

KOWLOON-CANTON RAILWAY CORPORATION**LEGISLATIVE COUNCIL PANEL ON TRANSPORT****ACTION TAKEN IN RESPONSE TO
THE REPORT BY ERNST AND YOUNG ON PAYMENTS TO
CONTRACTORS FOR THE WEST RAIL PROJECT****INTRODUCTION**

This paper informs Members of the Panel of the action taken by the Kowloon-Canton Railway Corporation (KCRC) in response to the recommendations contained in the report by Ernst & Young on payments made to contractors for the West Rail project.

BACKGROUND

2. On 22 May 2002, the Railways Subcommittee of the Panel considered LC Papers CB(1)1747/01-02(01), CB(1)1747/01-02(02) and CB(1)1747/01-02(03). These papers provided Members of the Subcommittee with copies of the Ernst & Young report and its executive summary. Following discussion of these papers, the Subcommittee passed the following motion –

“With the lessons learned from the Siemens’ contract, this Subcommittee asks KCRC to implement the Ernst & Young recommendations as soon as possible, and to report back to the Panel on Transport regularly.”

The Chairman of the KCRC agreed to carefully consider the sentiment reflected in the motion about the need to further strengthen the corporate governance of the Corporation, and said that updates on the progress of implementing Ernst & Young’s recommendations would be provided to Members for information.

KEY FINDINGS OF ERNST & YOUNG

3. The Ernst & Young report runs to some 300 pages. It sets out a large number of findings and recommendations, some of which involve complex issues of a technical nature. In order to keep this paper to a reasonable length, only the main areas of the report are covered. The findings and recommendations under these parts of the report affect how the KCRC is managed, and how its contracts are awarded and monitored.

4. As Members will recall, the Ernst & Young report dealt with the KCRC's handling of contract DB1500, which was awarded to Siemens Ltd for the West Rail telecommunications systems, and the 27 supplemental agreements with other contractors for 18 West Rail contracts. A Steering Committee, chaired by the KCRC Chairman with four independent members who were well respected members of their professions, was set up to oversee and guide the investigation by Ernst & Young.

5. The Members' comments at the Subcommittee meeting in May 2002 focussed mainly on the supplemental agreement with Siemens. Under the agreement the KCRC agreed to pay Siemens the sum of \$100 million for variations, settlement of claims and recovery of time lost. The key findings of Ernst & Young in respect of the KCRC's management of contract DB1500, which also have general applicability to the 27 other supplemental agreements, were that -

- (a) there were a low number of tenders submitted for DB1500;
- (b) Siemens submitted a low tender price of \$287 million;
- (c) there was a failure on the part of the KCRC's management to inform the Managing Board in a timely fashion of the delay which was occurring in three of seven systems under the contract, namely, the public address system, the passenger information display system and the closed circuit television system, so that the Board could consider what remedial options were available;
- (d) the existing structure of the Managing Board did not provide adequate opportunity for the Board to assess and discuss specific problems arising on individual West Rail contracts;
- (e) in respect of showing project progress, different criteria were adopted for determining the "traffic light colours" in the Situation Report presented to the Managing Board as opposed to the weekly management report; and
- (f) the delay on DB1500 resulted in a subsequent need for the KCRC to enter into a supplemental agreement with Siemens at a total value of \$100 million to recover the delays which had occurred in the contract – of the \$100 million, \$35 million was for delay recovery measures and \$30 million for settlement of outstanding

claims, with the remaining \$35 million being for instructed variations and remeasurement of quantities.

CURRENT POSITION

6. Ernst & Young's recommendations and the action taken by the KCRC are described in the following paragraphs.

Small number of tenders

7. When tenders for the Siemens contract were invited in March 1999, five contractors indicated their intention to submit bids and were placed on the shortlist. Subsequently three tenders were returned, only two of which were technically conforming tenders.

8. Ernst & Young were of the opinion that KCRC's systems and procedures for contract procurement compared favourably with industry norms and best practice. Nevertheless they went on to recommend that KCRC should revise its procedures such that no less than six tenderers are prequalified for each contract, rather than a minimum of four as specified in the KCRC's Procurement Manual. The KCRC's Corporate Tender Board has since considered this matter and has reinforced its practice of prequalifying no less than six tenderers, in as far as it is practicable to do so.

Low tender price

9. Siemens submitted a low tender bid of \$287 million, which was \$561 million below the Engineer's pretender estimate of \$848 million and \$171 million below the second conforming tender. Siemens's financial capability was such that a parent company guarantee was required from its parent company Siemens AG. In November 1999, the Managing Board awarded the contract to Siemens.

10. Ernst & Young noted that, while there had been a discussion of Siemens' low tender price at the Tender Review Panel, KCRC's management had not presented the risks and implications of accepting such a low tender to the Managing Board. Such issues were not discussed and there were no suggestions that special measures should be put in place to address these risks, such as obtaining additional performance security from Siemens.

11. The KCRC's Corporate Tender Board has reviewed the assessment and reporting process for contract awards, with particular regard to proposed contract awards which vary significantly from pre-tender estimates. The

Managing Board is now alerted to any tenders which appear low, and recommendations are made as to how these tenders should be awarded. Special measures are identified in the contract award proposals, addressing the need for early action should the contractor fail to perform, such as setting critical dates against which liquidated damages would apply.

Failure to inform the Managing Board in a timely fashion

12. Ernst & Young noted that as a result of the processes put in place for the management of West Rail contracts, KCRC's management was aware from an early stage of the problems being encountered on DB1500. They also considered that the problems were brought to the attention of senior management below Managing Board level in a timely manner, such that senior management resources were brought to bear on the problems as they became worse. However, the Managing Board were not informed of the problems sufficiently early so as to have provided the Board with the opportunity to consider the steps being taken by senior management to resolve the problems. Ernst & Young thought, however, that, had the Managing Board been informed, it would not have disagreed with the actions being proposed by senior management.

13. The KCRC's management has strengthened its reporting procedures to the Managing Board, to ensure that the Board is informed of problems on projects at an early stage. In addition to the Board deciding relevant proposals for award of contracts and proposed increases in project estimates, the following reports are now made available to members of the Board via the Capital Projects Committee (formerly the New Railway Projects Steering Committee), which meets monthly to consider –

- (a) quarterly financial review of all projects;
- (b) quarterly claims review of all projects;
- (c) monthly capital project programme report on the progress of all projects, highlighting significant deviations from programme and claims submissions; and
- (d) weekly summary reports on progress, financial status and significant issues on all projects.

Board members are also encouraged to pay regular visits to the project sites to be briefed and to see for themselves actual progress of the works on the ground.

Existing structure of the Managing Board

14. Ernst & Young considered that the Managing Board's existing structure did not allow adequate opportunity to assess and discuss specific problems arising on individual projects. They suggested that consideration should be given to appointing one or two non-executive directors with specific knowledge and experience of major projects. Ernst & Young also considered that the New Railway Projects Steering Committee could meet more regularly than quarterly and could have a number of members drawn from outside the KCRC who could have appropriate technical skills such as expertise in construction, engineering and legal issues. The Committee would then provide a forum at which the senior management could present problems arising on individual contracts in more detail together with alternative courses of action. The Committee could recommend appropriate solutions, which could be passed for approval by the Managing Board. This would reduce the huge volume of papers on projects, which members of the Managing Board have to consider before each meeting. The Board could also receive a brief report each month from the Committee on the problems being encountered on contracts and the proposed solutions. In summary, Ernst & Young concluded that their concerns about the role and composition of the Managing Board could be largely addressed if the Committee were to be given additional resources, with revised terms of reference and some delegated authority.

15. The Managing Board of the KCRC has taken action on Ernst & Young's recommendations in respect of the role and composition of the New Railway Projects Steering Committee.

16. The Committee's title has now been changed to the Capital Projects Committee and its responsibilities extended to cover not only projects associated with new railways, such as West Rail, but also capital projects associated with existing operating lines such as East Rail. An example of such a project is the current Lo Wu improvement project, which will provide an additional platform and improved facilities for cross-boundary passengers at the Lo Wu Terminus.

17. The composition of the Capital Projects Committee has also been expanded. The Managing Board has appointed a number of external expert members with extensive experience in capital projects, legal issues and environmental matters. The new expert members are as follows –

Ir. Greg Wong Chak-yan
Ir. Teresa Cheng Yeuk-wah
Ir. Daniel Cheng Man-chung
Ir. Wan Man-lung

18. Since their appointment, these expert members have participated fully in the all the deliberations of the Committee, and their contribution has been recognised in the advice given by the Committee to the Managing Board. The practice of appointing expert members has also been extended to other committees of the Managing Board.

19. The Capital Projects Committee now meets at least once monthly, rather than quarterly as in the past. In addition to monitoring progress and expenditure on capital projects in more detail than is possible by the Managing Board, the Committee also considers in draft all submissions on capital projects which the KCRC's management intends to make to the Managing Board. In the light of the comments made by the Committee, the company secretariat amends the final draft so that the submission made to the Board fully reflects the advice given by the Committee. Moreover, when the matter is presented to the Board, the chairman of the Committee is called upon to introduce the item and to make any additional comments that he feels may be necessary on behalf of the Committee.

20. A new practice has also been introduced into the agenda of the KCRC's monthly Managing Board meetings. There is now a standard agenda item dealing with reports by chairmen of committees, whereby the chairman of each committee is asked in turn to make a report on the work of that committee in the previous month. This enables the chairmen to highlight key issues which they feel should be brought to the attention of the Managing Board.

Different criteria for determining the traffic light colours

21. In order to allow readers of project progress reports to quickly identify those contracts with problems affecting progress, the KCRC uses a traffic light colour system for its reports, whereby contracts are marked with a green light where progress is in accordance with programme, amber where there is a possible risk of delay and red where delays are being experienced. Ernst and Young noted that the criteria adopted in deciding whether or not to show a red light in the weekly management report differed from those used in the Situation Report presented to members of the Managing Board. This had resulted in a red light being shown for Siemens in the management report but only an amber light in the Situation Report. Ernst & Young recommended that the same criteria should be adopted for both reports.

22. The KCRC has fully implemented the recommendation made by Ernst & Young. Members of the Managing Board and management now receive reports using the same criteria for the traffic lights.

Supplemental agreement with Siemens

23. Ernst & Young noted that KCRC's contract strategy reflects current international best practice, whereby disputes should be resolved in a proactive manner, particularly for large and complex projects such as West Rail, instead of taking a strictly contractual route. The use of supplemental agreements is not limited solely to Hong Kong but is a common practice elsewhere, although the terms used to describe such agreements may differ. They found that the commercial settlement with Siemens in respect of contract DB1500 appeared to have been in the best interests of the KCRC because, following the supplemental agreement, most of the problems previously encountered were being satisfactorily addressed and the contract was back on schedule. They concluded that the decision of management to recommend this approach to the Managing Board was the correct one in the circumstances. As mentioned earlier in paragraph 12 above, the only failure was that the management of the KCRC had not brought the problems which were developing on this contract to the attention of the Managing Board at an early enough stage for other options to have perhaps been considered.

24. The KCRC has noted that the use of supplemental agreements is in accordance with best industry practice. The KCRC will continue to resort to such agreements where the Managing Board considers that they offer the most appropriate remedy to resolve matters affecting contracts. However, as explained in paragraph 13 above, the KCRC has strengthened its reporting processes to ensure that the Managing Board is alerted to problems developing on contracts at an early stage so that a full range of possible remedial options can be considered.

Grouping of several systems into one contract

25. In determining its contract strategy for West Rail, KCRC decided to group seven telecommunications systems into one contract, which was subsequently awarded to Siemens. This was because six of the seven systems interfaced with one another. Moreover, grouping the systems together reduced the risks associated with interfacing the systems, and avoided the need for a separate systems integration contractor as well as achieved economies of scale through having a larger contract. Ernst & Young concluded that the KCRC's decision was the correct one, although this increased KCRC's risk that the project could be adversely impacted by the contractor's failure to perform. In

the event, Siemens fell behind programme on the delivery of three of the seven systems, resulting in the supplemental agreement to recover delay.

26. The KCRC has considered this matter and concludes that it is difficult to introduce any hard and fast rule to deal with the question of how systems should or should not be grouped for the purposes of future contracts. Each case would have to be considered on its merits having regard to the nature of the project, the systems concerned and their criticality both individually and collectively to the project as a whole. Due regard has also to be paid to the interfaces between the separate areas of work to determine whether the work should be packaged separately or let under a single contract. Nonetheless, in future projects particular care will be taken in the drawing up of contracts for such systems, and the Managing Board will be alerted to the implications of grouping or not grouping systems under a single contract.

Independent review of commercial settlement calculations

27. Ernst & Young stated that, in reviewing the calculations prepared in relation to the settlement amounts in the supplemental agreements for selected West Rail contracts, they found it difficult to determine how these figures were developed from the records kept. They acknowledge, however, that after discussion with KCRC personnel, the situation was clarified. Their main concern was that it was unclear to what extent the sums put forward by the contractors had been challenged. They noted discrepancies not only between what the contractors had claimed and what they had finally been paid, but also between the KCRC's internal estimates and the settlement amounts. In recognising that the determination of amounts to be paid to contractors requires both experience and judgment, Ernst & Young considered that additional reassurance could be provided if contractors' claims were thoroughly assessed and documented by establishing an independent review of a sample of such calculations.

28. KCRC has considered the question of an independent third-party conducting reviews of variations and claims on contracts, but concludes that this is not a practical proposition during the currency of contract works. However, the KCRC acknowledges that there are occasions when the involvement of an independent third party can be of assistance. Examples of this would be where mediation is desirable or where the involvement of an independent third party could assist to resolve a conflict. Each case would, however, need to be considered on its merits. The KCRC will proactively consider adopting this option on its projects where it encounters commercial settlement matters which would benefit from an independent third-party review.

CURRENT SITUATION IN RESPECT OF CONTRACT DB1500 AND OTHER WEST RAIL CONTRACTS

29. The KCRC can report that the delays encountered on the three systems under DB1500 have all been remedied and Siemens has subsequently met all key dates specified under the supplemental agreement. The construction phase of West Rail is for most practical purposes completed, with trial running of trains having commenced along the whole alignment in preparation for the full opening of West Rail for passenger services targeted for autumn 2003. Not only will this be ahead of the originally planned completion date of end December 2003 but also the total cost of the West Rail project has been reduced from an initial estimate of about \$64 billion in 1996/97 to an expected outturn cost of less than \$46.4 billion today. This has only been achieved through the Corporation applying best industry practice in developing its contract strategies.

CONCLUSION

30. The KCRC has taken careful note of the comprehensive and extremely valuable report produced by Ernst & Young, and all the key recommendations made in the report have been implemented as far as practicable or will be taken on board in the KCRC's future projects.

31. Members of the Panel on Transport will be invited to note the contents of this paper.

Kowloon-Canton Railway Corporation

29 July 2003