arbitrator.
