ABSTRACT

Information Technology Department – Tamil Virtual Academy - Tamil Nadu Innovation Initiatives (TANII) Schemes 2017-2018 (Round-II) – State Innovation Fund - Sentence Patterns, Structure and Rules in Tamil for Machine Translation — Sanction of funds – Orders - Issued.

Information Technology (Admn.2) Department

G.O.(Ms).No.2

Dated: 09.03.2018
ஹேவிளம்பி, மாசி–25
திருவள்ளுவர் ஆண்டு–2049
Read:

1. From the Joint Director (FAC), Tamil Virtual Academy Letter No.1333/TVA/TANII2017/D.3275,dated 21.06.2017.
2. From the Member Secretary, State Planning Commission, Chepauk, Chennai-5, Letter No.1644/SPC(PC)/2017, dated 14.11.2017.
3. From the Joint Director (FAC), Tamil Virtual Academy Letter No.2581/TVA/TANII2017/D.3956,dated 20.12.2017.

ORDER:

In the letter first read above, the Director, Tamil Virtual Academy has sent proposal for "Sentence Patterns, Structure and Rules in Tamil for Machine Translation" at an estimated cost of Rs.72.72 lakh.

2. The objectives and the scope of the proposal for "Sentence Patterns, Structure and Rules in Tamil for Machine Translation" are as follows:-

Aim and Scope

The main aim of the proposal is to identify the sentence patterns, structures and rules in Tamil as classified in English language. English language already has its structures and patterns for verbs, nouns, adjectives, position of adverbs etc. Similarly, Tamil language is to be grouped for its structures and patterns.

As far as the Machine Translation (MT) is concerned, the available translation methods, sources are not accurate well at present because Tamil grammatical structure is different from English structure.

In English, binary theory noun phrase (NP) and verb phrase (VP) is used for classification but the binary system will not work accurately in Tamil.

The English language structure is SVO (subject+verb+object) pattern but Tamil has SOV (subject+object+verb) pattern.

In Tamil, verbless sentences and subjectless sentences are possible unlike English.

...2

Relative participle clause in English is equal to Adjectival participle in Tamil, but, not exactly the same. If translation is to be made from one language to another (Tamil-English vice-versa) there is a need for bi-lingual dictionary (source and target languages), **rules representing regular Tamil sentence structure and rules representing regular English sentence structure.** Hence, we need rules according to which we can relate or map these two sentence structures together.

In order to overcome this, Tamil Virtual Academy has submitted a proposal to identify the Tamil sentence structures and patterns, rules, usages, etc.

3. The proposed total cost of the project are as follows:-

S.No. (1)	Particulars (2)	Salary (3)	Persons (4)	Months (5)	Total (6)
1.	Co-Ordinator	Rs. 45000	1	12	540000
2.	Research Associate	Rs. 30000	10	12	3600000
3.	Programmer	Rs. 25000	5	12	1500000
4.	Data Entry Operator	Rs. 12000	3	12	432000
5.	Consultancy (Experts)	-	-	-	300000
6.	Equipments (Desktop, Laptop etc.)	-	-	-	700000
7.	Miscellaneous (books, stationeries etc.)	-	-	-	200000
Total					72,72,000

4. In the letter second read above, the Member Secretary, State Planning Commission has informed that the proposal has been recommended at an outlay of Rs.72.72 lakh under TANII for the year 2017-18 (Round-II) by the State Planning Commission for implementation.

5. The Government after careful examination accord sanction for a sum of Rs.72,72,000/- (Rupees seventy two lakh and seventy two thousand only) to Tamil Virtual Academy for the "Sentence Patterns, Structure and Rules in Tamil for Machine Translation" project under TANII Schemes 2017-18 (Round-II).

6. The expenditure sanctioned in paragraph 5 above shall be debited to the following Head of Account:-

2202.General Education – 03.University and Higher Education – 102.Assistance to Universities – State's Expenditure – KI.Assistance for creation of Sentence Patterns, Structure and Rules in Tamil for Machine Translation under State Innovation Fund – 09.Grants-in-Aid – 03.Grants for Specific Schemes. (D.P.Code.2202-03-102-KI-0936)

The above expenditure shall be adjusted by deducting under the following Head of Account:

2202.General Education – 03.University and Higher Education – 902.Deduct – Amount met from Reserve Fund / Deposit Account – State's Expenditure – JB.Deduct – Amount met from State Innovation Fund – 30.Inter – Account Transfers. (D.P.Code.2202-03-902-JB-3003)

By contra debiting from

J.Reserve Funds – (b) Reserve Funds not bearing Interest – 8229-00.Development and Welfare Funds – 200.Other Development and Welfare Fund – BE.State Innovation Fund (D.P.Code.8229-00-200-BE-0006) Outgo

7. Necessary funds are provided in First Supplementary Estimates 2017-2018. The Section Officer (Bills), Information Technology Department is authorized to draw and disburse the amount sanctioned in paragraph 5 above to the Director, Tamil Virtual Academy through ECS to the Current Account of Tamil Virtual Academy Account No.955548440 held in the Indian Bank, Kotturpuram Branch with Branch Code : 00T117 and IFS Code : IDIB000T117.

8. The Director, Tamil Virtual Academy is authorised to take appropriate measures as necessary for the successful implementation of the project in consultation with the Board.

9. The Director, Tamil Virtual Academy is directed to furnish the Utilization Certificate along with detailed expenditure statement to Government. Any unutilized balance in the above amount should be transferred back to the State Innovation Fund Account.

10. This order issues with the concurrence of Finance (Ind) Department vide its U.O. No.145/Ind/2018, dated 08.02.2018.
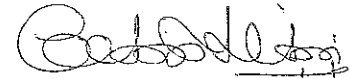
(By Order of the Governor)

T.K. RAMACHANDRAN,
Principal Secretary to Government.

To
The Director,
 Tamil Virtual Academy,
 Anna University Campus,
 Gandhi Mandapam Road, Chennai- 600 025.
✓ The State Planning Commission, Chennai - 600 005.
 Planning, Development and Special Initiatives,
  Secretariat, Chennai – 600 009.
The Accountant General, Chennai-600 009.
The Accountant General (Audit), Chennai-600 018.
The Principal Accountant General (Accounts & Entitlements), Chennai – 600 018.

The Pay and Accounts Officer, Secretariat, Chennai-600 009. (2 copies)
The Finance (Industries/BG.II) Department, Secretariat, Chennai-9
The Information Technology (Bills) Department, Chennai-9
The Resident Audit Officer, Secretariat, Chennai-9
The Special Personal Assistant to the Hon'ble Minister for Information Technology,
  Secretariat, Chennai-9.
Sf/Sc

// Forwarded / By Order //

Section Officer