GOVERNMENT OF INDIA
MINISTRY OF RAILWAYS
(RAILWAY BOARD)

No.98/W1/Genl/0/30-Pt. New Delhi, Dated 25.07.08.

FA & CAOs,
All Indian Railways.

Sub: Preparation of Estimates.

Attention is invited to the instructions contained in Board's letter No.98/W-1/Genl/0/30/Pt. dated 13.06.08 (Copy enclosed for ready reference) on the above subject. Some Railways have desired to know as to whether the said letter has been issued with the concurrence of Finance Directorate of Ministry of Railways. It is hereby confirmed that the said letter has been issued in consultation with the Finance Directorate of the Ministry of Railways. Further action may please be taken accordingly.

Please acknowledge receipt.

(ANJUM PERVEZ)
DIRECTOR/WORKS-II
RAILWAY BOARD

Copy to: (i) EDF(X)-I, Railway Board.
(ii) CAO/C, All Indian Railway.
Sub: Preparation of estimates.

1. Of late it is observed that the Detailed estimates are submitted to Board for sanction with large variations in cost with reference to the sanctioned abstract estimated cost of the Project.

While a certain excess over originally sanctioned cost can be attributed to escalation in the cost of labour and material taken place during the intervening period, in several cases the excess is due to increase in the scope of work or material modifications to provide for items not contemplated at the approval stage of the project. Apart from large excesses in quantities particularly earthwork, items introduced subsequently include revision of track and signaling standards, provision of OFC, carriage and wagon facilities, yard remodeling, terminal facilities and passenger amenities.

In the circumstances, it is imperative to undertake a rigorous review of the nature and scope of works included under each sub-work in the sub-estimates of various departments, i.e. Civil, Electrical, TRD, S&T and Mechanical. The detailed estimate would, therefore, has to be examined with reference to the scope of work and standards of construction outlined at the Project Report stage. Any change should be summarily rejected, unless extenuating circumstances are established for inclusion of revised facilities/higher standards at the detailed estimate stage.

While it is important to take advantage of technological advancements for bringing about better efficiency and cost reduction, initial conceptualization of the project and forecast of expenditure has to be sound and precise, at least to a reasonable extent.

Railways may ensure that the planning for works is done more realistically and cost consciousness is kept in view so that need for expanding the scope of sanction at a later stage can be scrupulously avoided.

The tendency to provide facilities in extravagant and lavish manner has to be severely curbed. Estimates pertaining to service buildings particularly those for housing the S&T infrastructure, sheds in workshops, offices for inspectorial staff etc. have to be pruned down to bare minimum level only just to meet the functional requirements and nothing more.

2. It has also been observed that a number of Detailed estimates/ Revised estimates/ Material Modifications are being sent to Railway Board for sanction without full details and without adequate explanation and justification on the change in scope of work and increase in quantities. Even the variation statements are not being prepared properly. Back references have, therefore, to be made to the Railways for seeking clarifications. This results in delay.
To enable expeditious processing of estimates for sanction in Boards office complete information as per Annexure I to VII (Copy enclosed) should invariably accompany the Estimate.

Estimates submitted to Board without the above mentioned Annexure will not be entertained.

Detailed Estimates, Revised Estimates, Material Modification proposals which are to be sanctioned by Board /MSR/MR should be personally vetted by FA&CAO/FA&CAO/C. All such estimates should have the personal approval of the General Manager of the Railway/Production Unit.

DA-As above

(Anjum Parvez)
Director Works-II
Railway Board

Copy to CAO/Cs all Indian Railways
Checklist for Estimates (Remarks against each should be given wherever required)

1. Whether the Final Location Survey has been completed (Indicate the agency which has done the FLS and the salient features of the project)?

2. Whether the L-section has been critically scrutinized and approved?

3. (i) Whether Free Board from HFLs and the clearances required for bridges have been taken into account while finalizing L-section?
   (ii) Whether any condonation is required?

4. Whether Yard plans (A3/A4 size) have been approved by CTPM/COM and attached?

5. Whether the operating features approved by CTPM/COM have been considered while framing the estimate?

6. (i) Whether provisioning for land has been made as per prescribed norms and are reasonable?
   (ii) Whether land rates obtained from Revenue authorities were considered?
       (Photocopies of related documents to be attached to justify the land rates)

7. Whether track standards adopted are in accordance with extant guidelines? (Railway Board's authority/guidelines to be quoted)

8. Justification for adoption of Signaling and Electrical standards is to be given. Is it commensurate with the expected traffic in the section? (Please quote Railway Board's policy letter)

9. (i) Justification for adoption of type of the Bridge be provided.
   (ii) Have waterway calculations for Major Bridges been done?
   (iii) Whether details of waterway calculation for important bridges enclosed?
   (iv) Whether GAD of bridges have been finalized and approved?
   (v) Whether Geo-technical investigations have been done?

10. Whether passenger amenities proposed at the station are as per the prescribed norms? Station-wise details of facilities being provided have to be furnished.

11. (i) Whether views of Associate Finance enclosed?
    (ii) Whether administrative remarks to Finance comments given and enclosed?

12. Whether explanation for cost escalation of various items between the time of sanction of the work and preparation of the detailed estimate and between the sanction of detailed estimate and revised estimate given?
Annexure to accompany the Estimates

a. Top sheet as per form E 702

b. Estimate as per for E553 & E554.

c. Check list for estimates as Annexure-I

d. Brief history, details of previous sanctions, latest status, detailed justification of work as Annexure-II.

e. Chart showing the facilities proposed in the original estimates, approval in further estimates (stage-wise) and now proposed in the estimate. It should be possible to see what changes have been brought out at which stage. This can be shown in a tabular form bringing out facilities provided in the Revised/Detailed estimate under consideration vis-a-vis the facilities and provisions in the Abstract estimate or in the detailed/revised estimate sanctioned so far (as Annexure III). Clear justification for the change has to be spelt out in detail.

f. Check list and certificate regarding rates adopted (to be prepared and furnished as per guidelines in Annexure IV.

g. Consolidated comparative statement showing the variation in cost w.r.t. the Abstract cost in case of Detailed Estimate, and variation w.r.t. Abstract cost as well as Detailed Estimate in case of Revised Estimate, clearly bringing out the variation due to escalation, variation due to change in quantities and variation due to new items should accompany the estimate. The reasons for variations should be given in brief in the statement (as Annexure-V.

h. Technical explanatory note for increase in cost due to new items and increase in quantities should be given. The note should bring out the technical feature leading to variations, for example, increase in the formation level, change in the span and type of bridge, change of signaling std. etc.,( as Annexure VI).

i. Views of Associate finance and remarks thereon (as Annexure-VII).

j. Above Annexure should be signed by an officer not below the rank of SA. Top sheet and comparative statement should also be signed by an officer not below the rank of SAG from the Executive and Accounts Departments.
1. Work originally approved in Railway Budget.
   i) Year
   ii) Anticipated cost: (Gross) (Net)
   iii) GMT (as per survey report):
   iv) No. of trains each way (as per survey report)
3. Details of all previous sanctioned Estimates.
   i) Sanctioning Authority:
   ii) Letter No.
   iii) Cost: (Gross) (Net)
Total of sanctioned cost:
4. Estimate under consideration:
   i) Submitted on:
   ii) Cost: (Gross) (Net)
5. Present status of work (for works in progress)
   Physical progress upto (_______) (_______%)
   Expenditure upto (19____) (Rs._______)
   Outlay for the year (10____) (Rs._______)
   Balance to complete __________________
   Target date for completion__________________

Brief Description of work completed.

6. Important features of the project
7. Detailed Justification of Work.
13. (i) Whether variations in quantities have been adequately scrutinized?
   (ii) Whether detailed technical justification for the variations in the scope/or
        inclusion of new items have been given in the explanatory memorandum?

14. (i) Whether variation statements for each sub-estimate prepared and
       enclosed?
   (ii) Whether a consolidated variation statement prepared and enclosed?
   (iii) Whether the variation statements have been vetted by Associate Finance?

15. Whether M&P items and/or off-line facilities provided in the estimate are directly
    related to the work under consideration?

16. (i) Whether provision of various D&G and other Misc. charges have been
      restricted to the bare minimum?
   (ii) Whether Establishment sheets for all departments have been prepared and
        enclosed with the estimate?

17. Whether the details of CRRM have been mentioned clearly in the estimate?

18. Whether the Detailed estimate has been prepared after receipt of Detailed
    Estimate for the approach portion from PWD/State Govt.? (In case of ROB/RUB)

19. (i) Whether forestry clearance is required?
    (ii) If yes, what is the status?

20. (i) Whether all Annexure have been signed by an SAG officer?
    (ii) Whether the Top Sheet and variation statements have been signed by SAG
         officers from the Executive and Accounts Departments?
## Statement showing the Standard & Basic facilities at various stages.

<table>
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<tr>
<th>S.No.</th>
<th>Description</th>
<th>Facilities on existing MG section (for GC projects) &amp; existing single line (for DL projects)</th>
<th>Facilities as per Survey Report/Abstract Estimate</th>
<th>Facilities As per Detailed Estimate</th>
<th>Facilities sanctioned as MM or proposed to be sanctioned</th>
<th>Facilities as per Revised Estimate</th>
<th>Justification for change</th>
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Check list and certificates regarding rates

1. Rate of different items to be adopted in estimates should be last accepted rates of the items/Analysis of rate (if LAR is not available).

Certificates in this regard should be furnished.

2. In case of revised estimate it should be certified that the estimate is based on the accepted rates of already completed works/works in progress, and the prevailing rates during the year ___________ for the works-in-progress.

3. Rates of sleeper/rail and other P-way fittings should be as per rates circulated by Railway Board or Open Line for the purpose of preparation of estimates.

4. The reason for increase due to escalation w.r.t. Abstract cost in case of Detailed Estimate and w.r.t. Abstract Estimate as well. The Detailed Estimate in case of Revised Estimate should be brought out.

5. Variation statement should be vetted by Associate Finance.

6. Revised Financial Internal Rate of Return for the increased cost has to worked out and is enclosed (if this is not done, reasons for the same has to be furnished).

Consolidated Variation Statement duly vetted by Finance.
Annexure VI

Detailed explanatory note for increase in cost

Explanatory note for increase in cost due to new items and increase in quantities should be given. The note should bring out the technical features leading to such variations covering following details:

a. In case of gauge conversion – Details and justification for diversion, if any.

b. Minor and Major bridges – No. of bridges proposed for strengthening (in case of gauge conversion).

c. Minor and Major bridges – No. of bridges proposed for rebuilding and their reason thereof (in case of gauge conversion).

d. Detailed technical justification for change in gradient increase of cross-stations.

e. Number of ROBs/RUBs being rebuilt or raised.

f. In respect of other plan heads also, the details of ROB/RUBs which have been proposed in lieu of level crossing should be given. It should be clearly brought out by the Railways whether the formation level has been raised specifically to accommodate RUB in lieu of level crossing or not. In case this has been done the cost implication thereof has to be indicated.

g. Detailed technical justification for change in the type of foundation, change in span and change in type of superstructure of minor and major bridges should be specifically brought out.

h. Detail technical reason for change in signaling standard should be given.

i. Justification for change in formation levels.

j. Similarly detailed technical justification for increase in the number and linear water-way for both major and minor bridges should be given.

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Annexure VII

Views of Associate Finance and remarks thereon.

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