

## **TERMS OF REFERENCE for SCM Consultancy assignment**

- 1.1 To document the pattern of food grains flows of the FCI in 2010-11 including:
  - a) Origins and destinations as well as quantities (actual).
  - b) What was the gap between planned and actual movement? (specifically with reference to – (i) Punjab, A.P., Chhattisgarh as surplus states and (ii) NE, West Bengal, Bihar, Jharkhand, Karnataka as receiving states)..
  - c) Storage capacity at various locations, and end of the month stock variations.
  - d) Mode of transportation, whether rail or road and quantities moved.
  - e) Railway infrastructure available at loading and unloading points to undertake movement.
- 1.2 Performance of the Railway in movement of food grains covering the following areas:
  - a) Why were Railways not able to provide rakes to FCI as per plan?
  - b) Why did Railways not honour monthly plans? What impact did it have on utilization of storage capacity in godown, handling of foodgrains, and cost of handling?
  - c) What were the reasons for bunching of rakes at receiving godowns? Was it possible to prevent bunching? How could this have been prevented?
  - d) Is there any linkage between Railways providing rakes and speed of unloading at railhead?
  - e) Is it possible for Railways to take responsibility for Transit Loss through 100% weighment at loading and unloading stations?
  - f) Study cases in which rakes had to be rebooked and high demurrage incurred. What were the reasons for this?
  - g) What is impact of fertilizer & cement movement on movement of foodgrains; particularly with respect to Ex. A.P and Ex. Chhattisgarh.
  - h) Study impact of agitations on Railways, for example, the Gujjar agitation, in 2010-11.

- i) What are half rake placement stations? What was utilization of godowns at half rake points in 2010-11? What plan was given by FCI for these stations? What was the offtake at these godowns and how did FCI meet the demand?
  - j) How can the rake availability be increased at the dispatching regions of Punjab, Haryana, Andhra Pradesh and Chattisgarh.
  - k) Is free time allowed by railways of 9 hours sufficient in the manual system of loading/unloading?
  - l) Is there a need of synchronization between Railways working hours and FCI's working hours?
  - m) How can the bunching/detention/rebooking be avoided at the destination ends.
  - n) How have poor infrastructural facilities at the goods shed affected loading/unloading operations?
  - o) Can Railways stop the placement of rakes on Sunday/Holidays. If not, then how FCI can save demurrage on this account.
  - p) Is there a scope to introduce mechanization in the operations of loading/unloading, so as to ensure early release of rakes?
  - q) Railways easily provide rakes on those routes on which it can get backward traffic (to Maharashtra, Gujarat from North). How can Railways be persuaded to supply rakes at FCI designated receiving ends only? (particularly NE)
  - r) Why Railways fail to honour the weekly priorities given by FCI for loading of the rakes? What is the impact on the non-observance of weekly priorities by the Railways?
- 1.3 FCI's own material handling, weighment, sampling, and testing infrastructure.
- 1.4 Systems of Food grain Movement Planning and Monitoring employed by FCI, and its effectiveness, covering specifically:
- a) While preparing the estimated movement plan, do the Regional Offices of FCI prepare depot-wise inflow/outflow statements? The inflow/outflow statements of some depots in states mentioned in para 1.1 (b) may be studied carefully and variations in the same may be studied.
  - b) What is the pattern of offtake from FCI's godowns(study pattern in some selected godowns)? Is the offtake equal in every week?

- c) Study the correctness of IRRS and offtake data in some depots. How can the IRRS stock and offtake data be used for planning of grain flow?
  - d) Study godowns inflow/outflow and whether the estimate of procurement/offtake has come true. What can be done to improve these estimates?
  - e) Time taken to load and unload rakes at godowns having contract labour/DPS/Departmental labour/CWC godowns. What is the reason for long time taken?
  - f) Study trend of detention at railheads/siding godowns with Departmental/DPS/Contract labour.
- 1.5 To project the flows of foodgrains over a 15 year horizon, taking into account likely changes in production and procurement patterns, deficits in foodgrain requirements in various areas of the country, storage capacities existing and planned at various locations, requirements of the PDS under the Food Security Act, etc.
  - 1.6 While dealing with the points at 1.1 and 1.2 above, to make specific and detailed studies in respect of the special requirements of the North Eastern Region.
  - 1.7 To examine the scope for the introduction of modern technologies into FCI's material handling, covering both intermediate bulk handling as well as full-fledged bulk handling.
  - 1.8 To examine the characteristics of a desirable logistics model for FCI, including planning for an optimal pattern of flows, a desirable and feasible model mix of transportation, and the creation of infrastructure necessary within the FCI. While examining various transportation modes, the feasibility of using coastal shipping should also be studied.
  - 1.9 To arrive at an indicative requirement for railway infrastructure to support the food grains movement anticipated.
  - 1.10 To arrive at an indicative list of infrastructure required at specified ports, both to facilitate coastal shipping, as well as likely import and export operations.
  - 1.11 To estimate the capital investment requirement for the proposed logistics regime.

- 1.12 To examine the scope for engagement of Turn Key Logistics Service Providers by the FCI. If feasible, to specify the scope of activities that can be managed through such agencies, and to design appropriate contracting procedures and documents therefore.
- 1.13 In the bulk storage and handling projects implemented by Adani the movement to Circuit-I i.e. from Moga Base Depot to Bangalore, Chennai and Coimbatore has been much lower than the movement plan given by FCI. What are the reasons for lower movement on this circuit? Was it due to Railways inability to provide rakes?
- 1.14 To suggest /recommend improvement in the existing LP Solution used by the corporation. While doing so, the consultant would study the constraints of the railways and the requirements of the FCI and suggest best possible ways to optimize the route plans with a view to achieve efficiency and cost saving on railway freight etc.
- 1.15 Whether the availability of required variety of foodgrains stocks in the FCI godowns/base depots is as per requirement?
- 1.16 Whether adequate manpower is available with FCI which affects the receipt and issue of foodgrains?
- 1.17 Whether non availability of stocks is concentrated in certain pockets of a District/State or is spread all across?
- 1.18 Whether the non-availability of stocks follows a particular pattern i.e. non availability exists during the end of the month or throughout the month or the stocks is non-available during a particular period of a year say during monsoon or during peak seasons of Railways?
- 1.19 Whether there is alternate mechanism to ensure the availability of foodgrains during natural calamities/force majeure conditions?
- 1.20 What is the pattern of lifting by the State Govt. during the weeks of a month or during a year and its impact on the supply chain?
- 1.21 What are the reasons for the particular pattern of lifting during a week/month/year and whether they are justifiable?
- 1.22 Whether the infrastructure available with the State Govt. is insufficient on which FCI has no control but affects the pattern of lifting?

- 1.23 Whether the ability of State Govts. to make financial arrangements in time which affects the pattern of lifting?
- 1.24 Whether the available weighment facilities are adequate for speedy receipt and issue of foodgrains?
- 1.25 Whether the Information Technology is available at the depots and is being fully utilized for monitoring the receipt and supply of foodgrains and is being utilized for addressing the bottlenecks arising thereof?
- 1.26 On the implementation of the food security act the requirement of foodgrains across the country will increase and whether the available infrastructure/manpower is adequate to manage the supply chain.
- 1.27 To study the impact of increased off-take, projected under the proposed National Food Security Bill, on the stocks in the godowns under FCI.
- 1.28 To project the utilization of existing godowns under FCI vis-à-vis the godowns sanctioned under PEG scheme.
- 1.29 To study the handling cost in the godowns under FCI vis-à-vis the projected increase or decrease in cost of handling when additional capacity is available in PEG.
- 1.30 To suggest ways of reducing handling cost in godowns under FCI by mechanization or induction of more labour or re-deployment of labour from surplus depots to deficit depots or any other alternative.
- 1.31 To study the period of storage of foodgrains in godowns in 2010-11. To project the period of storage after enactment of the proposed Nation Food Security Bill.
- 1.32 To study the cost of handling in FCI's godowns in 2010-11 and 2011-12 (April to December) vis-à-vis the godowns of other agencies like CWC, SWC, Hafed etc. To study operational efficiency of handling of stocks in FCI's godowns (with different types of labour) vis-à-vis godowns of CWC/SWC/other agencies.