CHAPTER 3: WORKS AND CONTRACT MANAGEMENT

3.1 Injudicious decisions leading to idle/unproductive investments

3.1.1 South Central Railway: Injudicious investment on construction of new Broad Gauge line

Restoration of a Broad Gauge line treating it as viable on the basis of unrealistic estimates has resulted in unfruitful investment of Rs.97.46 crore

A Broad Gauge line between Kakinada and Kotipalli on South Central Railway was dismantled in 1940. Zonal Railway, however, conducted a survey in the year 1987-88 under the directives of Railway Board based on public demand for the restoration of the line. Railways considered the restoration economically unviable (1987) as the rate of return was only 6.56 per cent. Even at that time the Chief Operating Superintendent had opined that the estimates were grossly overstated in respect of both Goods and Passenger Traffic. But, the survey was updated from time to time and finally the restoration was justified projecting a goods traffic of 8.01 lakh tonnes and 32 lakh passengers per annum from the first year of the operation, with a rate of return of 19.87 per cent. This was accepted by Accounts also.

The new line constructed at a cost of Rs.97.46 crore was opened for traffic in November 2004. Even before commissioning of the line, the Railways was aware that the freight and passenger traffic on this line would be meager, contradicting the projections in the estimates and leading to doubts about the realistic assessment of the traffic expected. Open line arrangements were also made keeping the minimal traffic in view.

Though passenger trains with six single trips per day were initially introduced, these were restricted to two single trips per day due to poor patronage. An average of 158 passengers per day travelled by these trains during the period of one year between November 2004 and October 2005. This amounted to less than 0.6 lakh passengers in a year, as against the figure of 32 lakh passengers projected at the time of getting the project restored. The expenditure incurred on running of passenger trains was to the extent of Rs.5 lakh per month as against the passenger traffic earnings of Rs.0.36 lakh per month. No goods train plied on this section ever since the opening of the line. The rate of return as on date is negative since the earnings are far below the cost of maintenance and haulage, thereby leading to heavy losses instead of the anticipated profits.

Thus, a line dismantled six decades back was justified as remunerative by the Commercial Department of South Central Railway and accepted in accounts using grossly overestimated data and restored at a cost of Rs.97.46 crore when in actuality it was loss making and should never have been taken up.

The Railway stated (July 2006) that the economic viability could not be prejudged within two years of opening of the line against the norm of seven

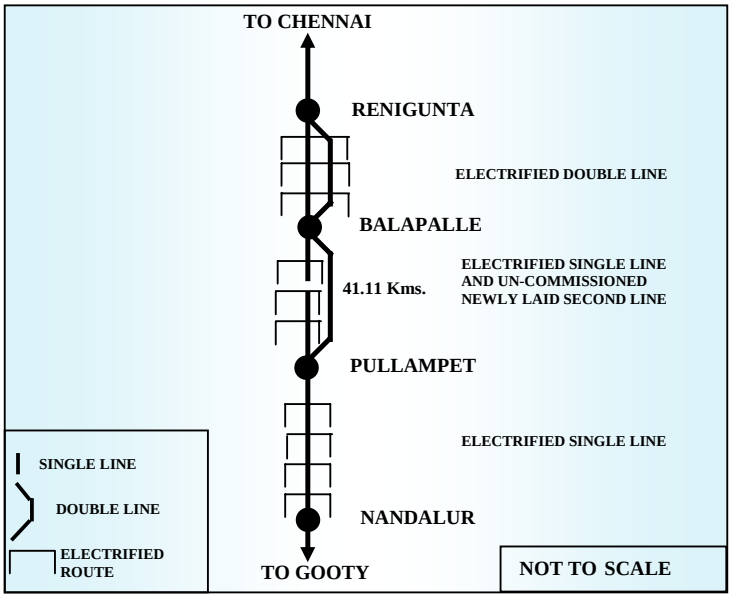
years for determining the viability. This reply is not tenable as the line was constructed with the anticipation that 8.01 lakh tonne goods and 32 lakh passengers per year would be transported from the first year itself.

The matter was brought to the notice of Railway Board in August 2006; their reply was awaited (December 2006).

3.1.2 South Central: Railway — Idle investment and avoidable expenditure due to non-synchronisation of doubling work with overhead electrification

Poor planning and the failure to effectively coordinate works resulted in idle investment of capital to the extent of Rs.81.59 crore for more than two years and loss of earnings (Rs.5.95 crore) due to detention of wagons. Also, taking up of electrification work separately for two lines resulted in extra expenditure of Rs.6.17 crore.

Doubling of a track helps reduce congestion and is one of the methods used to improve line capacity. The important Gooty-Renigunta (GY-RU) section on the Mumbai-Chennai Trunk Route is a saturated section in urgent need of improvement in capacity with utilisation of 120 per cent. One of the main commodities transported on this section is high rated iron ore. Of the total length of 279.73 kms. of this section, doubling was carried out in four patches to the extent of 87.94 kms. (31 per cent) during the years 1972 to 1979 and the balance track of 191.79 kms. (69 per cent) remained as a single line.



Railway Board sanctioned in June 2000 the overhead electrification (OHE) of the Renigunta-Gooty-Guntakal section which was completed from Renigunta to Nandalur by September 2004. During the same period in October 2001, Railway Board sanctioned the doubling of another patch Balapalle-Pullampet (BLPE-PMT) (41.11 kms.) part of the same section on which electrification was in progress, at an estimated cost of Rs.74.77 crore.

However, after award of the contract for doubling work (January 2002) with completion period of six months, the Railway Administration approached the Railway Board (December 2003) for the electrification of second line as operation of two lines for two different tractions was not possible. This was sanctioned only in May 2004 and completed in April 2006. As a result, although the doubling work was completed in March 2004 at a cost of Rs.81.59 crore, the line could not be commissioned due to non-electrification of this line.

When the electrification for the existing single line was in progress and the patch doubling of a portion of this line was taken up, the Railway Administration should have assessed the requirement of OHE of the second line also and approached the Board in January 2002 itself for necessary modification/sanction to extend the scope of work. Had this been done, the second line could have been put to use as far back as September 2004 increasing the line capacity. The loss of earnings due to detention to wagons on account of line capacity problems was Rs.5.95 crore.

Also, simultaneous electrification of a double line is more cost efficient than electrification of two single lines. The extra expenditure on this account was Rs.6.17 crore.

Poor planning and the failure to effectively coordinate works has, thus, resulted in idle investment of capital to the extent of Rs.81.59 crore for more than two years besides extra expenditure of Rs.6.17 crore and loss of earnings of Rs.5.95 crore.

The Railway Board stated (December 2006) that the need for electrification of the second line in BLPE-PMT section was recognised by the zonal railway in the year 2003 only when the material modification for this purpose was proposed which was accordingly approved in May 2004. Moreover, the difference in costs involved in electrification of single line and double line was not relevant as only a few modifications would be required during electrification after doubling.

Railway Board's contention is not tenable as the electrification of the main line was a known fact when the doubling was taken up and both works could have been synchronised easily. Further, the cost difference involved in the electrification is based on data made available by the zonal railway itself and was clearly avoidable had the planning been more effective.

3.1.3 South Western: Railway — Unfruitful expenditure as a result of delayed construction activities

Railway Administration could not execute various works during gauge conversion of a metre gauge line in time resulting in surrendering of allotted funds (Rs.58.72 crore) besides blocking up of Rs.29.83 crore

Railways took up the gauge conversion work of the financially unviable (negligible ROR) Mysore (MYS)- Chamarajanagar (CMNR) section (60.78 kms.) as Phase I of the overall project of new line upto Mettupalayam via Satyamangalam in the year 2001-02 with the date of completion as 31 March

2005. The cost of the work was estimated at Rs.85.36 crore. Against it, a budget allotment of Rs.80.29 crore (94 per cent) was made during the years 2001-02 to 2004-05. The Railway, however, could utilise only Rs.21.55 crore (27 per cent) and the balance amount (Rs.58.74 crore) was surrendered. As of December 2005, the actual expenditure incurred on the gauge conversion work was Rs.29.83 crore only with a physical progress of 35 per cent. The work is now targeted for completion by March 2007.

A review of records by Audit revealed that the reasons for the slow progress of work despite fund availability was due to poor contract management and delays in the execution of various works as brought out below:

- Although contracts for earthwork for all the seven reaches were awarded during December 2002 to May 2003, work could not be completed within the original currency i.e. 31 March 2004 and several extensions were given on departmental account such as non-completion of allied construction works like retaining wall and yard modifications etc.
- Construction work of a major bridge across Kabini river was yet to be completed (December 2006) although it was scheduled for completion by 3 October 2004. Extensions have been given upto March 2006, again on departmental account such as delay in issue of Letter of Acceptance and in shifting of power lines, non-availability of blocks etc.
- Although the contracts of minor bridges and construction/ strengthening of Road over bridges/ Road under bridges were proposed to be completed by 31 December 2004, the contracts for the same were awarded only in March 2005 and June 2005, much after the targeted date of completion with the result the works remain incomplete (December 2006).
- Around 1,31,200 cums. of ballast valuing about Rs.6 crore was proposed to be collected by 31 December 2005. As ballast is a long lead item, tender for procurement should have been finalised well in advance. But it has yet to be finalised (December 2006). The tenders were discharged thrice due to various reasons such as ineligible tenderers, rescinding of offers etc.
- Although there was a provision for permanent way material (rails and fastenings) valuing Rs.22.80 crore, indents for the same were submitted only in 2006-07 due to non-completion of allied construction works.

On this being taken up by audit (February 2006), Railway Administration of Construction Organisation stated (May 2006) that reasons for non-utilisation of allotted funds were non-receipt of rails and sleepers and non-execution of some works which could be done only during the closure of MG line. It is evident from the narration above, however, that contracts were either not awarded in time or were not adequately followed up to ensure completion as per schedule. There were all round slippages of targets and to attribute non-utilisation of funds to sleeper and rail non-availability alone, is not convincing.

Thus, when a number of projects across the country have been delayed because of non-availability of funds, the construction organisation could not utilise the allotted funds in this case due to inefficient project management. Moreover, the delay in execution of this project translates into a blocking up of Rs.29.83 crore with no attendant benefits.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.1.4 Central Railway Unproductive expenditure on construction of new line

The slow approach of Railways towards a work undertaken for speedy economic development of a backward area has not only resulted in unproductive expenditure of Rs.15.15 crore, but also diluted the objective of taking up the work

As per codal provisions, expenditure other than that wholly chargeable to ordinary revenue incurred on creation of new assets should be financially justified and the works should be taken up only if the rate of return (ROR) is 14 per cent or above.

In September 1993, Railway Board had asked Central Railway to conduct re-survey of a new line project Ahmednagar-Beed-Parli Vaijnath which had been shelved earlier on account of inadequate traffic prospects. Though the survey report submitted in October 1994 indicated negative rate of return, the project was included in the Works Programme for the year 1995-96 at a total cost of Rs.353.08 crore in order to provide infrastructure for speedy economic development of a backward area in the Marathwada region of Maharashtra. In July 1997, Railway Board directed the Central Railway to start the work from Ahmednagar side so that the section on completion could be put to use. The project was, therefore, divided into five sections and the detailed estimate amounting to Rs.13.86 crore for first section viz. Ahmednagar - Narayandoh (15 Kms) was sanctioned in January 1999. The work of Ahmednagar - Narayandoh section was proposed for completion within 24 months subject to availability of funds.

The review of the planning and execution of the work, however, revealed that despite provision of sufficient funds year after year, the Railway could utilise only 2.33 to 30 per cent of the annual budget provisions except for the year 2001-02. Non-utilisation of funds was attributable to delay in commencement of the land acquisition process which was started as late as in December 2000 i.e. five years after the work was approved. The land for the first phase could be acquired only in February 2005.

Despite the fact that land was not available, Railway awarded two contracts, one for construction of a station building at Beed and another for earthwork in embankment and cutting side drains in July 1997 and May 2002 respectively. Due to non-availability of land, these works were stopped after incurring expenditure of Rs.0.06 crore on the station building and Rs.2.11 crore on earthwork. The construction of station building at Beed, particularly appeared to be a decision taken without adequate thought as its location was in a section

planned to be undertaken in the fourth phase and there was no immediate use for it. Moreover, construction was commenced on land which did not belong to the Railways.

Even after ten years of its sanction, none of the works in the first phase such as earthwork in embankment and cuttings, construction of bridges etc. which were commenced in July 1997 and May 2002, have been completed. The contract for earthwork was abandoned after completing 71 per cent of the work. No target date had been fixed for laying ballast, linking of track etc. Thus, while the project was taken up on socio economic grounds despite being un-remunerative, no serious efforts were made to complete the work to achieve the stated objectives.

In their reply (July 2006), Railway Administration stated that the expenditure incurred in the 15 Kms section will be utilised in due course as assets have been created in the form of earthwork and bridges. The reply is not convincing. The work of Ahmednagar -Narayandoh section was to be completed in 24 months. However, even after a lapse of seven years, the progress of work in this section was far from satisfactory. As the Railway had not fixed any time for completion and commissioning of this section, the assets are likely to remain unproductive for a long period. Moreover, at the pace the work is being carried out, it will not be possible to complete the entire project in near future thereby negating the very concept of fast development.

Thus, the slow approach of the Railways towards a work undertaken for speedy economic development of a backward area has not only resulted in unproductive expenditure of Rs.15.15 crore, but also diluted the objectives of the work.

The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).

3.1.5 Eastern Railway: Injudicious expenditure on construction of Direct Delivery line at Dankuni

Injudicious expenditure of Rs.5.14 crore on construction of one direct delivery line and two sick lines at Dankuni Goods Yard led to the entire investment remaining unfruitful

A techno-economic survey for development of a nodal freight terminal at Dankuni Goods Yard (DGY) was sanctioned in 1991 with the idea of shifting the goods terminal activities from Howrah area. As per the survey projections, the average number of trains (inward and outward) to be dealt with at DGY would be nine per day by the year 2006-07. Therefore, the work of development of a nodal freight terminal by adding a few more lines at DGY was sanctioned in April 1994.

In June 1996, the Divisional Railway Manager (DRM)/ Howrah, however, expressed his views that the existing reception/despatch facilities at DGY were adequate to deal with the expected level of traffic after closure of Howrah Goods shed (HGS). Upto this time, Rs.0.45 crore had been spent or committed on the project. Despite the views of DRM, the project was continued as it was

envisaged that the entire freight traffic handling at HGS would be shifted to DGY by 31 March 1997 and the space released would help in the expansion of passenger facilities at Howrah. One direct delivery line and two sick lines were completed and commissioned by August 2002 at a cost of Rs.5.14 crore.

Scrutiny of records of traffic dealt with at DGY in 2005, more than three years after the commissioning of the line, revealed that there was a downward trend of traffic at DGY from 1996-97 itself. The actual average traffic (both inward and outward) was 0.75 rakes per day during the period 2001-02 to 2005-06 against expected traffic of 7.6 rakes per day. Thus, the volume of traffic failed to justify even the existing available facilities. This is further corroborated by the fact that the additional line was not used at all for more than two years after commissioning and even after that only nine rakes had been placed in one year (upto December 2005).

The original objective of the Project was to shift the HGS and thereby provide additional expansion facilities for Howrah Coaching. Even this, however, has not been achieved since the HGS has not been shifted on the grounds that the annual earnings at HGS were more than the minimum prescribed by Railway Board for closure of a goods shed. Thus, the original objective has been lost sight of and till date the operations continue at HGS whereas additional facilities at Dankuni more or less remained idle.

Thus, the investment of Rs.5.14 crore was made in a project for creating additional facilities which were not necessary in the first place. Having created the facilities at least these could have been used optimally. The failure to shift HGS has vitiated the original objective.

Railway Board stated (December 2006) that the facilities developed by way of constructing the direct delivery line could not be freely utilised due to non-availability of direct reception and dispatch facilities to and from the line. The same, however, were being developed now. They also stated that the freight terminal had already started handling an appreciable level of 40 rakes per month in the current financial year.

The reply is not tenable as the handling of approximately 1.3 rakes per day in the year 2006-07 was still far below the expected traffic of 7.6 rakes per day. The fact remains substantially that facilities developed at an investment of Rs.5.14 crore would remain idle till the expected level of traffic is achieved.

3.1.6 Central Railway: Blocking up of capital due to inadequate planning and execution of a work

Improper planning and execution of earthworks in sections not prioritised for completion has resulted in blocking up of capital of Rs.4.51 crore without any gainful utilisation

The Sixteenth Report of the Standing Committee on Railways observed that there was lack of prioritisation in taking up projects and inordinate delay in execution leading to time and cost over runs. In various Audit Reports, the thin spreading out of resources and poor planning which has led to blocking up of capital have also been brought out.

The Amravati-Narkher line, a new line project, was taken up on grounds of economic development of the Vidarbha area of Maharashtra though it had a negative Rate of Return and the project was unremunerative. Detailed estimates totaling Rs.175.42 crore were sanctioned in December 1995, July 1996 and May 1998. The whole section was proposed to be completed by 2000-01.

In March 1997, the Chief Engineer (Construction) of Central Railway decided that the line should be made operational from one end i.e. from Amravati to Chandurbazar (44 kms.). Works were to be planned and taken up accordingly. However, despite the instructions of March 1997 to plan and execute the works in Amravati -Badnera -Chandurbazar section on priority, contracts for earthworks in formation and construction of major and minor bridges were awarded for various locations on the section beyond Chandurbazar upto Narkher during September 1997 to December 2003. Railways incurred an expenditure of Rs.25.48 crore on these works of which Rs.4.51crore was spent on earthwork alone. Further, the work in seven out of twelve earthwork contracts was either terminated or stopped by the contractors between March 1999 and December 2000 due to non-availability of clear site due to land acquisition problems. By this time, an expenditure of Rs.1.76 crore had already been incurred on these works. It has also been noticed that some of the contractors had filed arbitration cases against termination of the contracts.

Though the works in Amravati-Badnera-Chandurbazar section were completed in February 2006 at a cost of Rs.123.07 crore, the section has not been opened to traffic as yet.

In their reply, Railway Board, while admitting that there were instructions to plan and execute works from one end in such a manner so that entire section could be operated progressively, also added that keeping in view the early completion of the entire project, earthwork contracts were entered into. They added that land acquisition was dependent on the response/cooperation of the State Government and took a lot of time resulting in the termination/stoppage of earthwork contracts leading to avoidable litigation. The reply is not tenable because award of earthwork contracts in non-prioritised sections and without ensuring that land and clear sites were available has resulted in blockade of Rs.4.51 crore on earthwork carried out much in advance with a possibility of deterioration before the section is finally taken up.

Thus, improper planning and execution of earthworks in sections not prioritised for completion has resulted in blocking up of capital of Rs.4.51 crore without any gainful utilisation.

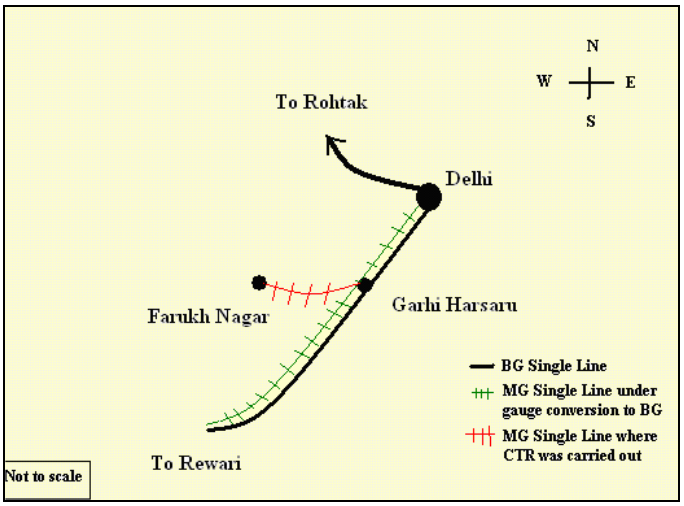
3.1.7 Northern Railway: Injudicious sanction of complete track renewal of uneconomic MG branch line

Complete track renewal of an uneconomic branch line when gauge conversion had to be taken up resulted in unfruitful expenditure of Rs.2.95 crore

Garhi Harsaru (GHH) – Farukhnagar (FN) was a loss making metre gauge (MG) branch line located on the Delhi (DLI) – Rewari (RE) section with an average loss of around Rs.42.29 lakh per annum. Only three pairs of passenger

trains were plying on the section and there was virtually no goods traffic. The two terminal stations of the branch line were also well connected by the road transport system. The Railway Reforms Committee and the Khanna Committee on Railway Safety had also recommended the closure of the line. Though the Railway took up the matter with the State Government, the line could not be closed immediately for want of consent.

The main MG line (DLI - RE), to which this branch line was linked, was taken up for gauge conversion (GC) initially in 1995. The branch line, however, was not considered for gauge conversion or closure at this point of time though it would become gauge locked unless taken up for conversion too. In October 2000, the GC work was temporarily frozen as it was to be dovetailed with the gauge conversion of Delhi-Ahmedabad line. The work, however, was defrozen based upon repeated requests of the Railway (September 2003).



Meanwhile, in November 2002, a complete track renewal (CTR) of the line was sanctioned and contracts awarded in March and July 2003. As of September 2003, an amount of Rs.0.49 crore had been spent on the CTR work. When gauge conversion of the main line was a known fact and, as a result, the branch line would have had to be perforce converted to prevent it from getting gauge locked or closed down, taking up a CTR work was injudicious and would serve no useful purpose particularly in view of the poor traffic on the line. At the very least, the CTR could have been stopped in September 2003 itself, when only Rs.0.49 crore had been spent and gauge conversion of the mainline was being vigorously sought for by the Zonal Railway. Instead, it was carried on till September 2005 and a further Rs.2.46 crore incurred when work was discontinued as a decision was finally taken to convert the line to BG along with the main line to which it was linked. GC of the branch line has since been taken up (February 2006), rendering the entire expenditure on the CTR as infructuous.

The Railway Administration stated (May 2006) that the CTR was required on considerations of the safety of passenger traffic. This argument is not tenable as the passenger traffic was minimal to start with and there was every justification for closure of the line as the ample number of buses plying on the route could have easily catered to the existing passenger traffic.

Thus, failure to link up with the ongoing proposal for GC of the main line has resulted in imprudent investment of Rs.2.95 crore up to September 2005 on the CTR work of an uneconomic branch line.

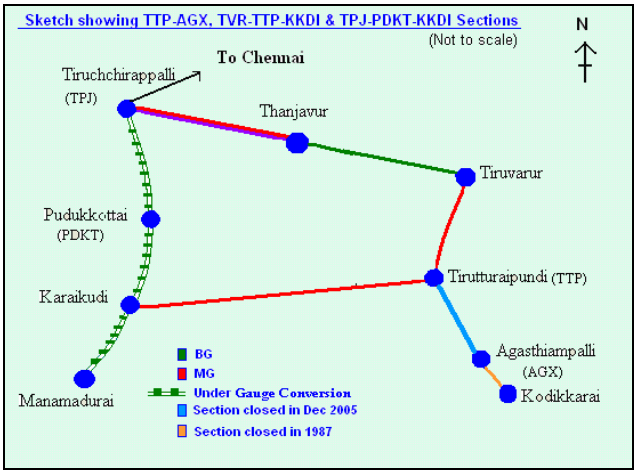
The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).

3.1.8 Southern Railway: Wasteful utilisation of Special Railway Safety Fund on Complete Track Renewal of an uneconomic branch line

Contrary stands of the Railways resulted in infructuous expenditure of Rs.7.78 crore on complete track renewal (CTR) of an uneconomic branch line which was closed down soon after the completion of the CTR work.

Tirutturaipundi – Agasthiampalli was an MG branch line (37 kms.) taking off from the Tiruvarur - Karaikudi section and was initially up to Kodikkarai. Salt loads from Agasthiampalli were carried up to Tiruchchirappalli Goods and transshipped for onward movement.

This branch line from Tirutturaipundi to Kodikkarai was declared as an uneconomic branch line by the Railway Reforms Committee (1982). Out of this, Agasthiampalli-Kodikkarai Section (9 kms.) was closed in 1987 for all traffic and the Tirutturaipundi to Agasthiampalli section for passenger traffic. Goods traffic (Salt) was, however, continued albeit with speed restrictions on weak and very old track and bridges (February 2002). The average Goods transported on the section were 176 MTs per day in 2001-02. This steadily decreased over the subsequent years and stood at an average of 17 MT per day in 2003-04.



Meanwhile, Railway Board setup a non-lapsable Special Railway Safety Fund (SRSF) valuing Rs.17,000 crore in the year 2001-02 to liquidate arrears of track renewals and appointed a select committee to identify the works chargeable to this fund. This committee recommended 35 new unsanctioned works for sanction from SRSF which included track renewal of the Tirutturaipundi-Agasthiampalli line also at a cost of Rs.7.54 crore. Thereafter, another committee of five Executive Directors set up by the Board to make recommendations about uneconomic branch lines, viewed (December 2003) after an inspection of the branch line between Tirutturaipundi and

Agasthiampalli (November 2003) that salt traffic 'potential' existed on the line though average Goods traffic on the line in year 2002-03 and 2003-04 had come down to 14 and 17 MTs per day only.

The Complete Track Renewal (CTR) work was carried out by the Zonal railway between March 2003 and April 2005 at a cost of Rs.7.78 crore. But when the CTR work was substantially complete, the section was proposed for closure by General Manager in February 2005 as there was hardly any traffic. The line was finally closed for Goods traffic in December 2005.

Thus, due to contrary stands taken by the Railway from time to time, the branch line which was uneconomic and which had decreasing goods traffic, was taken up for CTR, instead of closure in 2001-02 itself. It was finally closed only in December 2005 after incurring expenditure of Rs.7.78 crore from Special Railway Safety Fund, which was a specific fund fed by special surcharge from passengers for a specific purpose; this led to wastage of scarce resources.

On this being taken up by Audit with the Railway Administration (December 2005 & January 2006), it was stated (February 2006) that the proposal of closure of the Tirutturaipundi-Agasthiampalli section became imminent consequent upon the closure of the section from Tiruchchirappalli junction to Pudukkottai for gauge conversion while the CTR work was executed solely on safety grounds.

Railway Administration's contention is not tenable in view of the fact that branch line between Tirutturaipundi and Agasthiampalli was ab-initio an uneconomic branch line with the cost of operation more than the proportionate earnings of the section. The traffic showed a declining trend in 2002-03 itself. Moreover, gauge conversion of Tiruchchirappalli junction to Pudukkottai section was known to the Railway as far back as in 2000-01.

The matter was brought to the notice of Railway Board in August 2006; their reply was awaited (December 2006).

3.1.9 Western Railway: Unproductive expenditure on provision of public address system in suburban trains

The failure of Railway to conduct sufficient trials of a new public address system before going for en-masse procurement resulted in unproductive expenditure of Rs.1.42 crore besides defeating the very purpose of its provision

In order to create a communication link between the Motorman, Guard and passengers, the General Manager, Western Railway approved a work of provision of Public Address System (PAS) on all EMU rakes of the suburban system of Mumbai in July 1995. The work was justified on safety grounds so that passengers could be informed of all emergent situations in time. Accordingly, Chief Works Manager, EMU Workshop Mahalaxmi awarded two contracts for supply, erection, testing and commissioning of a communication system in January 1996 and February 1997. The contractors commenced work in November 1996 and the PAS system on all the 70 EMU rakes was provided by February 2000 at a total cost of Rs.0.54 crore.

Immediately after commissioning of the PAS in some rakes in June 1997 itself, the system was found defective and unreliable. Even after repair by the suppliers, the defects continued. It was also observed that the equipments sent for repair remained with the supplier for periods ranging from 49 days to 589 days, indicating that the system was not used. Though the inspection reports of the system during the period June 1997 to March 2001 indicated failures ranging from 20 to 57 percent, the Divisional authorities did not stop further supply and installation of the equipment.

In January 2001, the Railway decided to replace the existing system with a better system. Accordingly, the old system was replaced, at a total cost of 0.88 crore (including cost of maintenance), with a new system between July 2002 and January 2005 within four years to nine years as against the old system's prescribed life of 15 years. The performance reports (February 2005, February 2006), however, indicate that even the new system was neither functioning properly nor suitable for making announcements to passengers. Thus, its reliability to ensure public safety was undermined.

The sequence of events that have taken place reveal that instead of testing the system on one or two rakes in the first instance, the Railway decided to go ahead to provide the same en-masse without any serious trials. Moreover, even after the failure of the system provided in the first instance, the system was replaced without conducting sufficient trials as a result of which an unproductive expenditure of Rs.1.42 crore has been incurred.

In their reply (July 2006), Railway Administration stated that the PAS worked well initially but developed faults after some time due to conversion of 9 car rakes into 12 car rakes. They also stated that the replaced system was as per RDSO approved specification. The reply is not acceptable because justification for provision of PAS clearly brought out the use of 12 car rakes and this fact was well known to the Railway all along. Moreover, the performance reports of both the systems indicate that they were defective from the very beginning. At best, the working was sporadic in a few coaches.

Thus, the failure of Railway to conduct sufficient trials of a new system before going for en-masse procurement resulted in unproductive expenditure of Rs.1.42 crore besides defeating the very purpose of its provision.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.1.10 North Eastern: Railway — Infructuous expenditure on complete track renewal of a section slated for gauge conversion

Complete track renewal (CTR) of a metre gauge section slated for conversion resulted in avoidable expenditure of Rs.4.80 crore

Keeping in view the age-cum-condition of track and to eliminate speed restriction imposed since 1996 due to weak structure, the work of complete track renewal (CTR) of Siwan (SV) – Thawe (THE) metre gauge (MG) section of Varanasi Division was sanctioned in 1999-2000 at an estimated cost

of Rs.7.46 crore. The CTR work was taken up in two phases – first phase from May 2000 and the second phase from October 2003.

Meanwhile, the gauge conversion of this section was also sanctioned in 1999-2000. Approval of Planning Commission for the same was also communicated by Board in October 2001. Nevertheless, the Railway took up the CTR of the section and incurred an expenditure of Rs.1.91 crore during 2000-01. The Construction Wing also conveyed (October 2002) to the Chief Track Engineer that in view of ongoing gauge conversion of this section, track renewal may be carried out in stretches, only where required from a safety point of view.

However, in complete disregard of these instructions, the Engineering department continued carrying out the CTR and completed 25 kms. out of the total 28 kms. By April 2005 and an additional Rs.2.89 crore was incurred after 2000-01. The CTR works were carried out to MG standards. It was noticed, however, that though speed restrictions were lifted, there was no improvement in the occupied time of all trains in the section though this was one of the main objectives of CTR. No reasons were available on record for the same.

Simultaneously, works relating to gauge conversion were also carried out from 2002-03 to 2005-06 and the BG line finally opened for traffic with effect from 27 December 2005.

When the matter was taken up (September 2006), the Railway Board stated (November 2006) that CTR was necessitated due to the condition of the track. Moreover, CTR was executed by utilising material which had been released after gauge conversion. The Railway Board's contentions are not accepted as the gauge conversion of the section was a known fact and carried out simultaneously. The released material could have been used more gainfully elsewhere.

Thus, taking up the CTR of an MG section by the engineering branch in spite of being fully aware that the section was to be converted to BG standards and continuing with it even when gauge conversion was going on resulted in infructuous expenditure of Rs.4.80 crore with absolutely no attendant benefits even for short periods of time.

3.2 Delay in completion/commissioning of works and inadequate planning

3.2.1 Western Railway: Non-achievement of expected benefits due to delay in completion of a work

Railway's failure to keep its land free from encroachments deprived them the benefit of additional net earnings of Rs.11 crore per annum for about six years and also resulted in cost escalation of Rs.35.13 crore on account of time over runs

Para 501 of Indian Railway Administration and Finance – An Introduction stipulates that effective planning of works and controlling the operations are essential tools of management to achieve known objectives. It is necessary to carry out a proper study of all conditions before sanctioning of a work as they

have a direct impact on scheduling and execution of the works. It is also imperative that the works are completed as early as possible so that the stated objectives are achieved. Para 3720 of Indian Railway Way and Works Manual also provides that it is the duty of every Railway administration to preserve unimpaired the title to its land and keep it free from encroachments. Permanent Way Inspectors/Works Inspectors are responsible for carrying out periodical inspections of the boundaries and report immediately the instances of encroachment, if any.

The work of quadrupling the lines between Borivali and Vasai Road (17.65 Kms), a section of the Mumbai suburban system, was included in the Works Programme of 1995-96 and extended up to Virar, an additional 10.20 Kms. in 1996-97. The detailed estimate amounting to Rs.401.66 crore was sanctioned by Railway Board in December 1997 and the works on the section commenced from January 1998. The work was justified on the grounds of increase in suburban traffic which could not be handled on the existing tracks and yield of net additional earnings of Rs.11 crore per annum from 2000-01 onwards. It was targeted for completion within three years i.e. by December 2000.

The Railway, however, could complete and commission only a part of the section between Vasai Road and Virar (10.20 Kms) by May 2004. Though the physical progress of the balance work as on May 2006 was 76 per cent, the physical progress of important works such as linking of tracks, interlocking, erection of OHE masts etc. was only seven to ten percent. The reasons for slow progress were attributed to large scale encroachments of Railway land required for laying of track. As a result of this, the target date for completion was revised to March 2007 and the cost of work increased by Rs.121.92 crore. Out of the total increase of Rs.121.92 crore, the increase on account of escalation in the cost of various items due to time over run of seven years alone was of Rs.35.13 crore.

In their reply (August 2006), Railway Administration stated that there were 335 encroachments, and rehabilitation of affected people took time due to involvement of external agencies such as World Bank, Non-Government Organisations, MMRDA etc. The reply is not acceptable. Audit scrutiny of records revealed that although encroachments on Railway land had started as far back as in 1982, no effective action was taken to remove or prevent further encroachments. It was also noticed that encroachments on Railway land were allowed to continue even after sanctioning of the project in 1995-96. As per Deputy Collector's letter of January 2002, out of 354 encroachers, around 63 persons were holding ration cards issued between 1995-96 and 2001-02. This indicates that Railway had not taken adequate action to protect its land through regular inspections and reporting. This eventually led to non-availability of land and consequent delay in execution of the works.

Thus, Railway's failure to keep its land free from encroachments deprived them the benefit of additional net earnings of Rs.11 crore per annum for about six years. It also resulted in cost escalation of Rs.35.13 crore on account of time over runs.

The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).

3.2.2 South Central: Railway — Delay in commissioning of new bridge due to inadequate care during construction

The casting of girders during the monsoon season despite a history of flash floods resulted in loss of Rs.1.17 crore due to speed restriction on existing bridge, damages to the new bridge and blocking up of capital (Rs.16.36 crore)

The Indian Railway Bridge Manual (Rules 609) stipulates that during the construction of pre-stressed concrete bridges, cribs and supports are to be used from below and girders are cast in situ. Due care will have to be taken in supporting the staging columns and to check the staging at various stages to see that it does not settle under the load when the casting of super structures is in progress. Further, provisions in Engineering Code also stipulate that Executive Engineer in charge of the work will be totally responsible for proper execution of work irrespective of executing agency.

An old bridge across the river Papagni on the Renigunta – Guntakal section with permanent speed restriction of 20 KMPH was proposed to be replaced by a new box girder bridge with 15 spans. The construction work of the new bridge was taken up (December 2002) and scheduled to be completed within two years. The staging was erected on RCC blocks. While casting PSC girder for span No.6 by the private contractor was in progress, one of the stagings, on which the PSC Box girder was cast, sank by five to seven centimeters due to flash floods (September 2004) and a 'U' shaped crack developed in the girder. After noticing the crack, repair work was undertaken. However, when a load test was conducted, development of tensile stress near the crack location was noticed which rendered the girder unfit. The process of rehabilitation of the damaged girder could be completed only in October 2006. The commissioning of the bridge has yet to be done (December 2006).

As a result, the Railway was forced to continue the use of old bridge with speed restriction. This resulted in avoidable expenditure of Rs.1.17 crore beside blocking of capital to the extent of Rs.16.36 crore after March 2005.

The Railway Board stated (November 2006) that there was no failure on their part as the delay in execution was due to unusual occurrence of high flash floods which was beyond human control and was unavoidable. The sinking of the staging was as a result of the scouring below the RCC block during the flash flood.

The reply is not tenable as the river has a history of flash floods, as seen from the records of the Central Water Commission, and the same should have been kept in view during execution of the work. Prudence dictates that the work should not be carried out in the monsoon months, particularly in view of the history of flash floods during the monsoon months.

Thus, the Railway's failure in taking into account the river profile and failure to take care during execution resulted in the continued use of an overaged bridge and costly speed restrictions.

3.2.3 East Coast Railway: Loss due to wasteful expenditure on Tunnel Ventilation system

Poor management of a tunnel ventilation project resulted in wasteful expenditure of Rs.5.33 crore

The Koraput-Rayagada new Broad Gauge (BG) line with several tunnels was opened in December 1995 for goods traffic. While according sanction for introduction of coaching traffic, the Commissioner of Railway Safety, South Eastern circle recommended ventilation arrangements in tunnel numbers 23 and 25 as a safety measure as also for better haulage of Diesel Locomotives. Accordingly, a contract to provide the ventilation system was awarded at a final cost of Rs.3 crore to a firm (M/s C. Doctor and Company) with the initial date of completion as 4 September 1999 but finally extended upto 30 November 2002. A total payment of Rs.2.55 crore was made to the contractor and only Rs.0.30 crore was withheld. In addition, an amount of Rs.0.08 crore was paid to the consultant for this project. The ventilation system has, however, not been commissioned so far (December 2006) and is not likely to be in future also as brought out below.

Audit scrutiny of records relating to progress of this project and reasons for its non-commissioning revealed that in spite of the Railways having pointed out a number of defects during execution (December 2000 to June 2002), these were not attended to by the contractor. In spite of this and notwithstanding the defective nature of the system, the Executive Electrical Engineer (Construction) issued (September 2002) a certificate clearly stating that the equipment provided was in order and that the performance was satisfactory. When the Railway was aware of major defects and the working of the system was not verified to their satisfaction, issue of such a certificate was premature and not consistent with the agreemental clauses thereby failing to safeguard Railway's interest.

The Chief Electrical Engineer of the then South Eastern Railway, however, refused to take over the defective system. It is also pertinent to note that Open Line was not consulted either prior to taking up of the project or during implementation though the responsibility of maintenance and operation of the system rested with them. On 13 September 2002, the power supply was disconnected at the request of Open Line rendering electrical equipments including imported jet fans worth Rs.1.03 crore mounted in the tunnel unserviceable due to absorption of moisture.

The Railway Administration continued requesting (June/July/December 2003 and March 2004) the contractor to rectify several major defects. However, defects were not rectified by the contractor on the grounds that he had received an unconditional commissioning certificate.

As a result of non-commissioning of the system for such a prolonged period and as a result of the failure to safeguard Railway property some of the

installed equipment (Rs.0.27 crore) was stolen and some of the equipment, valuing Rs.0.66 crore which was dismantled and shifted to electrical stores became unserviceable. An amount of Rs.0.61 crore was paid towards electricity charges up to December 2004 besides dues (Rs.0.13 crore) thereafter till expiry of the agreement for power supply in June 2005 without any fruitful utilisation of the energy.

Thus, the Railways incurred a wasteful expenditure of Rs.5.33 crore on a project because of poor contract management and hasty issue of clearance certificate.

The matter was taken up with the Railway Administration in February 2006. In reply, Railway Administration stated (June 2006) that the test certificate issued was for individual equipment and not for the whole system, and the certificate did not absolve the contractor from his liability to attend to the defects for which the system could not be commissioned. The arguments of the Railways are not tenable in view of the fact that the Railway issued an unconditional certificate of satisfactory performance of all the equipments installed in violation of contractual provisions and it was only on the basis of this certificate that the contractor subsequently refused to attend to the defects which resulted in non-commissioning of the system.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.2.4 North Central: Idling of investment due to non-Railway commissioning of a pipeline

Non-completion of the work of additional pipeline, eleven years after its sanction, as a result of inefficient contract management, resulted in idling of assets created at an expenditure of Rs.4.65 crore

Jhansi is a Divisional headquarters and an important station where adequate supply of water without interruption is necessary for the travelling public and carriage watering arrangements. Since water supply from Gariah Dam, Jhansi had reduced considerably due to heavy silting and the water supply from Naut Ghat, Jhansi was not sufficient to meet the future requirement, the Divisional Railway Administration proposed (September 1991) laying of an additional pipeline (450 mm dia) between Naut Ghat and the Filter House, Jhansi in the Final Works Programme for the year 1992-93. This work, comprising civil engineering works (laying of pipeline) and electrical works (installation of 33.04 KV substation with two transformers of 500 KVA), was sanctioned in December 1994 at an estimated cost of Rs.4.03 crore.

In order to execute the work, stores worth Rs.3.50 crore were procured and the contract for laying additional pipeline was awarded in February 1996 for Rs.0.44 crore. The work was to be completed by January 1997. After executing only a part of the work, however, the contractor stopped working from October 1998, much after the due date of completion. The Railway took another two and half years to rescind this contract (August 2000) and award the balance work (Rs.0.12 crore) to another contractor in June 2001 at a cost of Rs.0.19 crore to be completed by December 2001. This contractor was

given four extensions up to October 2004 on grounds of non-completion of electrical works though the electrical works had been completed by September 2001, indicating a serious lack of co-ordination between the Electrical and Engineering departments. The second contractor also discontinued work after 14 April 2004, after execution of work worth Rs.0.12 crore.

The pipeline has remained un-commissioned so far (December 2006), as repeated attempts to carry out the load testing of motor resulted in bursts and leakages. No attempt was made, however, to analyse and rectify the exact cause for the pipeline bursting.

Thus, the work sanctioned in 1994 and slated to be completed by January 1997, had not been completed so far (December 2006), even after a decade and the assets created at an expenditure of Rs.4.65 crore were lying unproductive as a result of the Railway's failure to monitor the contracts effectively. The inordinate delays in rescinding and awarding contracts coupled with the poor co-ordination between departments and failure to take corrective action has resulted in the idling of assets.

When the matter was taken up (April 2006), the Railway claimed (August 2006) that the pipeline had been commissioned in December 2005 and the investment was serving the purpose for which it was intended. This, however, is not borne out by facts as during December 2005 to June 2006 (seven months), the pipeline was used for only 18 days and that too for 35 hours.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.2.5 West Central: Railway — Injudicious planning of work leading to blocking of funds and avoidable expenditure

Piecemeal replacement of a pipeline led to non-achievement of benefits from assets created at a cost of Rs.3.11 crore and avoidable expenditure on purchase of water amounting to Rs.0.81 crore

The main source of water supply for Railway establishments at Jabalpur is the Narmada river. The intake point is located at Gwarighat. From Gwarighat, the water is pumped to the booster station at Rampur (3.7 kms) from where water is brought to the filtration plant located near Jabalpur station (5.5 kms.) for further supply to the railway establishments. Thus, the pipeline is in two parts, with Rampur as the connecting point.

As the pipeline laid in 1963 was in worn out/ distressed condition, a proposal (July 1998) for replacement of the second part of the existing pipeline (14 inches dia) with a pipeline of bigger dia (500 mm) from Rampur pump house to filtration plant, was sanctioned in January 2001. Contract for this work was awarded in September 2001 and completed in November 2003 at a cost of Rs.3.11 crore. The filtration plant was also augmented at a cost of Rs.0.29 crore. The Engineering department, however, did not think of replacing the first part of the pipeline during this period.

Since the Railway Administration had not proposed replacement of the first part of the existing narrow pipeline between Gwarighat and Rampur pump house, water flow into the filtration beds at the end point could not be increased. As a result, the water requirement had to be met by purchasing water from the Municipal Corporation. Rs.0.81 crore was incurred from December 2003 onwards when the second part of the pipeline was completed. The replacement of the first part has been approved but contract has yet to be awarded (December 2006).

Thus, due to inadequate coordination in planning, the Railway spent Rs.3.11 crore on replacing the second part of a pipeline without realising any benefits. This amount would continue to remain blocked up till the first part is also replaced. Meanwhile, the Railways continue to purchase water from other sources incurring expenditure thereon.

Railway stated (July 2006) that primary consideration for replacement of existing pipeline between Rampur pump house to filtration plant was to overcome the repeated failures of water supply due to overage worn out and distressed pipeline and also to meet the increased demand for water supply.

The Railway's arguments are not tenable. Railway had laid the entire stretch of the pipeline in the year 1963 and, therefore, the entire pipeline was overaged. The work of replacement of pipelines should have been taken up in one go to reap the benefit of investment instead of in a piecemeal manner.

The matter was brought to the notice of Railway Board September 2006; their reply was awaited (December 2006).

3.3 Deficiencies in contract management

3.3.1 All Indian Railways: Review of Arbitration Awards

Poor contract management practices and delays in finalising arbitration cases has led to avoidable payment of Rs.13.31 crore as well as prolonged litigation

With the advent of the Arbitration and Conciliation Act in January 1996, Railways also revised the existing arbitration clauses in the Standard General Conditions of Contract in August 1997. All disputes and differences of any kind whatsoever arising out of or in connection with a contract shall be referred by the contractor to the Railway and the Railway shall, within 120 days of the receipt of the contractor's representation make and notify decisions on all matters referred to by the contractor. If the Railway fails to make a decision within 120 days, the contractor should demand within 180 days for referring the matter to arbitration. The claimant will submit his claim to the Arbitral Tribunal, within 30 days of its appointment, all details/ documents pertaining to his claim and the Railway will submit counter claim within 60 days of the receipt of the claim from the Tribunal. If claims are not preferred by the party within 90 days from the date of intimation of the final bill, he cannot seek arbitration. The Tribunal may award interest for any period from the date of dispute to the date of award at 18 per cent, unless specific rate of interest is awarded by the Tribunal. Thus, the contractual

clauses envisage not only a procedure for resolving disputes but also provide for timely disposal of these cases.

Analysis of finalised arbitration cases:

The Arbitration Awards finalised during the period 2002-03 to 2005-06 on twelve of the sixteen Zonal Railways and Metro Railway/ Kolkata were reviewed to verify the efficacy of the system.

A total of 2,228 cases were dealt with during the years 2002-03 to 2005-06 on the 13 Railways. A Railway wise analysis showed that the maximum number of cases dealt with was on Northern Railway (348) followed by Central (290), South Eastern (276), South Central (239) and Eastern (235) Railways.

Of these, only 782 cases were finalised in the last four years. Of these finalised cases, 704 (90 per cent) were awarded against the Railways resulting in payment of Rs.49 crore. The number of cases finalised, however, was the highest on South Eastern (148) followed by Eastern (120) and South Central (108) Railways indicating poor performance in the speedy finalisation by Northern and Central Railways.

Reasons for disputes leading to Arbitration:

The large number of cases decided against the Railways indicates that the fault essentially lay with the Railways for not following the contract management practices as prescribed by various codes and rules.

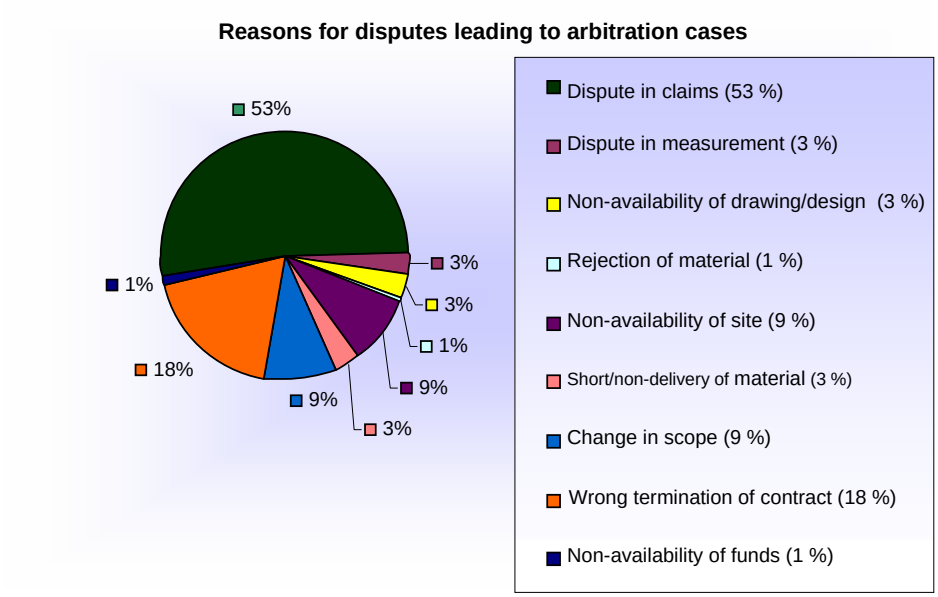
(i) Of the cases decided against the Railways, 434 cases (19 per cent) were test checked and an analysis showed that the disputes were largely on account of calculation mistakes, non-supply of material or supply of defective material, delay in settlement of bills, withholding of payments, change of design, non-clearance of site, change in scope, wrongful termination of contracts etc. The maximum number of disputes (53 per cent) was on account of non-finalisation of bills on various counts such as variations not being sanctioned, price escalation disputes, payment for extra works carried out etc. A few instances are given below:

- TDU-MQR double line moorum blanketing – C.A. No.19/CAO/C/90 dated 16 September 1990-Due to delay in handing over of the site to the contractor in a case pertaining to 1990 decided in 2004-05, Rs.0.56 crore had to be paid by the Railway along with payment of interest of Rs.0.34 crore.
- Bridge No.24 across MOOSI– C.A. No.36/CAO/C/92 dated 16 June 1992-The case pertaining to a contract of 1992 was awarded in favour of the contractor in 2005-06 for Rs.3.50 crore and an amount of Rs.2.13 crore had to be paid as interest on grounds of delay in handing over site and final variations.
- ROB between Nuzvid and Vatlur– C.A. No.68/CAO/C/98 dated 26 June 1998-Due to non-finalisation of designs and drawings, the contractor was awarded Rs.0.69 crore on grounds of idling plant and machinery. The Railway also had to pay an amount of Rs.0.40 crore as interest.

(ii) Maintenance of relevant records such as site books and measurement books was inadequate leading to disputes on measurements. Tenders were floated/ finalised without making ready the site, designs/ drawings resulting in incomplete/ inadequate or contradictory information about the work. There were cases (12) also of midstream changes in scope of work resulting in disputes regarding payments.

(iii) The amounts involved in the disputes ranged from petty amounts such as Rs.1,653 on Northern Railway where a dispute in a white washing contract has been pending from 1991 onwards, to as high as Rs.17 crore on South Central Railway pending from the year 2002.

Thus, the failure of the Railways to adhere to various Railway Board instructions regarding proper contract management has resulted in these arbitrations, a large percentage of which could have been easily avoided.



Delays in finalisation of arbitration cases:

It is extremely important that where the parties concerned opt for arbitration, the cases are disposed, as speedily as possible. An analysis of the arbitration cases both finalised during the period 2002-03 to 2005-06 and ongoing as on date shows inordinate delays at every stage. Even the appointment of arbitrators has taken unconscionably long periods of time. Test check of cases on South Central Railway revealed inordinate delays for more than 13 years in the appointment of arbitrators after receipt of application for arbitration, as against the 30 days permitted by the Act.

In three cases, the arbitrator was yet to be appointed though the applications were received during January 2005. Even after the appointment of arbitrators, the deliberations and hearings have been badly delayed due to various problems such as, transfer of arbitrators appointed by the Railway Administration leading to appointment of new arbitrators or non-availability of representatives of the respondent (Railway officers)/ claimant during hearings. In 58 cases where arbitrators were appointed prior to March 2005 and as far back as even 1992, no hearings had been held till date (March

2006). Out of these, 34 cases pertain to Northern Railway alone. A few instances of delays in finalising cases are listed below:

- Construction of IRS type shed for PF No.14 at Sealdah South Station – C.A. No.DEN/C/SDAH/31 dated 2 August 1993-For a claim of Rs.0.05 crore by the contractor, the arbitrator was appointed on 26 April 2001. Even after 54 sittings (23 February 2006), the case has not been settled.
- Construction of additional abutment on Tamna side approach on bridge no.414 (Up line) and allied works – C.A. No.7 dated 7 January 1993-The contractor applied for arbitration in October 1997 and claimed an amount of Rs.1.50 crore. The arbitrator was appointed on 27 March 1998. Though 93 hearings have been held, the case is yet to be disposed of finally. Meanwhile, the Railway Administration has filed a petition with the Honourable High Court citing delays by the arbitrator.
- Execution of earthwork in Sect.-I of Chandil-Suisa Diversion project - C.A. No.CE/C/GRC/27/87-The contractor applied for arbitration in 1996. The Arbitrator was appointed in February 1998. Though a few hearings were held, the Railway did not attend these. On the request of the arbitrator, he was replaced in August 1999. Though 117 hearings for the claim of Rs.0.72 crore have been held, the case is yet to be finalised.
- In three cases pertaining to Diesel Component Works (now Diesel Modernisation Works), the arbitrators appointed between 1999 and 2003 have been transferred to other Railways and new arbitrators are yet to be appointed.

The delays in appointment of arbitrators and finalising arbitration cases have their impact in the form of interest payments on the awards. Normally, 18 per cent interest is awarded on the principal from either the date of dispute or the date of award, to the date of payment, though the interest element is decided by the arbitrator. As against the awards of Rs.49 crore, the Railways have paid Rs.13.31 crore as interest in the cases finalised during the last four years alone. The maximum interest paid has been by South Central Railway (Rs.10.05 crore). In the case of two Railways (one case each on Central and West Central), the interest element has exceeded the final award in respect of cases finalised during 2002-03. Obviously, the interest element of the cases outstanding would also be very high and would increase with further delays. The liability of the Railways in these cases has neither been assessed nor monitored as seen from the unacceptably long periods of time taken to finalise the cases.

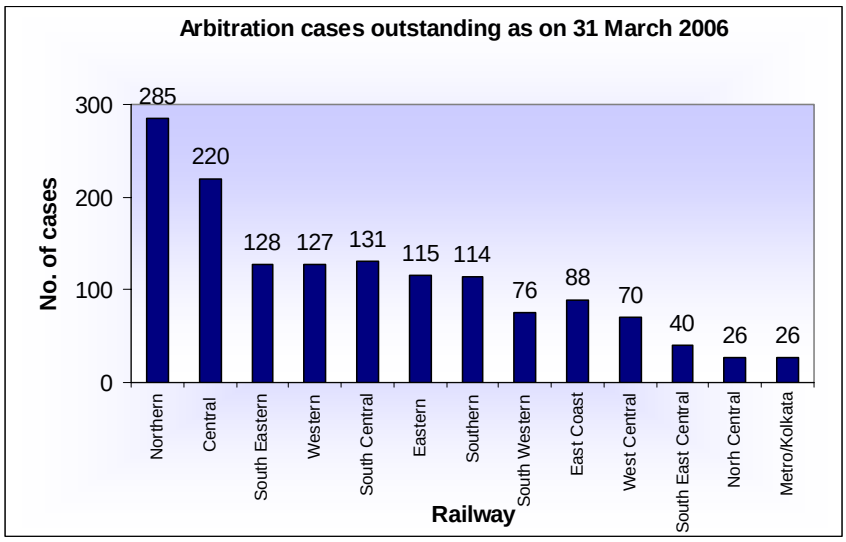
Delay in appointment of arbitrators by the Railways led to appointment of arbitrators by the Courts at higher rates. Test check of 12 cases on South Eastern Railway revealed avoidable excess expenditure of Rs.11.47 lakh towards payment of remuneration alone to arbitrators appointed by Courts.

Thus, the failure of the Railways to manage contracts as per laid down principles and procedures in the first place, compounded by their failure to

resolve disputes in time has resulted in prolonged unnecessary litigations as well as avoidable payment of Rs.13.31 crore as interest with a further unassessed liability.

Analysis of outstanding arbitration cases:

As on 31 March 2006, a total of 1,446 cases were outstanding on the thirteen Railways reviewed. Of these, 331 cases were initiated prior to 2002-03 i.e. were outstanding for more than five years. More than 35 per cent cases are outstanding on Northern and Central Railways alone. There were 55 cases outstanding for more than a decade of which 20 cases were on Northern Railway alone indicating the poor monitoring of these cases. The liability of the Railways in respect of these cases is not assessed and will only increase with the increase in time taken to finalise them.



Recommendations

- *It is recommended that the Railways review all the outstanding arbitration cases and take urgent action to finalise the cases.*
- *An assessment of the reasons for arbitration also needs to be carried out to prevent recurrence of lapses which result in avoidable litigation.*

The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).

3.3.2 North Western: Railway — Extra expenditure due to defective tender finalisation

Defective assessment of rates offered without considering impact of Price Variation Clause in procurement of Elastic Rail Clips led to an extra expenditure of Rs.1.50 crore

An open tender for the procurement of 9,24,000 Elastic Rail Clips (ERC) Mark III (RDSO No. T-3701) for use on track renewal works sanctioned for execution during year 2003-04 was issued in January 2003. The offers were

opened in February 2003 with a validity of six months and considered by the Tender Committee (TC) in June 2003. The lowest valid offers received were as follows:

Name of the firm	Maximum Quantity offered (in lakh)	All inclusive rates (Rs. Per ERC)	Remarks
M/s Amit Engineers, Panchkula	4.00	24.98	With PVC
M/s Metal Fab (India), Mohali	5.00	24.98	With PVC
M/s Wintek Industries, New Delhi	9.24	25.11	Without PVC

The TC, however, failed to analyse the impact of Price Variation Clause (PVC) on the offers of M/s Amit Engineers and M/s Metal Fab, two sister concerns. Taking the increase in price indices into account, the rates as on the date of tender finalisation were higher than that of M/s Wintek Industries.The rate offered by M/s Wintek was firm and without a PVC element and hence should have been considered as lowest because the all inclusive rate offered by the two sister concerns along with PVC element (Rs.25.33) was more than the rate of M/s Wintek (Rs.25.11). The TC recommended placement of the contract on the two sister concerns at the quoted rates. While placing the contracts, the rates were, however, pegged to the offer of M/s Wintek Industries and a maximum ceiling of Rs.25.11 (all inclusive) was imposed though the offer of the contractors was for unconditional PVC.

The two firms refused to accept the conditional contract with the result that the orders had to be cancelled (December 2003) at the 'risk and cost' of the contractors who appealed against this decision. The arbitrator appointed in this case held the 'risk and cost' as not valid (February 2005) since the contract placed a ceiling on the PVC which was not as per the offers. He held that the contract conditions had been arbitrarily changed by the Railway.

Meanwhile, the Railway purchased the clips against other tenders opened on December 2003 and March 2004 at the rate of Rs.41.34 (inclusive of PVC element). Thus, an extra expenditure of Rs.1.50 crore had to be incurred by the Railway because of a failure to assess the rates correctly taking into account all the cost elements.

The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).

3.3.3 Northeast Frontier: Incorrect assessment of reasonableness of Railway rates

Failure of the Railway Administration in correct assessment of reasonableness of rates for reconditioning of Broad Gauge Steel Trough sleeper into Metre Gauge Steel Trough sleeper resulted in loss of Rs.1.27 crore

The Engineering code stipulates that the reasonableness of rates should be gone into objectively by the accepting authority.

In connection with the restoration of the Metre Gauge (MG) branch line (62 kms.) between New Mal Junction (NMZ) and Changrabandha (CBD) of

Alipurduar Division, it was decided to use Metre Gauge Steel Trough (MGST) sleepers reconditioned from Broad Gauge Steel Trough (BGST) sleepers, which involved cutting of the longer BG sleeper to required dimensions. Since similar kind of work had never been executed on Northeast Frontier Railway, the Railway Administration estimated the cost of reconditioning each BGST sleeper as Rs.293.85 and the same was considered by the Tender Committee for assessment of the reasonableness of tendered rates. The basis for the Railway assessment of the rates is not known. Recommendations of the Tender Committee having been accepted, four contracts were executed between September 2000 and November 2000 at the rate of Rs.309/ Rs.310 per sleeper. 57,650 BGST sleepers were reconditioned at a total cost of Rs.1.78 crore.

Subsequently, in April 2002, tender for a similar work of reconditioning of 10,000 BGST sleepers was again floated on the basis of Railway Administration's assessed cost of Rs.361.69 for reconditioning each BGST sleeper. The Tender Committee, however, accepted the tender at a much lower rate of Rs.89 per sleeper.

In the absence of similar nature of work carried out in the Zone, the Railway Administration would have been well advised to examine the position available on other Railways. Audit scrutiny of similar nature of works being done on Western Railway revealed that in December 2000, around the same period as the Northeast Frontier Railway's initial orders, they had obtained a rate of Rs.36.70 per sleeper. North Eastern Railway had also got the work carried out at a rate of Rs.98 per sleeper (exclusive of cost of scrap material retained by contractor) in April 2001.

Thus, the Railway Administration failed to carry out a proper rate analysis and also failed to find out the rates prevalent on other Zones in the absence of previous experience. This resulted in acceptance of exorbitantly higher rates, even allowing for fluctuations due to local conditions. This was proved true, as in the subsequent year (2002), the accepted rate (Rs.89) was far lower than the rates accepted (Rs.309/ Rs.310) in September 2000/ November 2000, which resulted in loss of Rs.1.27 crore.

The Railway stated (July 2006) that since this was a new type of work for them the higher rates had to be accepted in view of the fact that the work was targeted and very urgent with a stipulation of reconditioning of specified number of sleepers per day.

The argument of the Railway Administration is not tenable as the Tender Committee made no mention of acceptance of higher rates due to urgency in their minutes and the rates were considered reasonable as compared to the rates estimated by the Railway Administration. Moreover, the fact that this was a new work as far as this Railway was concerned was all the more reason for cross verification with other Zonal Railways.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.3.4 West Central Railway: Improper contract management

Failure of the Railway to take due care in awarding and monitoring performance against contracts resulted in blocking up of Railway's funds amounting to Rs.1.19 crore and also affected the projects

In 1997, a private firm (M/s. Khem Chand) manufacturing sleepers applied for permission to shift his factory from Gosalpur, where the labour cost was stated to be high, to Pakariya Road and was duly given permission on the condition that he would bear all the expenses of setting up the factory and siding as well. He, however, failed to set up the siding.

In 2001, the Railway awarded a contract to the firm for manufacture and supply of 1,31,000 Mono-Block Pre-stressed Concrete (MBC) sleepers with delivery period upto March 2003. The factory could commence operations only from June 2003 after receiving permission from Research Design and Standards Organisation (RDSO). As per the agreement of the contract, Spheroidal Graphite Cast Iron (SGCI) inserts were to be supplied free of cost by the Railway. Railway supplied 3,68,475 SGCI inserts (till September 2003) and also paid an amount of Rs.0.24 crore as raw material advance to the firm. Even after two extensions granted by the Railway Board, the firm could manufacture only 29,948 sleepers (23 per cent) and utilised 1,19,792 SGCI inserts till December 2003. Thereafter, though the contractor applied for further extension, further production was stopped. The Railways have neither taken back the remaining inserts nor have they settled the advance paid to the contractor.

Despite his poor performance, the same firm was awarded (May 2003) another contract for manufacture and supply of 14,000 MBC sleepers. In this case, the SGCI inserts were to be procured by the firm from RDSO approved manufacturers. Against this contract too, the firm manufactured only 3,060 sleepers by March 2005 which were lifted by road by the Railway after more than one year as the siding had not been constructed by the contractor. The poor supply of the sleepers against both the contracts had an impact on track renewal works on the Railway as seen from the various extensions applied for and granted due to non-receipt of sleepers. Further, production against this contract ceased, pending extension of contract.

The Railway in reply stated (July 2006) that Railway Board will be approached for diverting unutilised SGCI inserts valuing Rs.0.95 crore lying at the firm's premises to some other firms/plants. As per the agreement, pro-rata recovery against raw material advance was to commence when the last 10,000 sleepers were left to be produced and supplied and hence recovery could not be made so far. Short closure of the contract was under process (October 2006).

Undue delay in taking action one way or the other after December 2003 led to blocking up of Rs.1.19 crore. Also, awarding another contract to the contractor when his performance against the earlier one was so poor was not understandable. This has resulted in time overruns in other projects as well.

Thus, the failure of the Railway to take due care in awarding and monitoring performance against contracts has resulted in blocking up of Railway's funds amounting to Rs.1.19 crore.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.3.5 Northeast Frontier Railway: Non-observance of provision for deduction of shrinkage allowance for earthwork

Failure of the Railway Administration to effect prescribed deduction for shrinkage from the gross quantity of earthwork as per provision of contract resulted in undue benefit to contractors to the tune of Rs.1.10 crore

In the construction of new lines or conversion from Metre Gauge (MG) to Broad Gauge (BG), the earthwork for the embankment is carried out using contractor's own earth or Railway's earth. The earthwork is required to be compacted by heavy mechanical means to increase the density of the soil and reduce compressibility so as to minimise uneven settlement during use. Normally, a shrinkage allowance of five per cent is provided where the compaction is carried out by heavy mechanical means.

Construction Organisation of Northeast Frontier Railway executed 25 contracts between February 2002 and July 2005 for earthwork to form embankment etc. in four different projects viz. Eklakhi – Balurghat (New Lines), Barsoi – Radhikapur and Katihar – Jogbani (Gauge Conversion) and Eklakhi – Kumarganj (Patch Doubling).

The contract document, inter-alia, comprises the 'Additional Special Conditions and Special Specifications' of contract, along with the 'Schedule of Items'. The work is to be executed in conformity with the tender/ contract documents such as 'General and Standard Special Conditions' of contract, 1998 and 'Standard Specifications' of Northeast Frontier Railway. However, if there is any conflict between the 'Additional Special Conditions and Special Specifications' on the one hand and the 'General and Standard Special Conditions' of contract, 1998 and 'Standard Specifications' of Northeast Frontier Railway on the other hand, the former shall prevail as spelt out in the contract documents.

Scrutiny of records revealed that as per 'Special Specifications' attached to the contract, the payment for earthwork with mechanical compaction was to be made on the basis of net quantity after deduction of shrinkage allowance of five per cent from the gross quantity. On the other hand, it was provided in the 'Schedule of Items' that no deduction in quantity would be made on account of shrinkage. It was also revealed that the payment of earthwork was made on gross quantity without effecting prescribed deduction for shrinkage and an additional expenditure of Rs.1.10 crore was incurred on this score. When the matter was taken up (August 2005), Railway Administration stated (May 2006) that the deduction for shrinkage was not made as it was so mentioned in the schedule attached to the contract.

These arguments are not tenable because the provisions laid down in 'Special Specifications' attached to the contract in respect of payment for earthwork after deduction of five per cent of shrinkage allowance shall prevail over the provisions in the 'Schedule of Items' for non-deduction of shrinkage. The 'Special Specifications' would, thus, have an overriding effect. Further, in respect of earthwork contracts of other projects in Northeast Frontier Railway, shrinkage allowance was deducted despite similar contradictions in the contracts. In other Railways also despite having the same specification for earthwork with mechanical compaction and method of measurement, payment was made after deduction of shrinkage.

Thus, failure of the Railways in proper administration of the provision of contracts resulted in overpayment to contractors to the tune of Rs.1.10 crore.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.3.6 Northeast Frontier: Railway — Undue benefit to contractors due to inflated measurement of earthwork

Failure of the Railway Administration to adhere to the extant provisions for payment on actual measurement of earthwork resulted in irrecoverable loss of Rs.0.87 crore towards interest and non-realisation of Rs.0.10 crore paid in excess to the contractors

Rules provide that the quantity of work done by the contractor should be recorded in the measurement books clearly and accurately. In cases, however, where 'on account' payments are made on the basis of approximate measurements, detailed measurements may be dispensed with for the works actually executed. It should, however, be certified by a responsible officer (not below the rank of Assistant Engineer) that not less than the quantity of work paid for has actually been done and that the measurements are from plans or that they are approximately estimated. The officer granting such certificate will be held personally responsible for any overpayment, which may occur on the work in consequence. Final payments should in no case be made without detailed measurement.

Scrutiny of records relating to the measurement and payments for earthwork in respect of three earthwork contracts executed by the Construction Organisation in connection with the construction of new line between Kumarghat and Agartala revealed the following:

In November 1999, one earthwork contract was awarded to M/s.Himangshu Paul, Silchar. Payments to the tune of Rs.0.66 crore were made in excess between December 2000 and November 2002 due to faulty measurements duly certified by the Executive Engineer. The excess payment was detected only at the time of final measurement in May 2003. Subsequently, when the final bill was passed in January 2006, after another two and half years, the Railway Administration recovered the excess amount of Rs.0.66 crore. Thus, the excess amount paid was available to the contractor for various periods ranging from three to five years.

In November 2000, two more earthwork contracts were awarded to M/s.ECI Engineering & Construction Company Limited, Hyderabad. Payments were made through 'on account' bills as per quantities of earthwork certified by the Executive Engineer. Due to tardy progress of work, the Railway terminated the contract in August 2004 at the risk and cost of the contactor. At the time of final measurement (August and December 2004), it was revealed that the quantity actually executed by the contractor was much less than the quantity certified by the Executive Engineer(s). Till March 2002, an amount of Rs.0.72 crore was paid in excess to the contractor, of which, Rs.0.25 crore was paid on account of items of work not done at all. The credibility of the certificates given by the Executive Engineer(s) are, therefore, suspect.

Since the amount of excess payment made so far could not be recovered from the final bill, the security deposit and earnest money valuing Rs.0.62 crore were forfeited. The balance dues have not been recovered so far. Apart from the above, recovery of an amount of Rs.0.04 crore from the defaulting contractor towards risk and cost has also not been made.

No responsibility has been fixed for the faulty measurement leading to the excess payments either.

Thus, due to faulty measurement certified by the Executive Engineer, excess payments of Rs.1.38 crore were made to the contractors. The delays in passing final bills when recoveries were actually made gave them unjustified advantage, enabling them to retain the amounts for periods upto 33 months. The loss of interest alone would amount to Rs.0.87 crore. Moreover, Rs.0.10 crore of the excess payment has not been recovered at all.

The matter was brought to the notice of Railway Board in August 2006; their reply was awaited (December 2006).

3.3.7 South Eastern: Railway — Loss due to injudicious rejection of initial offers of contractors

Railway Administration's injudicious rejection of initial offers and acceptance of subsequent offers at higher rates resulted in a loss of Rs.0.76 crore in two works contracts

It is important for the Tender Committee (TC) to examine rates quoted in the light of prevailing market circumstances and take judicious decisions accordingly. The following two cases highlight the injudicious rejection of offers received resulting in extra expenditure due to acceptance of higher rates in subsequent tenders.

The first case pertains to the construction of an Electric Loco Shed at Bokaro. The Railway Board, in the background of unprecedented rise in steel price had recommended (March 2004) that for projects involving large supplies of steel with Price Variation Clause (PVC), the contractor can be asked to substantiate the claim for adequate compensation and on merit, the case may be sent to the Board for consideration. A tender was opened in December 2003 for the construction of the shed at an estimated value of Rs.6.38 crore which included supply of steel with PVC. The eligibility criteria inter-alia included previous

working experience on execution of similar jobs. M/s Civtect (I) Pvt. Ltd, the fourth lowest tender was closest to satisfying this eligibility criterion. Therefore, the TC recommended (March 2004) negotiation with the firm for reduction of their quoted rates of Rs.6.59 crore.

During negotiation, the firm expressed (April 2004) their inability to reduce the quoted rates and put forth a further proposal for compensation on actual basis for price hike of steel that took place between January 2004 and March 2004 just before the finalisation of this tender. This request was, however, summarily rejected and the Railway placed an order at the quoted price only. The firm declined to take up the job and the contract had to be terminated in April 2004.

Subsequently, in June 2004, a second tender was opened at the enhanced assessed value of Rs.6.82 crore. In this case, M/s Civtect (I) Pvt. Ltd's offer of Rs.7.22 crore, was rejected, surprisingly, on grounds of not fulfilling the eligibility criteria though he had been considered as the only eligible firm just seven months earlier. M/s Jay Bharat Construction, (not even considered during the first tender because of ineligibility in respect of work experience), was awarded (October 2004) the contract at a negotiated value of Rs.7.33 crore with PVC. Thus, Railway Administration's arbitrary rejection of M/s Civtect's request for compensation without referring the matter to Railway Board or considering the effect of price rise resulted in an extra expenditure of Rs.0.44 crore and was in contravention of Railway Board orders on the issue.

Railway stated (July 2006) that the instant case, not being an ongoing work, did not merit Board's consideration. This reply is not tenable since the Railway failed to appreciate Railway Board's instructions in its proper perspective especially when they were aware of enormous price hike of steel during the intervening period. This resulted in extra expenditure of Rs.0.44 crore.

In the second case, a tender at the estimated value of Rs.1.56 crore to supply stone ballast along the alignment of Ranchi-Lohardaga Railway Line, was discharged (October 2002) mainly because the offers were on the higher side (27 per cent, 28 per cent and 28.5 per cent above the estimated value), although the TC admitted that there was considerable rise in price of fuel etc. A second open tender was also discharged (February 2003) owing to non-fulfillment of eligibility criteria by any of the tenderers.

Finally, in a third open tender only one offer was received (July 2003) from M/s Modi Construction Company at a value of Rs.2.44 crore brought down to Rs.2.32 crore (48 per cent above the estimated value of first tender i.e. Rs.1.56 crore) after negotiation. Interestingly this firm had earlier quoted Rs.2.00 crore i.e. 28 per cent above the said estimated value. The TC was faced with strict deadlines and accepted the high rates. Thus, the TC rejected an offer as too high nearly 9 months before but ended up accepting an even higher offer at an extra expenditure of Rs.0.32 crore due to urgency. Further, the TC's decision was all the more unjustified in the background of acceptance of much lower rate in the same month, for the same nature of work having the same period of supply (nine months) of almost identical quantity, in the adjoining section.

The Railway stated (July 2006) that the TC discharged the first tender at a time when there was no target set for completion of the project moving with slow progress, and accepted the higher rates subsequently when a stiff target was set for completion. This establishes the audit contention that had the Railway Administration judiciously decided to finalise the first tender instead of discharging it, they could have avoided the situation faced with strict deadlines that forced them to accept the higher rates.

Thus, the Railway Administration's injudicious rejection of initial offers and acceptance of subsequent offers at higher rates resulted in a loss of Rs.0.76 crore (Rs.0.44 crore + Rs.0.32 crore) by way of avoidable extra expenditure in two contracts. The rejection of offers without carefully considering all the circumstances has also resulted in a considerable waste of time and effort leading to delays in projects.

The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).

3.3.8 East Coast Railway: Loss due to incorrect recovery of dues

Railway Administration's failure to recover their dues correctly led to a loss of Rs.0.53 crore

A contract was executed (May 1993) for supply of 1.23 lakh cum of ballast to be completed by December 1994. The Special Conditions of Contract (Clause 3.37 to 3.39) stipulated that Machinery and Mobilisation Advance (s) together with interest thereon should be recovered from contractor's bills in installments on pro-rata basis. Scrutiny of records revealed that contractor was paid Rs.0.20 crore in July 1993 as Mobilisation Advance and was further paid (April 1994) Rs.0.35 crore as Machinery Advance.

Since the supply was not completed by December 1994, seven extensions (last one upto December 1998) were granted to the contractor with the condition that no price variation would be payable after December 1994. The last extension was given by the construction wing only in order to be able to recover the amounts advanced to the contractor though they had no further need for the ballast and the supplies were to be diverted to Open Line Organisation. The ordered quantity was also reduced to 87,000 cum in June 1994 due to non-adherence to the supply schedule. The contractor could, however, supply only 35,091.141 cum (40.33 per cent) upto December 1998 against even this revised reduced quantity. The balance ballast required had by then been obtained from other sources. Thus, the performance against the contract was poor right from the beginning.

The contract was finally closed in June 1999 at a value of Rs.1.13 crore. While closing the contract, the competent authority categorically mentioned that dues should be recovered by adjustment against Security/ Fixed deposits, and hypothecation bond. However, only a portion of the dues, as assessed by audit, could be adjusted and Rs.0.53 crore inclusive of the interest upto November 2005 payable by the contractor as per the terms of the contract remained due. In spite of this the contractor was allowed to take back his machinery costing Rs.0.52 crore hypothecated to the Railway.

This situation could have been avoided if the Railway had recovered the amounts on priority basis from the 'on account' bills, particularly since they knew from the beginning that the performance against the contract was quite poor. At the very least, the contractor need not have been allowed to take back his machinery till the clearance of all dues.

Thus, Railway Administration's failure to recover their dues from the contractor in violation of contractual provisions, lack of follow up action to recover the outstanding amount and invoke hypothecation bond led to a loss of Rs.0.53 crore.

Railway Board stated (December 2006) that the contractor had removed the hypothecated machinery and plant without the knowledge of Railway and no legal action against the contractor was taken on this account. The recoverable amount was being advised to all concerned for effecting recovery.

The reply is not tenable since the Special Conditions of Contract clearly stipulate that interest has to be calculated from the date of grant of advance and the recovery made from the immediate running on account bills. Failure to do so resulted in an amount of Rs.0.53 crore together with interest up to November 2005 as assessed in audit not being recovered so far.

3.3.9 South Eastern: Railway — Loss due to non-observance of conditions of contract in timely fixation of non-schedule rates

Railway Administration's failure to finalise rates of non-schedule items coupled with inordinate delay in payment of admitted part of the contractor's claim led to protracted litigation and an avoidable payment of Rs.0.52 crore towards interest

A contract for rebuilding of piers of Bridge number 39 between Uluberia and Chengail (in Howrah – Kharagpur Main Line) was awarded in March 1987. Due to difficulties during construction of piles, caps and piers by bailing/ diverting water of the canal as provided in the agreement, the work was done with the help of cofferdams and floating steel pontoons. Since the Schedule of Rates (SOR) under General Conditions of Contract (GCC) did not have rates for the items of work executed using the techniques adopted, fixation of rates for non-schedule items was warranted in terms of Clause 39 of GCC. However, Railway Administration failed to finalise the rates for non-schedule items either before or after commencement of the work. The work was completed in January 1989.

Due to the failure to finalise the rates, disputes arose between the contractor and the Railway regarding the amounts to be paid. Though the Railway admitted an amount of Rs.0.29 crore as payable to the contractor against the claim of Rs.1.18 crore, even this was not paid. An arbitrator was appointed who passed an interim award in 1998 leading to the payment of Rs.0.81 crore to the contractor. This amount comprised the admitted portion of Rs.0.29 crore and Rs.0.52 crore as interest thereon.

In July 1999, the final award of an additional amount of Rs.0.88 crore with an interest liability of Rs.1.65 crore was passed. The Railway challenged this award and finally made the payment of award in December 2003. The payment of interest, however, has yet to be decided as the Railway has filed another Special Leave petition in the Apex Court (December 2005) after losing the case at High Court level.

Thus, the failure of the Engineering department of South Eastern Railway to fix the rates of non-schedule items in a work before the execution of these items of work in contravention of standard contractual provisions, compounded by their failure to pay even the admitted portion of the contractor's demand has resulted in unnecessary prolonged litigation of 16 years, an avoidable payment of Rs.0.52 crore so far by way of interest and possible further liability of interest yet to be decided by the Apex Court (October 2006).

When the matter was taken up (May 2006), Railway administration stated (July 2006) that it was binding on the contractor to adopt and resort to any technique he thought fit and to be the most cost effective for him to execute the work. Hence it was not possible for Railway to fix any non-schedule rates for any alleged 'extra work' as no extra work was done by the contractor.

The reply is not tenable as it was necessary for the Railway to fix the rates for items of work carried out either before execution or while execution of the work irrespective of the technique adopted by the contractor. Moreover, the Railway had admitted an amount of Rs.0.29 crore but had not paid it resulting in avoidable payment of Rs.0.52 crore towards interest.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.4 Avoidable/Extra expenditure on works

The Indian Railway Way and Works Manual lays down standards for earthwork, soil, ballast and sleepers to be used in the laying of tracks on different categories of lines and yards both in quantitative and qualitative terms. Non-compliance with these standards results in deficiencies in the track structure which could have serious implications for safety or in avoidable excess expenditure without any attendant benefits. The following paragraphs 3.4.1 to 3.4.4 bring out such deviations from the norms laid down.

3.4.1 North Eastern: Railway — Loss due to use of soil unfit for construction of embankment

Weak formation of embankment with clayey soil during construction and, later, non-adherence to RDSO's recommendations for blanketing resulted in loss/damage to stock amounting to Rs.39.92 crore

Rules provide that clayey soil, CH black cotton soil, poorly graded soil and peat should not be used for Railway embankments. The Rampur - Kathgodam metre gauge (MG) section (89.15 kms.) was converted into broad gauge (BG) section and opened for traffic in three phases between March 1992 and March

1994, after obtaining the certification of Research, Designs and Standards Organisation (RDSO) and the Commissioner for Railway Safety (CRS). Due certificates regarding the soundness of the track were also given by the Chief Engineer (Construction).

Immediately thereafter, problems with the track were noticed. Drivers reported rough riding leading to forced speed restrictions. During the ensuing years, RDSO was consulted twice and both times they opined that the track structure was bad and 'Blanketing' was recommended. The Engineering branch in charge of the maintenance of the open line, however, carried out only stopgap measures and the root cause of the problem was not addressed. As far back as in 1995, the Railway Board was informed of the problems in the track structure but no serious action was taken even then.

Due to this inaction to stabilise the formation, an accident of a goods train took place on 15 August 2003 causing heavy damage to track and wagons to the extent of Rs.39.92 crore (including Rs.39.74 crore due to premature condemnation of stock). The enquiry committee concluded (August 2003) that the main reason for the accident was weak formation and held the Engineering department responsible. It culminated with a minor punishment imposed upon a Junior Engineer. The Construction wing which had failed to ensure quality control and in the bargain had also given wrong certificates was not penalised on the grounds that there were no untoward incidents in the ten years after the opening of the line.

The Railway failed on two major counts. One, in ensuring quality at the time of construction. All the authorities concerned certified the track as of sound condition fit to run trains at 80 kmph despite the intrinsic defects in the track structure. Hence, the certificate of track soundness given by the Construction wing at the time of commissioning becomes suspect. Two, although in the ensuing ten years the problems due to defective track were known to all concerned and the solutions were also pointed out, the Railway did not give due importance to the issue till it resulted in an accident.

The accident took place in 2003, but till date (October 2006) remedial action for blanketing has been taken in only a two km. stretch against the total of 21.13 kms. identified as having unstable formation where the entire section would have to be rehabilitated. Tenders were under finalisation for another 1.6 kms. This slow action, two and a half years after an accident on a line which carries passenger traffic as well reflects the continued indifference of the Railway. The speed restrictions involving recurring loss continue.

When the matter was taken up (September 2006), the Railway Board stated (November 2006) that initially relatively simple alternative arrangements were attempted and thereafter treatment with blanketing over the most troublesome portions was taken up.

These arguments are not acceptable in view of the RDSO recommendations. Action to treat the formation has been taken up only after an accident in 2003. Moreover, the remedial action continues to be inadequate despite a loss of Rs.39.92 crore.

3.4.2 Northeast Frontier Railway: Extra expenditure due to ballast utilisation beyond permissible limits of requirement

Ballast utilisation beyond permissible limits of requirement during gauge conversion works resulted in extra expenditure of Rs.8.43 crore to the Railways

Indian Railway Permanent Way Manual (Rule 263) provides that ballast quantity required on an average for a ballast cushion of 250 mm and 200 mm for a km. of Broad Gauge (BG) (single line long welded) track on PSC sleepers will be 1,993 cum for main line and 1,428.5 cum for loop line respectively.

The Katihar – Jogbani section of Northeast Frontier Railway was a busy section with three pairs of passenger trains. In June 2002, Railway Board sanctioned gauge conversion of the Katihar – Jogbani section (104.47 kms.) including Barsoi – Radhikapur section. The work for Barsoi – Radhikapur (54.42 kms.) stretch was completed and the line was opened for traffic in February 2006. The detailed estimate was for a total amount of Rs.257 crore. As per codal provision, 1.38 lakh cum of ballast was required to be spread in the converted stretch of 61.82 kms. (main line-54.42 kms. and loop line–7.40 kms.) after allowing an extra eight per cent for shrinkage. This would further get reduced if the already available ballast (0.43 lakh cum) on the MG formation is taken into consideration.

The construction organisation, however, procured 1.56 lakh cum of ballast between March 2003 and May 2005 (three contracts) and a further 0.30 lakh cum in September 2005 (two contracts) at a total cost of Rs.19.72 crore as against the requirement of 1.38 lakh cum. As per records, 1.82 lakh cum were shown as spread on the track, even though only 0.95 lakh cum (1.38 lakh cum – 0.43 lakh cum of old ballast available in the MG track) needed to be spread.

Thus, there was an excess utilisation of 0.87 lakh cum of ballast costing Rs.8.43 crore on the track.

When the matter was taken up (April 2006) with the Railways, they stated (August 2006) that out of the total 0.30 lakh cum of ballast procured from Pakur, some ballast rakes were diverted to other sections to meet urgent demands of those sections and there were serious deficiencies of ballast in the MG formation. According to them, the actual requirement of ballast was 1.75 lakh cum for the converted stretch of 61.82 kms. which interalia included 10,878 cum for curves, bridges and points and crossings, 6,000 cum for MG track at Radhikapur and 21,768 cum of additional ballast to make good all local depression caused after removal of MG track. The ballast available on MG track was assessed as 100 cum per km.

These arguments are not acceptable as the excess utilisation of ballast as assessed by audit has taken into consideration the requirement of 10,878 cum for curves, bridges and points and crossings. The MG track at Radhikapur is beyond the scope of this work and not included in this estimate. Moreover, the entire quantity of ballast received was unloaded in the section and spread in the track except 3,398 cum available in stock. There was no record of any

diversion. Further, at least three pairs of passenger trains and other goods traffic were running on the track before conversion. As per records, a quantity of 5,375.694 cum of ballast had been spread on the MG track in the two years prior to conversion. As such, the MG track should have had a minimum cushion of 0.43 lakh cum of ballast. The Railway assessment of 100 cum of ballast per km. would mean that there was hardly any ballast on the MG track and therefore, was not safe for running of passenger trains. It is inconceivable that a track on which passenger trains were regularly operated and where maintenance had been carried out regularly did not have the minimum ballast cushion of 150 mm. Moreover, as per records nearly Rs.0.26 crore had been spent on the cleaning and spreading of old ballast available on the MG track. There is, thus, gross under-assessment of the ballast already available on the MG track.

Thus, excess procurement and stated utilisation of ballast had resulted in an excess expenditure of Rs.8.43 crore.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.4.3 North Western and: South Western Railways — Excess procurement of ballast due to over-estimation of requirement

Overestimation of requirement of ballast and deviation from norms for Gauge Conversion works resulted in excess procurement of ballast worth Rs.5.81 crore

The Gauge Conversion (GC) of the Metre Gauge (MG) line between Bandikui and Agra Fort (151 kms.) on North Western Railway was taken up during 1998-99 and completed in two phases in 2004-05. The requirement of ballast estimated by the Railway for this work was 3,07,000 cum. after applying the norms prescribed in the Indian Railway Permanent Way Manual (IRPWM). These norms provide for a 250 mm ballast cushion for the mainline and 200 mm ballast cushion for looplines. The contracts awarded between July 2002 and September 2003 were, however, for the supply of 3,29,700 cum. of ballast, 22,700 cum. in excess of the estimated quantity.

During the execution of the contracts, the Railway further reassessed the required quantity stating that the original estimate approved by the Railway Board had not included ballast required for loops, curves, shrinkage allowance etc. and increased the estimated quantity by 24 per cent. Against this, ballast measuring 3,91,182 cum. was procured by December 2004 of which finally 3,52,565 cum. could be utilised on the work leaving 38,617 cum. of ballast valuing Rs.1.61 crore still unutilised (October 2006). Thus, there has been a block up of capital of Rs.1.61 crore for about two years.

On this being taken up in Audit (May 2006), Railway Administration stated (July 2006) that the re-estimation of ballast was necessitated due to deficiencies of ballast in the MG route and also to provide for 250 mm. ballast cushion in looplines. Railway Administration's reply is not acceptable as no document in support of the argument regarding lesser availability of ballast from existing main/ loop line was available. Moreover, the additional quantity

of ballast was stated to be for a 250 mm cushion on loop lines for LWR track but records show that a ballast cushion of 150 mm only was actually provided. Even the codal provision provides for only a 200 mm cushion. Additional ballast required for curves was also insignificant (561cums.). Availability of 38,617 cum. ballast after the completion of work clearly establishes the fact that there was overestimation of ballast requirement.

Similarly, on South Western Railway, the Railway estimated the quantity of ballast to be dumped on the GC work of existing MG sub sections Hassan - Sakleshpur (HAS-SKLR) and Subramanya Road-Kabakaputtur-Kankanadi (SBHR-KNKD) of Hassan-Mangalore (HAS-MAQ) project at 2,20,976 cum. as per IRPWM norms after providing for ballast already available on track at an estimated rate of 500 cum. per kilometer. Against this estimated quantity, actual quantity of ballast collected and dumped was 2,87,285 cum. i.e. 66,309 cum. (value Rs.4.20 crore) more than estimate.

Extra collection and dumping of ballast was stated by Railway in this case also to be due to lesser retrieval of ballast (18,187 cum.) against the estimated (72,080 cum.) quantity i.e. only one fourth and due to provision of 250 mm. ballast cushion in loop lines and sidings (17.46 Kms) instead of prescribed cushion of 200 mm. so as to have an uniform level between main line and looplines.

The ballast available on the track is to be estimated after a survey and to claim that there was such a serious deficiency of ballast during the execution is not acceptable. The excess ballast on this count is valued at Rs.3.44 crore. The provision of higher cushion (250 mm.) on loop lines and sidings against the prescribed norms has also resulted in avoidable expenditure of Rs.0.69 crore. 1,347 cum. of ballast (Rs.0.07 crore) were not accounted for.

Thus, the inaccurate estimation of ballast compounded by the excess utilisation of ballast over and above the norms prescribed has led to an avoidable expenditure of Rs.5.81 crore. Serious deficiencies on the MG track are evident to the Railway only during execution and not during preparations and sanctions of estimates.

The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).

3.4.4 North Eastern: Railway — Avoidable expenditure due to adoption of higher density of sleepers for through sleeper renewals

Provision of M+7 density PSC sleepers, ignoring instructions for M+4 density in passenger running loops resulted in excess provision of 10,139 PSC sleepers at the total avoidable expenditure of Rs.1.09 crore

Rules provide that passenger loops, other running lines and busy lines in the yards should have a sleeper density of M+4 (i.e. 1340 sleepers per km.). The rules also specify that cinder ash is not to be used for new formations. Further, the speed of trains over turnouts and crossovers on North Eastern Railway shall not exceed 15 kms. per hour unless otherwise prescribed by approved special instructions permitting higher speed.

Audit scrutiny revealed that contrary to these instructions, the work of through sleeper renewals of existing wooden sleepers at different station yards between Chhapra – Gorakhpur (40 kms.) was sanctioned (1999-2000) and undertaken by providing M+7 density (i.e. 1540 sleepers per km.) without any specific reasons on record. The matching material i.e. 90R second hand short welded rails and 200 mm ballast cushion provided in the work, however, was conforming to M+4 sleeper density. There has also been no change in the existing speed restriction of 15 kms. per hour after completion of the work. Thus, the use of providing a higher sleeper density was neither warranted nor did it have any attendant benefits and has resulted in avoidable expenditure.

Similarly, in Aurihar – Varanasi section, though sanction (June 2001) for the work of through sleeper renewals of the existing wooden sleepers provided for M+4 density PSC sleepers on passenger loops, the work was undertaken with M+7 density PSC sleepers ostensibly to raise the speed of trains up to 30 kms. per hour. To achieve a 200 mm clean ballast cushion, 7,000 cum ballast was required. But, as per records, the Railway could not supply the ballast in full. Moreover, there has been no let up in the speed restrictions even after completion of the work. It is interesting to note that the Assistant Divisional Engineer/ East/ Mau had reported that the ballast cushion of 200 mm was not possible in platform lines as the normal height of platform (76 cms.) from the level of track could not be maintained and there would be dimension infringement. Therefore, laying of sleepers for a length of more than seven kms. was carried out with cinder ash instead of ballast in total violation of codal provisions. The safety parameters of the track have thus been compromised.

Both the above cases were executed under the supervision of Sr. Divisional Engineer, Varanasi. The excess provision of 10,139 PSC sleepers [8,695 in Chhapra – Gorakhpur work (+) 1,444 in Aurihar – Varanasi work] resulted in avoidable extra expenditure of Rs.1.09 crore.

The Railway while accepting that M+7 was provided on loop lines contended (August 2006) that this was necessary for higher speeds. The fact, however, remains that the speed continues to be 15 kmph and there is no proposal for any increase thereon. Moreover, the other track parameters conform to M+4 density.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.4.5 North Eastern: Railway — Avoidable expenditure on creation of terminal facilities

Execution of an out of turn work, without assessing its real prospects, resulted in avoidable expenditure of Rs.44.06 crore, including the cost of land (Rs.22.64 crore), which has become surplus to requirement

In May 2003, the Railway Board asked North Eastern Railway to examine the need and justification of opening a terminal at Gomtinagar of Lucknow Division on the basis of a directive from the Minister of Railways. They were asked to propose it as an out of turn work. The Railway accordingly proposed

the work hurriedly, within seven days, without working out the detailed justification and evaluating the prospects as required by codal provisions. In the process, Northern Railway, whose operations would be affected by the terminal, was not consulted. The work, proposed on 8 May 2003, was sanctioned by the Railway Board on 12 May 2003 at an estimated cost of Rs.70 crore.

In March 2004, while the work was in progress, Chairman Railway Board directed a committee of senior officers of Northern and North Eastern Railways at Lucknow to draw out a rationalised plan for handling trains between the two terminals at Charbagh and Lucknow junction. As an outcome of the committee's report, it was decided (September 2004) to transfer almost all the major works of the sanctioned Gomtinagar terminal such as washing-cum-pit lines and stabling lines, including administrative building complex to Lucknow junction. While sanctioning this proposal for modification, the Railway Board in August 2005 directed that the work at Gomtinagar should stop with immediate effect. A sum of Rs.39.07 crore had, however, been spent by then on the Gomtinagar terminal including Rs.22.64 crore on land.

The work, which should have been stopped in September 2004 itself (when only Rs.14.52 crore had been spent and it was known that facilities were to be shifted to Lucknow junction), was not stopped even after the Railway Board directives of August 2005. Instead, by the time the work was actually stopped (January 2006), the Railway Administration had spent a further Rs.4.99 crore after August 2005.

Thus, a project, taken up as an 'out of turn' work on the specific directives and sanction of the Railway Board, was soon thereafter termed as unnecessary. In the process, there has been an avoidable expenditure of Rs.44.06 crore, of which Rs.22.64 crore stands blocked in land. This was the outcome of the hasty planning by North Eastern Railway, which failed to consult Northern Railway, having their own terminal at Lucknow. Also, no detailed justification or evaluation of the real prospects of the project was conducted, before approaching the Railway Board in May 2003. The Railway Board also sanctioned the work without any detailed examination of the plan.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.4.6 Southern Railway: Loss due to non-provision of Intermediate Block Huts

Non-provision of Intermediate Block Huts (IBH) even three and half years after the target date resulted in avoidable detention of wagons and locos and consequent loss of earning capacity (Rs.5.54 crore)

Podanur (PTJ) – Palghat (PGT) section (48.55 kms.) is an over saturated section due to heavy Passenger and Goods traffic. It consists of twin single working lines ('A' and 'B') and six stations. Whereas the lengths of the first three block sections are less than 10 kms. each, the lengths of the next two

block sections[7] viz. Walayar (WRA) – Kanjikode (KJKD) and Kanjikode (KJKD) – Palghat (PGT) are more than 10 kms. each. Due to such imbalance in the interblock distances, trains closely following each other suffer detention because the preceding trains take more time to clear the longer block sections. Moreover, there are also permanent speed restrictions in the WRA-KJKD and KJKD-PGT sections because of the sustained falling gradient on 'A' line and rising gradient on the 'B' line. Due to these speed restrictions, running time of the Goods trains in longer block sections is more resulting in heavy detention of trains in the section.

In order to minimise these detentions and increase the line capacity, the inter block distances of WRA-KJKD and KJKD-PGT block sections were proposed to be reduced by splitting them through provision of two Intermediate Block Huts (IBH)[8]. Accordingly, provision of two IBHs, one at Kottakkadu between PGT and KJKD and another at Chullimadai between KJKD and WRA, was made in the works programme of 2000-01 at an estimated cost of Rs.1.53 crore. Though the work was initially proposed to be completed by 31 August 2002, it took two years to get the detailed estimate sanctioned (December 2002). The Signalling plan could be got approved only in January 2006. Expenditure incurred on work up to January 2006 was Rs.0.92 crore only against budget grants of Rs.2.40 crore sanctioned up to 2005-06. Thus, a work which was projected on the basis of operational gains was not carried out for more than five years resulting in continued losses.

The Railway Board stated (November 2006) that execution of work was delayed due to difficulties involved in choosing locations of IBH and finalisation of inter linked Permanent Way plan and Signaling plans. Moreover, provision of IBH on B line was not possible at all in view of gradients of the section.

This contention is not acceptable because as per paragraph No.604 of Indian Railway Code for Engineering Department, for effective investment planning, no scheme should be included in the Railways' works programme unless detailed estimates and plans are prepared. The reply only confirms that a period of more than five years was taken by Railway to choose the location and to finalise the plans. Moreover, assessment of the site conditions prior to justifying the work was a pre-requisite since provision of IBH on both lines was a necessity to reduce the detentions.

As per an assessment by audit based on a sample check for two months (May 2005 and January 2006), the average detention was in the range of 57.63 minutes per train even after eliminating minor detentions and making allowances for transit time and after accepting that IBH on B line was not to

[7] 'block section' means that portion of the running line between two block stations on to which no running train may enter until Line Clear has been received from the block station at the other end of the block section.

[8] 'IBH' means an arrangement to split a long block section into two portions where permission to approach may not be given for a train, unless the whole of the last preceding train has passed complete at least 400 metres beyond the Home Signal and is continuing its journey.

be provided. This has resulted in a loss of Rs.5.54 crore from the initial projected date of completion of IBH to March 2006.

3.4.7 South Eastern: Railway — Commissioning of a defective Radio Trunking System

Commissioning of a defective Radio Trunking system led to wasteful expenditure of Rs.1.85 crore and non availability of an important safety aid

The Railway Safety Review Committee (1998) considered the Mobile Train Radio System as one of the most important technical aids to safety. The implementation of this device was to be given high priority by Indian Railways. In their Action Taken Note to para No.3.3.8 of Railway Audit Report No.8 of 2005 as well as in a brief submitted to the Public Accounts Committee, the Railway Administration reiterated the importance of this system for communication purposes.

Audit examination of a work of Radio Trunking System (RTS) in Rajkharswan - Gua section of Chakradharpur (CKP) Division revealed (April 2000) that inspite of an expenditure of Rs.1.85 crores on the procurement and installation of this system, no benefits accrued , as brought out below.

An order for supply of the RTS was placed on M/s HCL Comnet Systems and Services Ltd. in February 1998. Initially eight pairs of frequencies in the VHF range of 146.2-151.46 MHz were allotted for the said communication. However, on using these frequencies at random in that section, mutual interference was found in addition to interference from adjacent VHF links. Hence the firm was requested to adopt a revised frequency range of 314-322 MHz, (used in Durg-Nagpur section). The firm, initially agreed to supply the RTS as per the revised frequency but backed out later. The Railway Administration went ahead with the existing contract thereby compromising on the efficacy in the initial stages itself.

Though the Railway was aware of a number of deficiencies in the supply and execution of the system including supply of spare parts, incomplete construction of tower for RTS, interference in channels, etc., a certificate about the successful installation, satisfactory performance and completion of all the deliveries as per contract agreement/requirements was issued on 14 March 2000 by the Divisional Signal and Telecom Engineer/Construction. An amount of Rs.1.85 crore was also paid to the contractor.

Soon thereafter, major defects were noticed. The firm refused to rectify the problems since certification of successful installation had been issued and since an annual maintenance contract had not been entered into after cessation of warranty. Meanwhile, owing to the problems experienced and the lack of response of supplier, the CSTE issued instructions (August 2002) that the RTS should not be provided for emergency communications.

During an attempt to maintain and update the system through another agency, it was revealed that the installed system had become obsolete and no technical and spare support was available. In reply to Audit, the Railways admitted (July

2006) that the RTS system was functional only for a short period and finally went out of order in January 2003 causing its total breakdown.

Thus, the Railways' failure at every stage from planning and selection of desired frequency, monitoring of execution of a work considered as an important safety requirement, failure to ensure spare availability and issuance of commissioning certificate in spite of various defects noticed resulted in wasteful expenditure of Rs.1.85 crore on a defunct and obsolete system. An even more important fall out was the compromise on safety issues.

When the matter was taken up (April 2006) with the Railway, they stated (July 2006) that the RTS was proposed as a Radio back up system till the Department of Telecommunication cable was replaced by Optical Fibre Cable (OFC). The reply is contradictory to their earlier stand where they had clarified to the Public Accounts Committee that OFC and RTS served different objectives. The RTS provides mobile communication facility between the moving train and the station master/ control office. It cannot be substituted by the OFC. Thus, the commissioning of a defective system by the Railway has resulted not only in wasteful expenditure of Rs.1.85 crore but has also resulted in non-availability of an important safety aid.

The matter was brought to the notice of Railway Board in August 2006; their reply was awaited (December 2006).

3.4.8 North Western: Railway — Injudicious expenditure on rail welding

An expenditure of Rs.1.12 crore incurred on rail welding work has not served any useful purpose and was entirely avoidable since the Complete Track Renewal of the line had been taken up

In 1995, Railways completed the gauge conversion work of Rai-ka-bagh (near Jodhpur) – Jaisalmer Metre Gauge (MG) line (297 kms) within 22 days (to meet the target date) at a cost of Rs.129.28 crore. Though the estimate provided for the use of second hand serviceable (SS) rails (52 kg) and new CST-9 sleepers, heavily corroded and scabbed rails with excessive wear and of shorter lengths as well as very old CST-9/ST sleepers with heavy wear were used. The Broad Gauge (BG) line was opened for traffic in March 1995 with speed restrictions in several stretches and permissible speed of 40/50 kmph against 75 kmph prior to gauge conversion. This was also commented on in the Audit Report 9 of 1999.

The Railway proposed a work for the conversion of fish plated rails into three-rail panels in various stretches aggregating 145 kms for which contracts (Rs.1.43 crore) were awarded in June 2000. The work on this commenced only in November 2000. In view of the poor condition of the rails used in the gauge conversion, the Railway should have gone in for a CTR straightaway instead of the rail welding work. However, while the rail welding work was in progress, the Railway proposed a Complete Track Renewal (CTR) work in April 2001 on the grounds that the rails used in the gauge conversion were defective with battered ends, scabbed and worn out. At the time of the sanction (May 2001) of the CTR the progress on the rail welding work was

less than 30 per cent. On a proportionate basis, this would imply an expenditure of Rs.0.43 crore. At least at this stage the rail welding work should have been discontinued. Instead, extensions to the contractor were allowed and the rail welding work was stopped only in October 2002 after completion of 78 per cent of the work. The total cost incurred on the rail welding work was Rs.1.12 crore.

Thus, when the necessity for CTR was a known fact due to use of defective material in gauge conversion, taking up a rail welding work was not a judicious decision. Having taken up the work, the wasteful expenditure could have been minimised if prompt action to discontinue the work immediately on mooting the CTR had at least been taken. The expenditure of Rs.1.12 crore incurred on rail welding work has not served any useful purpose and was entirely avoidable.

The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).

3.5 Miscellaneous

3.5.1 West Central and Northeast: Frontier Railways — Execution of Deposit Works with Railway funds

Failure of Railway Administration to observe codal provisions regarding execution of deposit works resulted in excess expenditure of Rs.3.01 crore and non-realisation of dues thereof

Rules provide that when a work is undertaken on behalf of another Government department, the Railway Administration will be responsible for seeing that the allotment placed at its disposal is not exceeded. The Executive Engineer is required to pay particular attention to the fact that no expenditure in excess of either the sanctioned estimate or the sanctioned allotment of the deposit made is incurred on any work. If any excess is anticipated, the acceptance of the party concerned should be called for and additional allotment or deposit, as the case may be, demanded.

Scrutiny of records revealed that the Railway Administration took up three deposit works in Kota Division for Rajasthan State Electricity Board (RSEB) during 1989 to 1996. These works were completed during 2001 to 2003 and the total expenditure incurred was Rs.7.87 crore against the deposit of Rs.7.21 crore. A further amount of Rs.0.09 crore was adjusted against the amount available with Railways, leaving an amount of Rs.0.58 crore to be recovered from RSEB.

In January 2004, RSEB requested the Railway Administration to furnish the expenditure statements. However, the statement of expenditure sent by Mechanical department in January 2004 was verified by Accounts only in June 2006 (after the matter was taken up in Audit – May 2006) i.e. after a lapse of two years. The excess expenditure was yet to be recovered (October 2006). In this case, the amounts should have been deposited before commencement of the work but have not been realised even three years after completion in 2003.

Similar failure to watch the progress of expenditure during execution of a deposit work for the Central Ordinance Depot, Jabalpur under the Defence department for replacement of 12.778 TKMs of track and turnouts taken up in 1995 at an estimated cost of Rs.3.30 crore has resulted in excess expenditure of Rs.0.29 crore on the completed portion of work. The payment has been pending since October 2004 when the revised estimate was sent to the Defence department. The balance work has now been put on hold.

In case of a Deposit work for construction of a Defence siding at Bengdubi, Siliguri completed in 1976 at a total cost of Rs.2.49 crore, the revised detailed estimate was sent to the Defence Authorities only in 1990 after an abnormal delay of more than 14 years. Due to non-acceptance of this estimate till date (October 2006) an amount of Rs.0.58 crore remained un-realised. Except for occasional reminders, the Railway has not made any serious efforts to realise the amount.

As per rules, interest becomes leviable if such sums are not paid within a month of claims being preferred. In these three cases, the interest alone, on the expenditure already incurred, reckoned from the date of completion/ preparation of completion estimates or stoppage of work accrues to Rs.1.56 crore. The tardiness in preparing and preferring bills, however, would render the interest irrecoverable. Thus, Railway's failure to adhere to the codal provisions has led to a non-realisation of Rs.3.01 crore.

The Railways in their replies stated that the amounts would be recovered. The amounts, however, continue to be outstanding as on date (October 2006).

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.5.2 Eastern Railway: Injudicious construction and idling of assets

Injudicious construction of subway shops as well as rejection of the best offer led to idle investment of Rs.2.81 crore

As a part of the project 'Re-development of Sealdah station into a Modern Terminal with commercial use of land and air space', 58 subway shops were proposed for construction by Rail India Technical and Economic Services (RITES) which was also approved by the Ministry of Railways (Railway Board) in June 2000. As per the Detailed Project Report (DPR) prepared by RITES, the 'return potential' was evaluated at Rs.1.16 crore from these shops with a return period of 60 years. However, finally only 48 shops were constructed at a total cost of Rs.2.81 crore in March 2001. Accordingly, the return potential proportionately got reduced to Rs.0.91 crore.

Scrutiny of DPR, however, revealed that the developers during discussions perceived the location for construction of shops i.e. dynamics of the area in general and the site itself (due to proximity to operational Railway tracks) as such that commercial development would not be feasible. Hence, they expressed distinct disinterest in participating in this project. Despite this, the construction of shops was recommended and carried out for retail development along with the pedestrian subway citing heavy commuter traffic.

Thus, the reasoning for constructing the shops was ab initio flawed, particularly in view of the returns expected.

RITES was entrusted with the finalisation of lease contract for the shops. The tender offers for a lease period of 30 years renewable for further 30 years were opened on 18 July 2001 and the maximum premium offered was Rs.1.77 crore. The recommendations of RITES to go ahead with the lease was, however, not accepted by the Railway Administration on the grounds that the offered premium was very low, though this was more than the return potential of Rs.0.91 crore projected.

Subsequently, three more attempts were made in April 2004, September 2004 and November 2005 to call for tenders, but were cancelled as the response was very poor. One of the main reasons was that the shops did not have sufficient business potential. Meanwhile, Sealdah Division had earned a sum of Rs.0.24 crore due to temporary leasing of the shops during the period from August 2001 to April 2003. The shops remained vacant after 2003 and Railway is losing revenue by not licensing out these shops. As such, the investment of Rs.2.81 crore could yield only Rs.0.24 crore in about five years. Having invested in a project, financial prudence dictates that maximum returns are obtained. Due to repeated cancellation of tenders, however, the Railways have deprived themselves even of the low earnings expected from these shops.

Thus, the injudicious construction of financially unviable subway shops as well as rejection of the best offer, although the offer was more than the 'return potential' assessed by M/s. RITES, resulted in idling of assets worth Rs.2.81 crore from 2003 onwards.

The Railway stated (August 2006) that a revised scheme for licensing/ leasing of the shops was under consideration and on implementation of the revised scheme after Board's approval, the investment made on the 48 shops would be realised in the long run. The fact, however, remains that assets worth Rs.2.81 crore remained idle from 2003 onwards.

The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).

3.5.3 Central Railway: Non-recovery of cost of work and avoidable payment of dividend to General Revenues

The wrong accountal as well as failure of the Railway Administration to get the reimbursement of cost of works executed on behalf of Maharashtra State, Mumbai Rail Vikas Corporation Ltd. for four years resulted in extra expenditure of Rs.2.14 crore on account of payment of dividend

As per provisions of the Memorandum of Understanding (MOU) signed in May 1998 between Ministry of Railways and Government of Maharashtra State, Mumbai Rail Vikas Corporation Ltd. (MRVC) was constituted as a Government Company to execute the suburban rail projects identified under the Mumbai Urban Transport Project (MUTP). The total cost of MUTP Phase-I works was estimated at Rs.3115 crore. While the World Bank was expected to contribute Rs.1606 crore, the balance of Rs.1509 crore was to be shared on a 50:50 basis between Government of Maharashtra and Indian

Railways. Railway's share of funds was transferred to MRVC every year after passing of the budget. For works to be carried out by Railways, the disbursement of cost was to be done through the operation of escrow accounts to which funds were to be transferred.

The work of conversion from DC to AC traction in Mumbai suburban area which was being executed by Central Railway was transferred to MRVC in December 2000 and as per the MOU, the entire expenditure incurred thereafter was to be met from the funds paid to MRVC. The Chief Project Manager, Mumbai who actually executed the work of conversion from DC to AC, however, booked an expenditure of Rs.8.65 crore during the period April 2001 to March 2003 to Capital because MRVC started the operation of the escrow accounts only from April 2003. This amount has neither been recovered nor adjusted from the funds transferred to MRVC till date (September 2006). As a result of erroneous booking of Rs.8.65 crore to the Capital Account, Railways has paid Rs.2.14 crore as dividend to the General Revenues.

In their reply, Railway stated (June 2006) that expenditure incurred in 2001-02 was charged to 'Capital Fund' and as such dividend was not paid. They also stated that the expenditure incurred in 2001-02 and 2002-03 had been advised to MRVC in May 2006 for reimbursement. The reply is not acceptable because expenditure prior to April 2001 which was charged to 'Capital Fund' has not been considered here. Only expenditure after 2001-02 has been considered which as per the Appropriation Accounts of Central Railway, was charged to 'Capital' and dividend thereon was also paid. Moreover, the reimbursement of Rs.8.65 crore has not been received from the MRVC.

Thus, the wrong accountal as well as failure of the Railway Administration to get the reimbursement of cost of works executed on behalf of MRVC for four years has resulted in extra expenditure of Rs.2.14 crore on account of wrong payment of dividend.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.5.4 Southern Railway: Avoidable continuance of speed restriction due to improper planning before commencing a work

Construction of a Road under bridge was taken up without considering the presence of an arch culvert resulting in delays and unnecessary speed restriction leading to loss of Rs.1.47 crore

Railway Board sanctioned (October 2003) the construction of a Road under bridge (RUB) in lieu of level crossing No.114 near Sivathapuram on Salem - Erode section at a cost of Rs.5.12 crore on a cost sharing basis with the state Government. The alignment of the proposed RUB was through the existing UP and DOWN lines of the Jolarpettai – Erode section and the proposed new Broad Gauge (BG) line for the Salem - Karur section.

Accordingly, a contract for the execution of the RUB was awarded (June 2003) for Rs.1.37 crore with completion period of twelve months. The scope of the work covered casting of pre-cast ' RCC Box RUB' of size 11 X 5.2 m

by the side of the existing down line and pushing the box beneath the track using hydraulic jacks. This required excavation adjacent to the down line for accommodating the thrust bed and RCC box. Since excavation was to be done very close to the existing down line embankment and as the depth to be excavated was 2.5 mtrs below the existing toe of the bank, a speed restriction of 30 kmph was imposed with effect from 3 July 2003 keeping in view safety of the trains on the busy section.

After the slab had been cast, however, the Railway was informed by the contractor about the existence of an old and abandoned arch culvert which was obstructing the pushing of the RCC box under the track. Railway decided to dismantle the culvert with the approval of the State Government and adopt a different procedure using girders. This involved preparation of General Arrangement Drawings (GADs), approval of Commissioner of Railway Safety (CRS), sanction and continuance of speed restriction. The GADs could, however, be got approved only in June 2005. Meanwhile, the Railway lifted the speed restriction on 4 April 2005 after filling the already excavated bank with earth (1,000 cums approx.). Speed restriction would have to be imposed during the execution of the work when it is again taken up.

Thus, there was unnecessary imposition of speed restriction for 19 months (after providing for a period of two months for casting of the RCC box etc.) leading to a loss of Rs.1.47 crore besides unfruitful expenditure of Rs.0.38 crore. This could have been avoided if the presence of the arch culvert had been noted before award of contract. The Railway has stated (June 2006) that they were not aware of the existence of the culvert as it was eight meters below the earthwork. This is not acceptable as the plans of 1963 clearly show the arch culvert. The correspondence in 2000 also identifies the presence of a defunct RCC pipe culvert at the site. More than all these records, it is important that detailed site investigation is carried out before work is awarded or taken up. The Railway codes also underline the importance of maintaining drawings and designs carefully. Thus, the failure to take due care in planning a work resulted in speed restrictions and consequent loss of Rs.1.47 crore as well as delay in the provision of an RUB instead of a level crossing.

The matter was brought to the notice of Railway Board in September 2006; their reply was awaited (December 2006).

3.5.5 East Central: Railway — Loss due to procurement of ballast and boulders from illegal sources

Procurement of ballast and boulders from dubious firms led to seizure of material costing Rs.0.86 crore and procurement from alternate sources at higher rates

The Railway entered into four agreements for supply of 75,000 cums of stone ballast and three agreements for supply of 42,000 cums of boulders between August 1999 and September 2002 from a private quarry at Jamalpur under Sonepur Division for normal maintenance including track renewals. The special conditions of the agreements provide that the contractor should submit 'M'&'N' forms along with their bills in token of up to date payment of royalty

charges to the Mines Department and the contractor should follow all the provisions of the Bihar Mines and Minerals Concession Rule, 1972 (BMMC).

Further, tender conditions also provide that the tenderer would have to produce authentic documents about holding proper lease or agreement with authentic lease holder to ensure regular supply of ballast during the period of contract. Ninety per cent of the payment on stack measurement basis would be made after stacking the material on Railway land and the balance 10 per cent would be made after wagon measurement. The material was also to remain in safe custody of contractors till final measurement.

As far back as in November 2000, the Collector, Munger (Bihar) had informed the Railway about large scale illegal transportation of stone ballast and boulders from Jamalpur quarry without proper licences and payment of royalty. He had also cautioned the Railway Administration to take necessary action to safeguard the Railway interests. He reiterated the provision of Rule 40(10) of the BMMC Rule, 1972 that the Railways had to get the 'M'&'N' forms verified by the concerned mining officer before any payment was made to the contractors. In spite of this warning, no care was taken to ensure legal validity of lease documents supplied. Audit scrutiny revealed that the supplies were made and payments allowed based on the 'M'&'N' forms produced by the contractors which had been certified only by a Notary. The payments were also made before verification by the District Mining Officer, Munger though they are stated to have been submitted to the Mining authorities. Railway also failed to verify the validity of any licence held by the contractors.

As a result, out of the total quantity of 20,372.09 cum of ballast and 32,056.65 cum of boulders supplied at a cost of Rs.1.45 crore, 9,218.33 cum of ballast and 25,028.65 cum of boulders valuing Rs.0.77 crore (90 per cent of the total cost) stacked on Railway land, was seized on 22 April 2002 by the Divisional Forest Officer on grounds of illegal procurement of material through contractual agencies.

The Divisional Forest Officer, Munger observed (May 2003) that the Railway Administration had accepted supply of the ballast and boulders from various agencies without verifying the source of supply and made payments to dubious firms. He also observed that the suppliers specified by the Railway did not hold valid licences at the time of supply. They either had their licences cancelled or never figured as licence holders and that the Railway were not able to produce any document in support of their claim that all were valid licence holders.

Thus, failure of Railway Administration to verify the antecedents of the contractors before awarding contracts and verifying the source of supply/genuineness of the 'M'&'N' forms produced by the firms before the material was finally measured, resulted in acceptance of material costing Rs.1.45 crore from illegal sources as well as seizure of part of material worth Rs.0.86 crore.

The matter was brought to the notice of Railway Board in October 2006; their reply was awaited (December 2006).