EDINBURGH TRAM INQUIRY

DUNCAN FRASER

Introduction

Can you please send a full CV, setting out your vocational qualifications and experience

The Note covers the following matters:

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- 2007
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INTRODUCTION

Context to my Coordination Role

I retired from the Council in November 2011, following completion of the Traffic Regulation Order process. In answering the questions asked, I have chiefly drawn on the references provided by the Inquiry and only to a limited extent on my recall as the events are up to 10 years ago. To that extent I have made my best endeavours to provide answers that are to my knowledge and understanding correct, but with the caveat that there may be some unintentional errors or discrepancies. My responses reflect my involvement based upon my limited sphere of knowledge; consequently I have not sought to speculate nor answer on matters outwith my involvement.

It is important to appreciate that in the context of my initial role as Tram Co-ordinator (June 2007 to September 2009) there were confidential high-level meetings between TIE and the Directorate and the Chief Executive of the Council that I did not attend and was rarely briefed on. For example the negotiations for the Infraco contract were only partially revealed to me for the first time on 8 May 2008, when Graeme Bissett, of TIE, provided the "short novel" (CEC01294645). My primary role, as the Council's Tram Coordinator, was to process Road and Planning consents and approvals. My role did not include approvals for tram design such as rail infrastructure and locomotives. In my capacity as Tram Co-ordinator I also informed and advised the Directorate about important and critical issues to allow them to take informed actions, make decisions and raise critical issues at their higher-level confidential meeting. Therefore, it should be appreciated that, in this context, it was reasonable and appropriate to provide the Directorate with the 'Closed Report' comments paper (CEC01222467) as this provided insight to important issues from the B team perspective (Messrs Conway and Bowen reported to me on Roads and, while I liaised with, Mr Hjudscki on Planning, Mr Coyle/Ms Andrew on risk/financial matters and, Messrs Smith/Mackenzie on legal matters). For example I did not understand why based upon the original assumption for the fixed priced Infraco contract was let prior to completion of the designs. Nor was it explained to me why the MUDFA contract was not completed prior the commencement of the Infraco works. These matters were regarded by TIE and the Council Directorate as commercially sensitive and confidential and thus not shared with the B team.

In my seconded role, from the Council to TIE, as Roads and Traffic Regulation Order Manager (September 2009 to November 2011) my primary role was to manage the Traffic Regulation Orders (TRO) process through to completion (Making of Orders). I also provided advice on Roads design.

1. By way of introduction:

(1) In summary, what were you vocational qualifications and experience prior to working on the tram project? To what extent do you consider that your qualifications and experience were relevant to the tram project?

When commencing work on the tram project in June 2007, I was a qualified Chartered

Civil Engineer (BSc. Honours, Civil Engineering, Member of the Institution of Civil Engineers & Member of the Institution of Highways and Transportation). In addition I had an MSc in Transportation Engineering and was trained Mediator. I had 30 years of professional experience in design and construction and of management with in Local Government and the private sector (Civil and Structural consulting and contracting). I believe that my engineering, management and mediation experience were helpful when working as a co-ordinator on the tram projects.

(2) Had you any prior experience in relation to the delivery of major infrastructure projects? What experience, generally, did CEC have in that regard?

I have had experience working on major infrastructure projects, as Client, Designer and Contractor (refer to my CV for details). I did not, however, have experience of working with an "arm's length company", such as TIE, prior to working on the tram project.

(3) What was your job title (and between what dates) while employed by CEC? What were your main duties and responsibilities?

Tram Co-ordinator June 2007 to September 2009 and then seconded by the Council to TIE, as Roads and TRO Manager, from September 2009 until my retirement in November 2011.

(4) What were your main duties and responsibilities (and between what dates) in relation to the Edinburgh Trams Project? We understand, for example, that you were CEC's Tram Co-ordination Manager and it would be helpful if you could explain the duties and responsibilities of that role (together with the dates you performed that role)?

As Tram Coordinator my role was to co-ordinate with relevant Council Departments and TIE, to process the consents and approvals and liaise with the Council Directorate. I carried out this role from June 2007 until September 2009. I served on various groups (refer to 1/6) with respect to my Council coordination role. I reported directly to the Director of City Development, as this coordination role had no delegated authority. I drafted Committee reports, when instructed, for consideration and approval by the Council Directorate (Finance, City Development and Legal).

(5) We understand that you were then seconded to TIE and should be grateful if you could explain your title, main duties and responsibilities (and between what dates) in that role?

On secondment as Road and TRO Manager my role was to advise TIE on Roads matters (as distinct from tram engineering design) and primarily to enact the tram TRO process, with respect to changes on the Roads as a consequence of the tram project. In this role I liaised with Council (City Development Department) and also consulted with Dundas and Wilson as advisors. I reported to Susan Clark in TIE. I carried out this role from September 2009 until November 2011, when I retired having completed the making of the tram TROs.

(6) What committees and sub-committees did you attend? Is our understanding correct, for example, that you attended meetings of CEC's Internal Planning Group, CEC's Property

& Legal Group, the CEC/TIE Legal Affairs Group and TIE's Design, Procurement and Delivery sub-committee? What was the role of these of these groups? What was your role in each group?

CEC's Internal Planning Meeting, CEC Property & Legal Group, CEC/TIE Legal Affaires Group, TIE Design, Procurement and Delivery sub-committee.

(7) When working on the tram project (both for CEC and when seconded to TIE), who did you report to and who reported to you?

As Tram Coordinator, I reported to the Director of City Development. Staff that reported to me included other CEC seconded staff and Council staff who had been delegated to the tram project. When seconded to TIE as Roads and TRO Manager I reported to Susan Clark and liaised with the Council and other staff in TIE, I had no staff reporting to me. I also consulted with Dundas and Wilson for legal advised on TROs.

THE TRAMS PROJECT - GENERAL

Procurement

- 2. We understand that the procurement strategy for the tram project included carrying out design and utilities diversion works in advance of the infrastructure works, and obtaining a fixed price for the infrastructure contract.
- (1) What was your understanding of the main elements of the procurement strategy for the tram project?

I was not directly involved in the procurement of the tram project.

(2) In the event, do you consider that the aims of the procurement strategy were met (and, if not, why not)?

The aims of procurement strategy were not fully met because the Infraco tender was put out prior to completion of MUDFA and design consents and approvals. The reason(s) for this I did not know.

Design

3. We understand that TIE entered into a Systems Design Services (SDS) contract with Parsons Brinckerhoff in September 2005 and that there were three main stages of design, namely, the Requirements Definition phase (provided by December 2005), Preliminary Design (provided by June 2006) and Detailed Design.

By way of overview:

(1) It would be helpful if you could explain the different roles and responsibilities of CEC in relation to design i.e. when acting as client and when acting as statutory approvals authority? How did that work in practice?

Preliminary Design was carried out by TIE with their consultants Mott McDonalds and before my involvement with the tram project.

I became involved in the tram project from June 2007.

In my role as Tram Co-ordinator I co-ordinated a team that acted as the Roads (including Structures) and Planning statutory authority and also Land Purchase (Compulsory purchase powers). These specified process commenced following award of the Preliminary and Detail Design award of contract to SDS. I had no involvement in the preparation or award of these contracts. I was not involved in the Councils role as client; this function operated at Directorate level. TIE was required to report all contractual and financial proposals to the Council for approval by the appropriate Directors (typically Finance, City Development and Council Solicitor) and Chief Executive or, when these proposals were not covered by delegated powers, reported to the appropriate Council committee.

(2) What were the different types of statutory approvals and consents that were required for the tram project? What processes and procedures, in general, required to be followed to obtain such apporvals and consents?

The coordination role, with respect to design, by the Council was to grant approvals under the Roads Authority powers (road carriageway, footway and structures) and the Planning Authority powers (designs including shape, form, finishes etc.). The statutory approval teams provided advice on the required quality of design standards to TIE/SDS in compliance with the Council's Road and Planning Policies, Standards and Guidance, with respect to the integration of the tram network (or railway) with the urban road network (including the World Heritage site). In addition, approvals were also required for selected off-road aspects of the design with respect to structures and tram stops.

The Traffic Regulation Orders (TROs) are an essential requirement for tram system to operate on the public Road network. This process was carried out by CEC/TIE (Statement of Case, Drawings, Schedules etc.) after substantial completion of the design and essentially independent of SDS (with the exception of some TRO drawings).

Temporary Traffic Regulation Orders (TTROs) are required for the Road network to operate during the construction period. This process required consultation with SDS, but the process was carried out by CEC/TIE. An innovation was developed by CEC in consultation with Dundas and Wilson to facilitate long term Temporary Traffic Regulation Orders (TTROs) during the construction period. This innovate approach enabled better access and longer works area to facilitate construction work. This also simplified the process and resulted in fewer changes in temporary traffic management for the travelling public and service authorities.

Land Acquisitions were planned and scheduled by TIE, but the powers to purchase land were carried out by the Council property section, using its Compulsory Purchasing Powers.

(3) In producing the design, the wishes and requirements of a number of different stakeholders required to be addressed (e.g. TIE, CEC, the statutory utility companies (SUCs), Network Rail, Forth Ports and BAA etc) (see, for example, e-mail dated 6 July 2007 by Scott Ney of Parsons Brinckerhoff in relation to the roads design, TIE00044022). Which body or organisation do you consider was primarily responsible for managing and obtaining the views and agreement of the different stakeholders?

TIE, in their role as CEC's arm's length delivery company, managed and obtained agreements with stakeholders (e.g. Utility Companies, Network Rail, Forth Ports and BAA) in conjunction with SDS. The Council focused on the statutory Roads and Planning approvals with TIE responsible for other stakeholder approvals but were, for example, supported by CEC Property Services to evaluate and procure land. CEC had no contract with SDS, hence the organisation and management of approvals was managed and organised by TIE with their consultant SDS. I concur that at these early meeting there were "many time competing opinions" (TIE00044022). I was not involved with the Stakeholder approvals, but I do appreciate the extensive work involved in closing out Stakeholder Agreements since they all had their own specific requirements. Designs required time to gain the consent and approval from Stakeholders, as this is necessarily a complex and time-consuming process that requires sufficient time to iterate and finalise.

(4) What do you consider were the main difficulties encountered in carrying out and completing the design? What were the main reasons for these difficulties?

The completion of the tram project design required all the stakeholder agreements, the tram infrastructure design and the Roads consents and Planning approvals from the Council in order to integrate the overall design into the urban streetscape This was a complex matter with interdependencies requiring iterations to align all the design issues.

The normal statutory process for CEC consents and approvals process was followed using experienced staff. For Roads consents and Planning approvals compliance had to follow Government guidance such as Design for Roads and Bridges (DMRB) and Edinburgh Council's Roads guides that have been in force for many years. Similarly Planning consents and approvals required compliance with Government Planning Advice Notes (PAN) and the Council's own guides.

Difficulties for the consents and approvals were experienced, for example, when only some elements of a package were submitted. Comments were made, by Council, on these partial submissions and qualified approval granted. This piece-meal approach of submissions increased the time taken to approve packages and increased the workload of designers and approvers. Notwithstanding this and the failure to meet planned programmes for submission by TIE/SDS the Council did provide the appropriate staff resources to return the submissions with comprehensive comments, almost all within the eight week period agreed with TIE/SDS. There were a substantial number of observations made by CEC, regarding SDS submissions for Approval. I believe that these comments were necessary as it helped SDS by giving them guidance and an understanding of what the Approvals team required SDS to address so as to gain approval. I suggest that the piece meal approach to tram package submissions, by

SDS, and initially limited integration of the tram into the urban space and place, was part of the reason for the comprehensive nature of the Council's comments. The lack of General Arrangement drawings (showing all the Road and Tram design elements integrated together) resulted in some cases of conflict for Road space meaning that some element had to be moved and redesigned. This could occur late into the consents and approvals process and thus resulted in further amendments to drawings that had already been approved in principle.

(5) What steps were taken to address these difficulties?

CEC co-located the consents and approvals team (to TIE's office) with experienced Roads and, subsequently, Planning staff, including specialists (e.g. signal design, lighting, structures, planning approvals etc.) to consider submitted designs by SDS. This arrangement shortened lines of communications and helped develop a better understanding within the Approvals teams. Additional consents and approval staff from the Council office supported the co-located staff resources when the programme became compressed, as a result of slippage in the TIE/SDS programme.

Comprehensive checklists for each drawing or package was prepared highlighting issues for clarification and/or modification by the designers so that SDS knew what was required for consent and approval to be granted. These were updated typically on a weekly basis and issued to TIE/SDS.

Once the Infraco Contract was let priority was given to packages that would be required for site works.

Requests were made for a comprehensive package of Roads and Planning designs to be submitted, but typically only parts of packages or individual drawings with some elements of the design were submitted. Consequently, while comments could be made on the individual drawing(s) it was not always possible to gain an understanding of how all the design elements (signs, line, signals, columns etc.) would integrate together. CEC made requests for submissions of a comprehensive set drawings, showing all the elements, but SDS suggested that additional payment would be required for this. CEC did not agreed with this request for additional fees. At a later stage in the approval process larger packages were submitted, but rarely fully complaint with the SDS programme.

The checklists produced by the approvals teams facilitated the audit process and also helped SDS appreciate the modifications required and outstanding issues. This process also helped discriminate minor issues from major issues. This in turn allowed major issues to be referred to SDS senior management for resolution. This process partially assisted the teams to make more progress, but not on all matters. The prioritisation system also worked reasonably well and contributed to reduced potential delays on site.

(6) Were these steps successful (and, if not, why not)?

The steps taken were only partially successful in improving the quality and quantity of submissions (both engineering and planning). The TIE/SDS programme continued to slip. The piece meal approach to package submission continued until later in the

process. Eventually larger packages began to be submitted, which was helpful, but rarely to programme, which made it challenging to CEC to have the appropriate number of consents and approval staff available, although every effort was made to achieve the 8-week turn around period. The quality of the re-submissions did not typically fully address the amendments that the Council had previously advised the designers to consider and respond to. Hence the cycle of submissions and resubmission extended over a longer time period than should have been required.

4. On 4 June 2008 Dundas & Wilson produced a Lessons Learned document (CEC02084810) which, under Engagement, stated "There should have been greater engagement with the Council and key stakeholders from the outset of tram lines 1 and 2. In the Council's mind, TIE was delivering the project however the project lacked strategic guidance and input from the Council throughout the parliamentary stage and the preliminary design stage. The contractual framework did not help as all of the contracts were with TIE, who in turn were not engaging with the Council. In our view this lack of engagement may have cost the project 9-12 months during the design stage — had the Council agreed design objectives/principles with the designers at the requirements definition stage this would have informed the preliminary design. As it was the majority of the preliminary roads design was not acceptable to the Council and much of it had to be re-designed adding delay and cost to the project".

See also a draft paper produced by Tony Glazebrook, TIE, in 2010 (CEC00307573) which set out his understanding of the reasons for the delay in completing design including (bottom of p3 and p4) a comment in relation to the "massive volume" of CEC comments on offered design.

(1) What were your views on these matters?

This LL paper predominately relates to matters prior to my involvement in the tram project. Hence I cannot give my viewpoint on most issues, however, where I was involved I can make the following comments.

I was not involved in the parliamentary stage or the preliminary design stage. The LL paper by D&W gives a very interesting insight into the complexity of the issues, and in my sphere of influence makes a reference about "aspects of the project that had been done extremely well- for example the interaction between the Council and the design team (SDS) since the Council co-located and the benefits this has brought to the project cannot be under estimated", which was the team I co-ordinated.

Tony Glazebrook's comments (refer to CEC00307573) I generally support.

(2) To what extent, if at all, do you consider that the actions, or inaction, of the different parties and stakeholders, including CEC, resulted in delay in progressing and completing the design for the tram project?

I would suggest that SDS partial submission of packages added significantly to the time taken to complete the consents and approvals process. SDS, as noted, did commit to deliver packages but "SDS was never ready to fulfil them". The resulted in elongation of the iterative approvals process including going back over previously submitted drawings to check and note conflicts with the current submission. It appeared that SDS implement an element of the design, say signals design,

independent of other aspects of the design, but then appeared not to integrate this into one package, but rather submitted this independently for consent and/or approval.

To illustrate this using a simple example, at a major junction a signal drawings was submitted for approval, which after a number of design changes and clarifications was approved in principle. Subsequently the signs design was submitted including a traffic island. When the Roads approvers checked the two designs it was apparent that the signal pole location conflicted with the traffic island, thus requiring further amendments. This is just a very simple illustration of the interrelated and interdependent design issues that demonstrate the consequence of SDS not submitting completed design packages. As a consequence this resulted in "massive volumes of CEC comments on offered designs", which proved to be a very time consuming and ineffective approach to gaining approvals. CEC could only encourage a change in SDS approach. I concur with the final comment (top of page 4) by Tony Glazebrook that "these SDS (design) processes being invisible, but obviously too slow".

Consequently the approvals process took more time than planned (due to the iterative loops of checking and rechecking). I believe that CEC approvals teams used their best endeavours to process the elements of the design submissions as timeously as practical, albeit in a very inefficient design approval process, CEC provided clear and transparent reasons for amendments or clarifications, which ultimately led to approvals being granted.

In conclusion complete design packages, taking full account of integration into the urban space and place thus comply with the Roads and Planning guides, would have resulted in a significant time reduction for consents and approvals.

Utilities

5. TIE entered into the MUDFA contract in October 2006. Utilities diversion works commenced in July 2007 and were due to be completed by the end of 2008, prior to the commencement of the main infrastructure works.

By way of overview:

(1) Prior to the utilities works being undertaken, what investigations took place (including by whom and when) to identify the utilities that would require to be diverted? What investigations, for example, were made with the statutory utilities companies (SUCs) and with CEC? Were any difficulties encountered in carrying out these investigations?

I was not involved in the Utilities prior the letting of the MUDFA Contract nor the early part of the MUDFA works. I was introduced into the process at a later stage and my role concerned the quality of road reinstatements at the utility trenches and temporary traffic management.

(2) Which organisation was primarily responsible for ensuring that accurate and sufficient utilities investigations were carried out?

The Utilities Act requires each utility to provide the location of their apparatus. However, in practice, this process does not provide accurate drawings indicating the

location of apparatus. The responsibility for determining the exact location of apparatus, using the indicative utility drawings, was a matter for TIE and MUDFA and subject to the terms of the contract, with respect to responsibility and liability.

(3) What agreements were entered into with the SUCs to facilitate obtaining their agreement to the utilities works?

I was not involved with SUCs aspect of MUDFA.

(4) What were the main difficulties encountered in carrying out the utilities works? What were the main reasons for these difficulties?

One of the difficulties of the MUDFA work was the inaccuracy of the indicative apparatus location drawings, especially unmarked services. In the congested road utility environment this caused delays since approval to divert unmarked apparatus had to be agreed with the relevant Utility. From my perspective the poor quality of reinstatement and secondary compaction causing settlement on the road surface was a matter of concern.

(5) What steps were taken to address these difficulties?

I was not directly involved in this process, but I understand that improved lines of communication between TIE and the Utility Companies helped shorten the time to gain agreement for a revised design. In my own role I arranged for trench compaction trials, with Heriot Watt University, to be carried out in the MUDFA compound in Leith to assist with the resolution of re-instatement issues.

(6) Were these steps successful (and, if not, why not)?

This shortened the time between a problem been encountered and a solution agreed. The improved method of working following the trials resulted in an improvement in the quality of reinstatement.

Lessons Learned

- 6. The Highlight Report to the meeting of the IPG on 27 October 2010 (CEC00012896) noted certain matters under Lessons Learned (para 6) (similarly, see the "lessons learnt" section in para 6 of the report to the IPG on 1 December 2010 (CEC00013539).
- (1) What were your views on these Lessons Learned?
- (2) What are your views on why these "lessons" do not appear to have been recognised and implemented at an earlier stage in the project?
- (3) With the benefit of hindsight, what matters relating to the tram project do you consider could or should have been handled or dealt with differently (and in what way)?
 - (1)-(3) I was not involved in this matter, because by this time I was seconded to TIE.

EVENTS IN 2007

7. The minutes of the Design, Procurement and Delivery sub-committee on 16 January 2007 (CEC01766256 at p2) noted "SDS progress – Concerns were raised about the practicalities of expectations and the changing priorities by different stakeholders on the delivery of SDS milestones. Late inputs from TIE and CEC into the design process further aggravated the situation and MC [Matthew Crosse] raised concerns on the complexity of the SDS internal set up where information takes significant time to be updated ... MC is to provide a 'Get Well' plan for SDS, taking into account above concerns, for discussion at Feb DPD".

The minutes of the meeting of the Tram Project Board on 20 February 2007 (CEC00689788 at para 3.1) noted, under Key Issues and Concerns, "Design Charrettes: CEC planning indicated the desire to revisit the outcomes of the Structure Charrettes ... Meetings are being held between TIE/SDS/CEC to address key concerns ...".

(1) What are your views on these matters?

The Charettes explored potential improvements to the tram stops or interchanges, which had been carried out in the Preliminary Design stage. This was the first significant opportunity for CEC to directly influence the quality of the interaction of the tram within the urban landscape. The review of the relation of tram stops on Princes Street would have provided better hubs or nodal points for connectivity with the West End and Waverley Station. SDS advised that for technical and timing reasons neither could be changed and this was ultimately accepted by the Directorate. The proposals, however for Picardy Place and the foot of Leith Walk vastly improved the connectivity for pedestrians and improved access to and from the tram stop. To date, however, this section of the tram has not been constructed.

(2) To what extent, if at all, do you consider that requests or requirements from CEC during Charettes delayed completion of design?

The Charettes did incur design time to carry out. Most of the resources to review the designs at the Charette stage were independent of the day-to-day design teams and included input from private sector Architects. However, there was some overlap of design resources from SDS, so some additional design time must have been incurred, but I do not recall this having been quantified.

8. A document dated 6 March 2007 from Brian Farrell, "Note on meetings related to tram decision making" (CEC01834694) set out various issues in relation to the design decision making process and perceptions about hold ups and pinch points.

Areas of improvement included: frustrations at senior manager level that communication upwards to directors and chief executors is not working properly (including "Frustrations in City Development over access to the director and the limited time he can spare for project briefing also emerged quite strongly"); the charrette process having resulted in some Council officials being treated with a degree of caution or suspicion; parallel working and governance structures; and various technical issues (including that there were hold-ups with the tram prior approvals, which appeared to be directly related to the level of design in the submissions, and that part of the planning process encouraged major rework of design).

(1) What were your views on these matters?

The Charettes were initiated by Cllr. Trevor Davis, Convenor for Planning, and based upon an initiative from his Edinburgh Public Realm Champion Sir Terry Farrell. My view is that the intentions of the Charettes were to improve the visual impact and connectivity of the tram and its potential use for the public. It sought to better relate the tram designs to the City Centre urban environment. This was the first opportunity for urban design input from the Council.

(2) What steps were taken, when and by whom to address these matters?

Better co-ordination and co-operation was achieved within CEC (including LRT) and with TIE/SDS once the purpose and scope was understood.

Access for quality time with the Director improved.

- 9. By e-mail dated 23 March 2007 (CEC01628233) David Crawley, TIE, proposed a "clearing house" to enable decisions to be made in respect of a number of long standing issues, "The consensus of view is that a decision, even if sub-optimal in the first instance, will allow faster progress to be made through subsequent change control than delay for a 'better' decision". Mr Crawley attached a document containing the high priority issues which required to be tackled to allow SDS to make progress, sorted in order of priority (CEC01628234).
- (1) What was your understanding of that proposal? What were your views?

In principle, if the revised process improved progress, then it has to be commended.

(2) What was your understanding of the reference to "subsequent change control"?

This revised process implies that a subsequent process is required so that the suboptimal design was refined to meet statuary obligations at a later point. This assumed the commitment of TIE/SDS to fulfil this obligation, while accepting the short-term benefits but the method by which this would be achieved was not clear to me.

10. By e-mail dated 3 April 2007 (TRS00004144) Bill Reeve provided Transport Scotland's comments on the Draft Final Business Case (TRS00004145), including comments in respect of the approach taken to calculating Risk (pp7-8) (including that "on a 'rule of thumb basis' a risk allowance equating to approx 12% for a rail-related project just entering detailed design may be viewed as being a little optimistic but this has to be qualified to the extent that it is possible there may be separate allowances for risk type items in the base costs") and whether the various assumptions in relation to Programme were realistic (the programme, for example, being stated to be based on the assumption of "right first time and on-time delivery" (pp9-10).

On 13 April 2007 Rebecca Andrew sent an e-mail (CEC01559060) attaching a spread sheet (CEC01559061) containing TS's and CEC's comments on the draft Final Business Case. The spreadsheet noted:

 Governance: "CEC have some concerns over how project is being managed. Need to build in independent 'Project Assurance' reporting to TPB, to give comfort on TIEproduced reports".

- Financial Analysis: "Some thought needs to be given as to how information can be provided to elected members in a format enabling them to make an informed decision. The level of detail provided for the DFBC is not really sufficient for the FBC".
- Risk: "TS perceive 12% risk allowance to be optimistic, although conceed [sic] that some of this may be included in the base costs. further detail of cost assumptions need to be provided to make this clearer" and "Details of where will the residual Optimism Bias cost uplift will be allocated should be provided".
- Programme: "[TS] There is general concern that the programme is tight, with little float and that the programme only considers a best case scenario" and "This concern is shared by CEC. We are also concerned by the drive to achieve milestones prior to completion of critical activities. For example, failure to complete detailed design before commencing MUDFA is likely to cause contract variations and substantial additional costs. This will be compounded if Infraco is also let before design is complete. There is also a risk that Infraco could be delayed by MUDFA delays due to incomplete designs. All delays and changes increase cost and threaten quality. It is also worth noting that the procurement strategy required advanced design and diversions to 'de-risk' the project—commencing MUDFA and potentially Infraco prior to design completion is potentially building that risk back into the project. TIE should consider whether it is necessary to review the programme, build in more slack and if necessary delay project completion".

By e-mail dated 18 April 2007 (TRS00004225) Rebecca Andrew sent Transport Scotland CEC's response (TRS00004226) to TS's comments on the draft FBC. CEC's response noted:

- Risk, "Further analysis of costing assumptions is required to give confidence on 12% risk assumption" (para 10).
- Programme, "TS concerns are shared by CEC. We will require TIE to revisit the
 programme and justify its assumptions, particularly in view of the SDS and MUDFA
 timetables slipping. We will also require the potential costs associated with delay to be
 balanced against the cost/quality impact of meeting an overly ambitious programme"
 (para 11).
- (1) What were your views on these matters?

My views are reflected in the Council's response to Damien Sharp (TRS00004226)

(2) What was done to address these matters?

The Council Directorate, including the Director of City Development, were engaged in discussion on these important matters. Based on the discussions to the issues raised an initial response was made to the Scottish Government, followed by meetings with TIE. Subsequently a detailed plan showing how each action would be implemented was prepared.

(3) What were your views on whether the 12% risk allowance was optimistic, whether further detail of cost assumptions were required and whether there should be an allowance for residual optimism bias?

As noted in (TRS00004266 10 Risk) further analysis of costing assumptions was required to be given, by TIE (confidence in the 12 % risk allowance).

Doc ID TRS00004266 should be TRS00004226 (4) What were your views on the concerns noted above under Programme? Did CEC require TIE to revisit the programme and justify its assumptions, in particular, in view of the slippages in the design and MUDFA programmes?

As noted in TRS00004266 11, I supported the view that TIE required to revisit the programme and justify assumptions, particularly in view of the SDS and MUDFA timetable slippage.

Doc ID TRS00004266 should be TRS00004226

Did you have any concerns around that time in relation to how the project was being managed? Was consideration given by CEC to obtaining independent expert advice, to give comfort on TIE produced reports and information?

I was supportive of independent expert advice being sought so that any suggestion of TIE bias could be avoided.

11. The Highlight Report to the IPG on 17 April 2007 noted (at para 5.4) that meetings were continuing with TIE and SDS to bring forward Prior Approval submissions, albeit it was suggested that some of the prior approvals may slip into next year.

It was further noted, "The systems designers (SDS) are having difficulty obtaining the necessary consents from the various utility companies with regard to the planned utility designs ... Alfred McAlpine Infrastructure Services (AMIS) have provided a revised programme to TIE that has the utility diversion works lasting until October 2008, which is 5 months beyond the original planned duration" (CEC01565482) (para 2.1).

(1) What was your awareness of, and views on, these matters?

I was aware of the potential delay, which was known to the Council Directorate.

- 12. In an e-mail dated 4 May 2007 (PBH00010817) Steve Reynolds, Parsons Brinckerhoff, noted a key concern in relation to "the lack of serious involvement with ... CEC to this point in the reprioritisation of the Master Programme", and further noted that he appreciated that that was for a very good reason.
- (1) What was your understanding of that matter?

My recollection was that at TIE was contracted with SDS and that CEC were not fully engaged with SDS and kept at arm's length. I do not know what Steve Reynolds meant by "lack of involvement ...for good reason"

(2) Were CEC involved in the reprioritisation of the Master Programme?

I do not recall CEC being involved in the Master programme.

13. The following documents in June/July 2007 showed problems with the MUDFA works, namely:

The Construction Director's Report for the meeting of the Utilities sub-committee on 6 June (CEC01664524) noted (page 8, Executive Summary) "Release of ... IFC ... still a major concern and impacting significantly on programme. Ratification of full impact being assessed"; as a result, the MUDFA programme was under further review and the next MUDFA programme "should take into full consideration any interdependeies with

INFRACO to mitigate any cost implications to tie" (para 2.2.2) (the minutes of the meeting are CEC01640813).

An e-mail dated 20 June 2007 from Stewart McGarrity (CEC01650422) noted, in the final para, that "We've managed programme slippage by keeping them busy elsewhere (digging a hole at Gogar) but we're now running out of such ideas".

The Construction Director's Report for the meeting of the Utilities sub-committee on 4 July 2007 (CEC01640813) noted (Executive Summary) "Note of Concern – release of design IFC drawings a major concern in maintaining continuity of work and impacting significantly on the programme dates" (original emphasis); "shortfalls of response information and/or acceptance from the SUCs now threaten the IFC Deliverables programme" (para 3.2) (the minutes of the meeting are CEC01642221).

- (1) What was your awareness of, and views on, the matters noted above?
 - I was not involved in these matters, my attendance related to aspects of trench reinstatement and road and traffic management.
- (2) What steps were taken to address these matters? Were these steps succesful?

I was not involved in these matters.

14. An internal Weekly Report dated 22 June 2007 by Steve Reynolds (PBH00026043) noted (para 5) "David [Crawley] and I had reached agreement over the past week on the strategy to be adopted to put pressure on the Stakeholders to confirm acceptance of preliminary designs so that detailed design could be completed. This resulted in CEC and TEL being told at the meeting that the previous approach based on waiting for the results from traffic modelling and bus operations analysis before moving to completed design would be discontinued. PB would now be working to complete the design on the basis of the assubmitted preliminary design material unless anyone at the meeting could demonstrate a reasonable case against such an approach. This resulted in most of the Crticial issues being closed out, although seven remain".

In an e-mail dated 22 June 2007 (CEC01640595) Matthew Crosse noted, "It's good we (i.e. TIE and CEC) are now being far stronger in respect of decision making. Particularly, acceptance that some decisions need to be forced — sometimes prematurely — in order to allow the detailed design to get started. And yes, they do carry itinerant levels or risk and some locations might need reworking".

- (1) What was your understanding of, and views on, these matters?
- (2) Was there a change of approach around that time in relation to "forcing" design decisions (and, if so, what was the change)?
- (3) Did you have any concerns that "forcing" decisions may result in designs requiring to be re-worked later?
 - (1)-(3) I was not involved in these matters.

15. Following the formation of a minority SNP administration in May 2007, and a debate and vote in the Scottish Parliament in June 2007, the grant for the trams project from Transport Scotland was capped at £500 million (see the letter dated 2 August 2007 from Malcolm Reed of TS to Tom Aitchison, CEC01666269).

Around that time, Councillor Gordon Mackenzie, Finance Convenor, sought information on a number of matters, including what contingency plan needed to be in place in case of a cost overrun (CEC01556572).

- (1) What steps were taken by CEC following the changed risk profile to protect its interests including, in particular, to ensure that CEC officers understood the risks and liabilities arising from the Infraco contract and, generally, to ensure that the tram project was delivered within time and within budget?
- (2) What, if any, contingency plans were put in place by CEC at that time in case of a cost overrun?
 - (1)-(2) In my role of Tram Co-ordinator and member of the B team we attempted to obtain clarification on these matters from TIE and to keep the Directorate briefed.
- 16. An e-mail dated 19 July 2007 from Andy Conway, CEC (CEC01675827) noted, in respect of the minutes of a recent Design Review Meeting, that the minutes did not reflect the Council's main point "we were promised that the new design submission packages would include all relevant info … in fact, the words used by SDS were that we would receive 'everything', plus a design assurance statement. This is not now the case, and I really don't see how CEC will be able to approve an incomplete design … I'm also unclear how SDS can assure the design, knowing that it is incomplete".
- (1) What was your understanding of, and views on, that matter?

I concur with Andy Conway's statement. The designs were incomplete and thus it was difficult to understand how these could be approved by SDS and granted unqualified approval by CEC.

(2) Did it cause you any concerns?

These matters did cause concern. It is interesting that Jason Chandler states "We are relying on the prior consultation process to iron out the vast majority of issues that would otherwise be identified as issues during the approval process and we appreciate all of the very constructive work done to date (i.e. by CEC)". It is good that the work and cooperation of CEC is appreciated, however, it was a misunderstanding to think that the CEC should have ironed out the design majority of the issues" as distinct from CEC giving clarification and guidance to the designers to help resolve specific design matters. The key issue was that the views of CEC should be truly reflected in the Design Review Minutes.

17. The Highlight Report to the IPG on 27 July 2007 (CEC01566496) (para 5.3), noted, under Planning Prior Approvals, "The first two Prior Approvals were processed on 9th July, with informal consultation taking place on a further twenty two elements. However, the current Prior Approvals programme remains compressed with the submission of formal

applications still progressing very slowly and based upon current estimates it is likely to be late August/September before the volume of approvals start to significantly increase ... The revised programme shows a compression of the workload which has now been extended from September 2007 to March 2008".

In a document you set out feedback from a meeting of TIE's Design, Procurement and Delivery sub-committee on 2 August 2007 (CEC01552370).

In an e-mail dated 2 August 2007 (CEC01551800) Rebecca Andrew noted a number of matters and observed, "In general, I have some concerns over the lack of contingency in the programme and the budget".

In a reply the same date (in the same chain) you noted "We are in a difficult position. The delays have accumulated to the programme and now we are [being] pressurised because the TIE programme of delayed is a £2.5m cost per four weeks. If read literally we are now accountable for the delay and also for an unrealistic programme, which was confirmed today as have no float – unrealistic!!".

(1) It would be helpful if you could explain your views on these matters?

The progress of the prior approvals, by CEC, slipped against the timescale on the SDS programme. This was due to the inadequate quality of these submissions or lack of information submitted altogether by SDS. In addition, inadequate programmed time had been allowed in order to process consents and approvals. This was a matter of concern because CEC had no authority to directly influence the rate or quality of submissions and so I reported this matter to the Director of City Development. For clarity the CEC staff resources were adequate to progress planned consents and approvals timeously when the necessary response to matters raised by CEC were fully addressed by SDS.

The progress of prior approvals was based upon the quality of submissions or lack of submissions by SDS. This was a matter of continued concern, but CEC had no authority to influence this outcome other than appraise the Director of City Development of the current state of the programme. For clarity the CEC staff resources were adequate to grant timeous approvals when the necessary requested amendments and clarification had been made and submitted by SDS.

(2) Did you share Ms Andrew's concerns over the lack of contingency in the programme and the budget? If so, were these concerns ever resolved to your satisfaction?

I did share Ms Andrew's concerns as detailed in email dated 2 August 2007, as her comments reflected my own views.

To my knowledge some issues were addressed, such as the allocation of time and cost for the Hearing. With regard to contingencies in the programme I believe was resolved by (i) modifying the SDS generated programme to include contingencies (ii) the Council increasing staff resources to deal with larger batches. The financial issue was followed up, and I believe resolved, with a letter from the Director of Finance, and consequently the Council, which stated that the Council would be held financially liable for the necessary time taken for carrying out its statutory duties for consents and approvals.

18. An e-mail dated 2 August 2007 by Andy Steel, Technical Services provider (TSS) (CEC01551796) noted certain high-level concerns in relation to the proposed Detailed Design Review process.

Mr Steel noted, "We now know that the design will not be coming in packages but will be drip-fed as it becomes available. That brings its own problems ... this process will only work if SDS are made to produce a detailed flow of information which in terms of regular rate of delivery is acceptable to TIE and can be resourced. Any plan that I have seen in recent weeks has the apparent shelf life of a chocolate fireguard ...".

(1) What was your understanding of, and views on, that matter?

The context to these emails is that TIE and CEC was seeking a mechanism to move the consents and approvals process (Roads and Planning) forward. Andy Steel (tram expert) comments reflect CEC views from the start of the approvals process. CEC required and SDS had agreed to, submission of complete packages to their programme. However, conscious of the slippage in the SDS programme, on the time line required for granting consents and approvals (in our case for Road and Planning: not tram infrastructure design) the Council sought to achieve better progress (within its control) notwithstanding the additional resource implication for CEC in administering associated with larger packages.

19. By e-mail dated 2 August 2007 (CEC01564770) Nick Smith sent a draft options paper (CEC01564771) which included the option of CEC obtaining independent legal advice on the Infraco contract. You forwarded that options paper to Andrew Holmes by e-mail dated 2 August 2007 (CEC01566648).

On 23 August 2007 Colin Mackenzie forwarded Gill Lindsay an e-mail from you (CEC01567522) and noted that you were "clearly very concerned that the contractual risks should be reviewed externally on behalf of the Council, and has his Director's support in that regard".

By e-mail dated 2 September 2007 (CEC01566895) you set out the scope of a proposed instruction to external consultants to review the risks arising from the Infraco contract, and the adequacy of the headroom available to CEC.

A Highlight Report to the IPG on 30 August 2008 noted that that changed the risk profile for the Council and sought guidance on the procurement of resources necessary to provide a risk assessment and analysis of the Infraco contract for the Council within the available timescales (CEC01566861) (para 4.1).

The minutes of a Property & Legal Meeting on 4 September 2007 (CEC01561179) noted (page 2), "Council Solicitor declined that opportunity to appoint independent solicitors, instead choosing to rely upon DLA letter of comfort to act in the Council's interest subject to agreeing the appointment of DLA ... It is the belief of the group that it is still prudent to seek legal advice before enabling the contractual approval".

On 18 September 2007 CEC published an Invitation to Tender Notice for provision of consultancy services "to review the contract risk allocation matrix for the infrastructure and tram vehicle contracts and identify those risks that remain within the public sector [etc]"

(TIE00678245).

By e-mail dated 24 September 2007 (CEC01652668) you stated that the Directors of Finance and City Development were in agreement with the appointment of Turner and Townsend to carry out an external review of the matters set out the brief (CEC01652669).

By e-mail dated 27 September 2007 (TIE00663266) Susan Clark, TIE, asked Malcolm Hutchison whether the OGC team would be able to include a review of risk as part of the forthcoming OGC review. It appears that that was duly done (see below), with the result that Turner and Townsend were stood down.

(1) What were your views on these matters? Did you consider that the contractual risks, and adequacy of the headroom, should be reviewed externally on behalf of the Council and, if so, why?

My personal preference was for an external and independent view to be sought on this significant contractual risk. Directors of Finance and City Development had both approved the appointment of Turner and Townsend (TT). This approach could have addressed issues relating to contractual risk and adequacy of headroom.

(2) Did you agree with the decision that appears to have been taken in relation to CEC not instructing an external independent legal opinion (and, instead, relying on the advice of DLA)?

I was disappointed that TT were not appointed

(3) Did you agree with the decision that appears to have been taken that a review of risk would be carried out by the OGC, as part of their review, rather than by external consultants such as Turner and Townsend?

I was not consulted, however, my view remains that the appointment of TT would have been appropriate, because of the value of independent advice to the Council.

(4) For the avoidance of doubt, who decided that it would be sufficient for the CEC to obtain advice from DLA and the OGC on these matters?

The Council Solicitor as stated in CEC1561179 (page 2, last paragraph under Governance).

- 20. An e-mail dated 3 September 2007 by Susan Clark (CEC01644710) noted that you had met with Mark Hamill of TIE and forwarded a copy of "CEC risks" from TIE's risk register (CEC01644711).
- (1) By way of overview, what was your understanding of how TIE identified and quantified the main risks in their risk register?

The assessment of the risks provided by TIE, but the process was not transparent to me.

(2) Did CEC have their own risk register (and, if so, how and by whom were the main risks in that register identified and quantified)?

TIE was providing the risk register, and CEC did not have another risk system.

(3) What were your views, in general, on TIE and CEC's risk registers including whether they adequately and accurately identified and valued the main risks, including those arising from delays in the design and utilities works?

As noted in document (CEC01652668) my preference was for an independent assessment to be made, so that the adequacy and accuracy of TIE risk register could be determined.

- 21. A paper presented to the Tram Project Board on 9 August 2007 by David Crawley, "SDS Update P4" (CEC01565001) noted (p35): "SDS have now arrested delay, but are not able to recover lost time and the programme of deliverables, which is still able to support the procurement programme effectively, will be made 'just in time'. As there is no float left in the programme, it is very vulnerable to the effects of any additional delay".
- (1) What was your understanding of, and views on, these matters? Did they cause you any concerns?

Lack of contingency time in the SDS design submission programme was a matter of concern because of the past record of slippage in time scales for the SDS design submissions. Consequently float time was required in the programme.

- 22. On 16 August 2007 you sent an e-mail "Financial pressure on tram budget" (CEC01566778) which noted that "There are growing tensions arising within TIE in the context of budget and costs".
- (1) What was your understanding of why there were growing tensions within TIE in relation to these matters?

The purpose of this email to the Director of City Development was to alert and inform him to the significant financial statement made by TIE's CEO and seek his guidance as to the way forward and specifically "on what flexible financial guidance you can give me on additional costs"

My understanding was, for the first time, that additional costs may not be contained within the tram budget and hence the implication was that the Council, as funder of last resort (SG recent decision), might be required to provide additional funding.

I also made some tentative suggestions for a modified financial management system for Council's possible "additional (tram) funding" and seeking approval for this through the IPG.

- 23. A Highlight Report to the IPG on 30 August 2007 (CEC01566861) (para 4.1) noted:
- Detailed Design Technical Review Process, "This will become a significant work stream for CEC and will be very labour intensive. It is anticipated that this will involve reviewing potentially as many as 16,000 drawings and 600 reports. It is critical that this will commence in early September, however TIE have still to confirm this" (para 2.3); and

noted, under Planning Prior Approvals, "A revised Prior Approvals programme has now been prepared by TIE/SDS. This would extend until June 2008 ..." (para 6.3).

(1) What were your views on these matters?

From one perspective it was good that submissions from SDS for Prior Approval would increase after a history of backlogs and partial submissions. However the implication of how the Council would administer this significant increase in submissions required to be addressed. Further the Prior Approvals submission programme from TIE/SDS had been extended to June 2008, which had potential financial implications for the Infraco contract.

(2) What were your views on whether it was realistic to expect CEC to review as many as 16,000 drawings and 600 reports within the available timescale?

Discussions with the Approval and Planning teams, in particular, resulted in the necessary resources being in place to achieve this revised programme, subject to the submission being made by early September. This demonstrated the commitment and experience of the Prior Approval staff to progress the work.

- 24. In an e-mail dated 26 September 2007 (CEC01561555) Colin Mackenzie expressed certain concerns relating to the lack of accountability of the Tram Project Board to CEC, that TIE were responsible for the delivery of the tram project (and were accountable to CEC) and that the proposal that the TPB set up various committees ran the risk of further weakening the accountability of TIE to CEC.
- (1) What were your views on these matters?

These are legal matters, however, I support the views expressed.

- 25. The Highlight Report to the IPG on 27 September 2007 (CEC01561544) noted:
- Detailed Design Review Process, "Initial meetings were held on the 7th and 13th September to discuss and agree the review process, which is being split into two separate areas; Planning and Policy related or technical. A trial submission highlighted some serious gaps in the quality of information being brought forward at this stage. CEC have emphasised that this needs to be resolved as a matter of urgency ..." (para 3.3);
- Planning Prior Approvals, "A revised Prior Approvals programme was tabled by TIE on 6th September. This differs to the previously agreed programme which extended until the end June (as outlined in the previous Report) in that a significant proportion of the Prior Approval determination dates have been brought forward to the end December/end January. This reflects the need to have Prior Approvals in place in advance of the letting of the INFRACO contract" (para 7.6).
- (1) What were your views on these matters?

In my view it was important to close out the Prior Approvals process before awarding the Infraco Contract.

(2) Given the difficulties experienced with design to date, what were your views on whether it was realistic or appropriate to proceed with a programme that assumed that SDS would "get designs right first time"?

The normal process for achieving Approvals with developers in Edinburgh involves an iterative process between the designer and the Approver. This is the mechanism by which effective and appropriate design is established for the streetscapes of Edinburgh. Consequently my view is that for SDS "to get it right first time", was unrealistic, based upon past experience and the previous quality of SDS design submissions.

(3) What were your views on whether bringing forward prior approval determination dates were likely to assist or exacerbate matters?

This was a matter that could only be influenced SDS. If they could achieve improved quality of submission that required fewer proposed amendments and clarifications by the approvers, then it may have been possible to bring forward approval determination dates.

26. A third Office of Government Commerce (OGC) Review was carried out in September/October 2007 (CEC01562064) and resulted in a "Green" rating (i.e. "The project is on target to succeed provided that the recommendations are acted upon").

The report noted the following possible matters of concern:

- While preliminary designs had been completed, only 65% of detailed designs were completed (p2).
- The entire costs of the project could not be finalised until the due diligence process with the preferred bidder, value engineering and alignment of contract terms had been completed (p4).
- The timeliness of project delivery was of concern. Both bidders had raised the concerns that the planned preferred bidder period, which included due diligence on the designs and the novated contracts, was tight (p5).
- While the tools being used by TIE to identify, monitor and manage the risks were "impressive", "If there is any weakness, we would note that discussions of these risks have not always been reflected in specific actions in the tram project board minutes" (p7)

In an e-mail dated 4 October 2007 (CEC01567494) you provided an informal summary of the review and noted "2. Infraco: is critical in terms of time, VfM, Budget. Time of concern between now and financial close hence vital that due diligence process is closed out. 3. Outcomes of due diligence and Risk transfer may or may not be met. Action: Micro management through planned delivery and close out of all issues by deadline".

(1) What were your views on these matters and the OGC's findings in general?

My role was to keep the Director City Development and, in this specific case, the Director of Finance informed of salient issues with regard to financial and risk in the

OGC report prior to publication. I was aware of the report being prepared, but do not recall being party to it, other than my attendance of a briefing session prior to publication and hence I cannot proffer any views on the report's preparation.

27. On 15 October 2007 the OGC review team produced a further report, "Project Risk Review" (CEC01496784).

The report noted that a number of risks remained with the public sector, including: the outturn price and delivery programme of MUDFA works; that the design and approvals processes delay the programme; that Financial Close was delayed and had knock on effects on approvals and programme; that the SDS novation process was not fully effective; changes of scope; third party delays; delayed and/or qualified acceptance; and project management skills and costs.

The report further noted, "We endorse the assessment that the level of public sector risk on the capital expenditure programme is currently £49 million at a 90% confidence level. Further our best estimate of the schedule risk is currently 21 days also at a 90% confidence level. This equates to a capital expenditure risk of a sum of £2.2 million in the context of the proposed contracts". The report concluded, "We believe that the overall headroom of £49m in the capital expenditure is a prudent provision at this stage of the project's development".

(1) What were your views on these matters?

This raised my concerns that an earlier assurance from TIE that all costs were adequately covered by the risk allowances within the budget may not now be the case.

(2) What were your views around that time on the adequacy of the risk allowance? Did your views in that regard change at any time (and, of so, when and why)?

To address these concerns I referred them to a briefing meeting, which I attended with the OGC team and highlighted issues I had noted to the Directors of Finance and City Development requesting their views and direction (prior to the issue if the OGC report on 14 October 2007). I made some suggested proposals for Actions (CEC01567494).

- 28. A joint meeting of the TIE Board/Tram Project Board/Legal Affairs Committee took place on 15 October 2007 (CEC01357124) (p10). The Boards were advised that the Infraco bids were primarily based on preliminary design.
- (1) Did you have any concerns about a possible increase in cost when Infraco bidders were provided with detailed designs (in particular, given, as noted above, that only approximately 60% of detailed design had been produced by that stage and that there appeared to be concerns about the quality of submissions)?

I cannot recall being at this meeting, but when I read the circulated minutes I was concerned about the impact when post "fixed price" contract Infraco stated 40% remaining detailed designs (my recollection is that this meant that 80% of the drawings were 80% complete rather than 60% of the detailed drawings were completed, but this was how SDS reported their progress). The Director of City Development was in attendance at this meeting and was aware of this significant matter.

29. The minutes of a Critical Issues meeting on 19 October 2007 (TIE00662982) noted (page 4, item 3), Risk Analysis and Control of Capex, that "Technical approvals show that only section 1b will be available prior to financial close. This leaves us exposed. DF is worried about changes which will escalate into claims from Infraco for areas not approved prior to financial close".

In an e-mail dated 19 October 2007 (CEC01399632) you set out three critical issues, including: "1. MUDFA works are behind programme which has a direct impact both on the cost of these works and the potential time thus cost impact on Infraco — action for there to be enough drawing to enable planned works to be carried out with sufficient lead time. 2. The risk of change after financial close is very high as the approval programme up to financial close is essentially only for 1b, hence the critical design of 1a is only considered post financial close. This require to better align with the Infraco programme and also assure that 1a detailed design is fit for purpose before financial close".

(1) Why were your concerns in relation to these matters?

My primary concern was ensure that the Directorate were kept informed of these critical contractual and financial matters, as I had no information or understanding that they were matters which were being accommodated by TIE.

(2) What, if anything, was done to address these concerns?

Directorate meetings were held to consider these matters.

(3) Were your concerns in relation to these matters ever addressed to your satisfaction?

I was satisfied that the Directorate were addressing these issues with their broader appreciation of the tram project. I was disappointed that it was never explained to me why my concerns were not fully addressed.

30. On 25 October 2007 the Council's approval was sought for the Final Business Case, version 1, in respect of phase 1a (Airport to Leith Waterfront). A joint report was provided by Andrew Holmes and Donald McGougan (CEC02083538).

The report to Council noted that:

- The SDS had prepared preliminary designs and were currently finalising the detailed designs. (para 3.22)
- "It is anticipated that the SDS and Tramco contracts will be novated to the provider of the infrastructure works. This means that significant elements of the responsibility for the design and vehicle provision and the risks associated are transferred to the private sector" (para 3.27);
- The estimated capital cost of phase 1a was £498m; "There is detailed information behind [the] estimates, which take due allowance for risk contingency and further scope for savings, but a fuller breakdown cannot be provided at this stage for reasons of

commercial confidentiality" (para 4.2).

- "The infrastructure costs are also based on the fixed prices and rates received from the recommended infrastructure bidder. However, there is scope for this cost to move slightly, prior to contract close as further design work is required to define more fully the scope of the works to allow a firm price to be negotiated. There is a risk allowance to take account of these variations. The price also assumes that savings can be made on the proposals through certain Value Engineering innovations proposed by ... TIE and the infrastructure bidder" (para 4.3).
- The estimates included a risk allowance of £49m, which had been calculated based on the perceived cost and likelihood of over 400 risks in the project risk register. A statistical analysis known as Quantified Risk Assessment was carried out at a 90% probability level and had concluded that there was a 90% chance that final costs would be within that risk allowance, which "demonstrates a higher than normal confidence factor for a project of this scale and complexity" (para 4.10).
- It was noted that "The risk contingency is designed to cover additional unforeseen costs, but it is recognised that there is an element of residual risk of costs exceeding current estimates. It should also be notified that the risk contingency does not cover major changes to scope. The scope of such changes will be reviewed after completion of the Tram works and commencement of Tram operations" (para 4.32).
- "Fixed price" and contract details would be reported to the Council in December 2007 before contract close in January 2008. (para 5.3).

The Final Business Case, version 1 (CEC01649235) noted:

- "The level of risk allowance so calculated and included in the updated estimate represents 12% of the underlying base cost estimates. This was considered to be a prudent allowance to allow for cost uncertainty at that stage of the project. It reflected the evolution of design and the increasing level of certainty and confidence in the costs of Phase 1 as procurement had progressed through 2006. TIE continued to comply with the HM Treasury recommendations for the estimation of potential OB and had determined, in consultation with TS, that no allowances for OB were required in addition to the 12% risk allowance above" (paragraphs 10.13 and 10.14) (these provisions were essentially the same as the provisions on risk and optimism bias included in the draft FBC dated November 2006, CEC01821403, paras 9.11 and 9.12).
- "By the time of the DFBC, OB was effectively eradicated, as per the findings explained in the Mott MacDonald Review of Large Public Procurement in the UK. This was in view of greater scheme certainty and the mitigation of factors built into the procurement process, as well as project specific risks and environmental and external risks. Instead of using OB, TS and CEC adopted a very high confidence figure of 90% (P90) in the estimate of risk allowances to cover for specified risk, unspecificed risk and OB" (para 11.43).
- (1) It would be helpful if you could explain the process by which that report was drafted (including which individuals, from which organisations, had an input into drafting the report)? What was your role or input in drafting the report?

Ms Andrew and I were briefed by our respective Directors to draft this Report. Ms Andrew provided the financial and risk input while I provided the engineering and land compulsory purchase input, all based upon information provided by TIE. Consequently, with reference to the paragraphs referred to, I believe that I drafted 3.22 and Ms Andrew 3.27, 3.32, 4.2 and 4.10.3. Additionally Mr Sladden (Council Surveyor) provided information on Land compensation. Once Ms Andrew and I had collaborated on the initial draft with input from TIE, both Directors modified a number of drafts and then approved their final report, which concluded with the Committee report Edinburgh Tram Final Business Case of 25 October 2007.

(2) To the extent that information in the report was provided by individuals outwith CEC, what steps, if any, were taken to confirm the accuracy of that information?

This report is primarily based upon information provided by TIE, either specifically for this report or extracts from papers that TIE had prepared including the QRA. TIE's senior staff provided assurance on key issues, added comments to the draft, while other matters had been discussed by TIE with the Council Directorate in the lead up to the drafting this report.

(3) Did you consider that the report to Council fully and accurately reported on the delays in relation to design, approvals and consents and utility works and the risks arising from these delays?

The accuracy of estimates was based upon numerical data provided by TIE, the OGC report and informed by meetings that the Directorate were invited to as the various drafts of FBC evolved into its final form. I personally did not fully understand or appreciate how the potential delays arising from the design process nor post contract MUDFA works, had been fully taken into account, from my perspective and I suggest making a £25m allowance for these consents and approvals risks. (CEC01383667).

(4) What was your understanding of how the Infraco contractor could provide a fixed price, and how design risk could be transferred to the private sector, given the delay in design, approvals and consents (and given the design and TRO milestones noted at page 191 of the FBC whereby, for example, detailed design for phase 1a was not expected to be completed until September 2008)?

The Council was advised by TIE that there were contingencies allowances within the budget to take full account of the incomplete detailed designs. The implications for the TRO were a deferment of the programme rather than a significant increase in costs apart from the inclusion of financial provision for a Hearing (subsequent changes in the legislation by Scottish Minister removed this requirement), which was added to the FBC. Please note that under paragraph 4.27 that notwithstanding the assurances comments from TIE that the qualification is added "However, significant risks still lie with the public sector, and given the cap on Government funding, may impinge directly on the Council as funder of last resort" (CEC02083538).

(5) What were your views on the paragraphs of the FBC noted above? Did you agree that from late 2006 onwards optimism bias had been effectively eradicated and that it was appropriate to make no further allowance for optimism bias in addition to the risk allowance? I did not have access to the necessary information to form a view with regard to whether there was bias or not, nor was I asked for input to this matter. I was concerned that there was not full transparency of financial matters for example with regard to the risk contingency and further scope for savings as noted in paragraph 4.2 "a fuller breakdown cannot be provided at this stage for reasons of commercial confidentiality" nor an independent risk assessment (TIE00663266 and CEC1561179). I would have been more content had the Council taken independent advice on the risks so that any bias could have been addressed or been demonstrated not to exist.

CEC1561179 should be CEC01561179

31. An e-mail dated 24 October 2007 by Alison Bourne (TIE00145002) raised a number of queries and concerns in relation to the FBC, including "1. There is, again, no detailed breakdown of costs contained within the [FBC]. Without this, it is not possible to ascertain whether realistic allowances have been made and whether all likely items of expenditure have been made and whether all likely items of expenditure have been properly included … 7. The public sector is (in whole or in part) to bear the detailed design risk, including I assume any changes between now and whenever a final design is approved. This could add significantly to the costs, as was the case with the Holyrood Building. 8. The public sector is (in whole or in part) to bear the risk of cost overruns in utilities diversions …".

Mrs Bourne finished by observing, "The tram scheme would have very long-lasting consequences for the city, its infrastructure and its financial position. It seems quite bizarre that the [FBC] can be considered whilst matters such as TRO procedure, scale of utilites diversions, completion of the detailed design/modelling of network impacts and the traffic management scheme, impact upon bus services, etc remain unresolved ...".

(1) What was your views on these matters?

The general cost implications were considered by Finance and, further to my comments above about transparency and detailed design costs, I have no further input.

I do not agree with comments made with respect to the TRO process. It is necessary to start advertising the draft orders whilst the tram is being constructed because of the timeline to go through the TRO processes and have Made TROs in place to facilitate the operation of the trams. For example it is competent to commence the works under a TTRO and then enforce the TRO on completion of the works and the operation of the Road, as this is the normal practice. I do agree with the comments regarding the risk associated with completion of the final design post-contract.

(2) Did you share any of Mrs Bourne's concerns and, if so, were they ever resolved to your satisfaction?

The financial position was determined by TIE and approved by the Council Directorate, however, I did not agree with regard to the TRO comments because this would have had no impact on costs and programmes.

32. The Highlight Report to the IPG on 15 November 2007 (CEC01398241) noted, under Detailed Design Review Process, "Reviews of the individual disciplines of the detailed design continue. The packages have yet to be coordinated by the designers therefore the value of

these reviews is limited and all packages will require resubmission when complete and fully coordinated by the designers and TIE. Further delays to the design programme are becoming apparent with all technical reviews programmed to complete after financial close" (para 3.3).

(1) What was your understanding of, and views on, these matters? What was done to address these matters?

As noted CEC had meetings with TIE, SDS and BBS to modify the agreed programme. Co-ordination of the packages was a very important matter because the design reviews had limited value if the necessary information (the various design elements) could not be considered as whole, rather than just individual items. Notwithstanding this limitation, the consents and approvals teams did their best and reviewed the partial package submissions and reported back with comprehensive comments to TIE/SDS and BBS. Additionally as noted under Planning Prior Approvals the Council increased the approvals number of staff when the workload increased.

33. By e-mail dated 20 November 2007 (CEC01383667) you advised Andrew Holmes that TIE had agreed to a fixed price contract for Infraco on the original basis, namely, that the detailed design would be completed by SDS, that all the designs were technically approved by the road authority and that all design had prior approvals granted by planning.

You further advised that only some of the designs had been completed in detail, none of the designs were technically approved and only 4 out of the 61 packages for prior approvals had been agreed. You considered, in the absence of information from TIE, that an allowance of £25 million should be made to enable changes to be made post financial close with BSC. You further noted that you raised that at the last IPG but there was a concern about such a statement being minuted and suggested that that "demonstrated a lack of understanding of how technical issues can translate into increase on costs through changes to time as well as money, especially for a fixed price contract".

(1) It would be helpful if you could explain the main points you were making in that e-mail?

In my experience it was unusual to proceed with a fixed price contract without having completed all the necessary engineering processes (refer to bullet points in document CEC01383667) and completion of pre-contract works (e.g. land acquisition, MUDFA). However, accepting that the decision had been made to enter into a Infraco contract without the Roads engineering processes (design consents and approvals) being complete, it was important that the consequences of this was taken into account and my suggestion was this should be covered by a "risk premium" or allowance (£25m CEC001383667). IPC were reluctant to accept my comments "I suggest that this demonstrates a lack of understanding of how technical issues can translate into increased costs through changes to time as well as money, especially for a fixed price contract" (CEC01383667). Therefore I considered it appropriate to remind the Director for City Development of these concerns, as they were not fully minuted in the IPG (CEC01398241).

(2) What was Mr Holmes' response?

My recollection is the Director of City Development was fully aware of my concerns and I hoped that he would consider them. I appreciated that in doing so he may have had discussions about my concerns with TIE and other members of the Directorate, to inform his decision-making in the context of the "bigger picture".

(3) Were your concerns ever addressed to your satisfaction?

My role was to keep the Directorate informed, about the aspects of the project I was tasked to do, and to this extent I am satisfied that I achieved this. However, some of my concerns were not fully taken into account. Notwithstanding that I only had knowledge of some aspects of the tram project and I recognised that the Directorate had a full or fuller picture and access to confidential information or discussions to inform their decision-making, on which I was not briefed.

34. By e-mail dated 29 November 2007 (CEC01397521) Alan Coyle circulated a draft Directors Briefing Note.

By e-mail dated 30 November 2007 (in the same chain) you commented on the report and suggested additional wording.

By e-mail dated 3 December 2007 (CEC01397538) Alan Coyle sent the Briefing Note (CEC01397539) to Andrew Holmes and Donald McGougan, explaining that the note set out a number of important issues which could impact on the report to Council on 20 December and sought guidance on how these issues should be treated in the report.

The Briefing Note was discussed at a meeting of the Chief Executive's Internal Planning Group on 11 December 2007.

(1) What was the purpose of the Briefing Note?

To inform and highlight concerns to the Directorate on specific tram project issues for their consideration so as to facilitate their decision-making processes.

(2) What were your views on the matters set out in the Briefing Note?

Mr Coyle incorporated my comments (CEC01397521) within the Briefing Note (CEC01397539) and I believe that this briefing note was an "excellent piece of work" (CEC01397521).

(3) Are you aware what was done in response to the matters in the Briefing Note?

The Directorate considered this briefing note (CEC01397538) but I do not recall being given feedback.

(4) What were your views on the extent to which, if at all, Council members should be advised of the concerns in the Briefing Note and whether it was appropriate for there to be a report to Council on 20 December 2007?

This is a matter for the Directorate and my views were not sought. I believed by drawing the Directorate's attention to what I believed were important tram project issues they had the opportunity to review what was appropriate to include within the committee report and for Members.

(5) Were the main concerns set out in the Briefing Note ever resolved to your satisfaction?

I am satisfied that my concerns were communicated to the Directorate. I was disappointed that not more account was taken of these salient issues. I did not receive clarification given as to why they had not been fully incorporated into the report. However, I appreciated that the Directorate had the fuller contractual and tram project picture and access to confidential information that may have influenced their decision-making.

- 35. The Highlight Report to the IPG on 11 December 2007 (CEC01398245) noted:
- Detailed Design, "Further delays to the design programme are becoming apparent with all technical reviews programmed to complete after financial close. CEC have emphasised that this needs to be resolved as a matter of urgency" (para 4.2);
- Under Planning Prior Approvals, it was noted that 1 planning permission and 5 prior approvals had been granted, 4 prior approvals were currently under consideration and that 52 batches remained to be submitted for prior approval. It was further noted, "Of the batches received, a number have been put on hold awaiting revised details from the designers. There is concern that prior approvals may have to be revisited if there are substantial changes in design coming from inter-disciplinary coordination, technical approvals or value engineering" (para 4.2).
- (1) What were your views on these matters?

I had to ensure that CEC had sufficient resources to administer the statutory consent and approvals process timeously as this was within my control and influence. Also I sought clarification of the design submission programmes and encouraged the slippage in the programme to be arrested and if possible recovered "as a matter of urgency", but ultimately this was a TIE matter as the contract was between TIE and SDS.

(2) What was done to address these concerns?

I sought clarification of programmes and encouraged TIE to use their powers under the contract to facilitate timely design submissions in substantially complete design packages. Although there were areas of improvement the programme continued to slip and the submission packages were still incomplete.

Even though the partial design submissions required more work than if they had been submitted as one package, the Approvals team did their best with what design submissions they received and provided comprehensive comments to TIE/SDS. This meant more work for the consent and approvals team, but at least this was something CEC could control and manage and keep TIE/SDS fully informed as to what was required, updated in reports on a weekly basis.

36. In an e-mail dated 14 December 2007 (CEC01397774) you referred to a presentation by TIE the previous day and queried the adequacy of Quantified Risk Allowance. You stated, "The scope of the works is not clear to CEC and specifically the quality and quantity and

status of designs on which BBS have based their price. Also none of the designs are approved (none technically and only 4 out of 61 prior approval packages) hence the scope is likely to change, hence provision should be made for this".

Geoff Gilbert replied, "I have previously explained the interrelationhip between emerging detail design, Employer's Requirements and Infraco Proposals works and how price certainty is obtained out of this process and are in the process of delivering such certainty. Therefore, please advise what scope changes you anticipate arising out of the prior approvals and technical approvals. The overall scope of the scheme is surely now fixed, is it not?".

In another e-mail dated 14 December, to Tom Hickman (CEC01483284), you noted "There are concerns within CEC that the design deliverables may have an impact on MUDFA and this may also impact on Infraco programmes. Consequently we have asked for the QRA process to take account of these possible delays to the programme and increased capex costs—can you confirm that this review is in place".

(1) It would be helpful if you could explain your concerns as noted above?

Mr Gilberts and Ms Clark's response and Mr Sharp's reply explains the divergence in understanding of issues and specifically the risks associated with consents and approvals.

My concerns are as set out in my email responses and as summarised by Damien's Sharp's email of 17 December 2007. My concerns were that risks for completion of designs was not fully accounted for in the QRA. I was not clear on the assumptions made by BBS in their tender. Our understanding of the position on incomplete "none technically only of 61 designs was and 4 out packages" (CEC01397774). "None technically" meant that the qualification and further clarifications were required for TIE/SDS even on the four qualified prior approval packages. Consequently, I was challenging the risk assumptions and seeking and encouraging TIE to take account of my concerns to review and hopefully increase the risk allowances.

(2) Were you satisfied by Mr Gilbert's response? What was your understanding of the process by which price certainty would be obtained? What was your view on whether scope changes were likely to arise out of the prior and technical approvals? Did you consider that the overall scope of the scheme was fixed?

I did not believe that Mr Gilbert's email fully addressed the difference between the overall scope of the scheme and the implications and risks associated with the partial road and planning design submissions (quality and quantity); the potential impact on the completion of the designs; and the consequential implications for time and money. Mr Gilbert stated, "we (TIE) believe that the allowances are adequate, if the mitigations referred to in my presentation and QRA are applied".

The assumption that the construction of the tram works on Princes Street would be satisfactorily completed in six months to the required quality was in my opinion, unrealistic. This was the first on-road tram section to be built and, in my view, likely to experience some delay and require corrective actions. Hence an 18-months closure

gave TIE and their contractor the time required with an additional margin. I could not understand how it was possible to have price certainty with these uncontrolled parameters, notwithstanding the QRA.

My understanding was that the SDS contract required SDS to gain consents and approvals, in the context of an urban environment (including World Heritage Site) which required that the tram design be integrated into the existing streetscape. So, for example, if this meant a change of design to taper the tram electric poles, then this was part of the statutory consents and approvals process and not a change of scope. However, I appreciated that should the Council seek changes outwith the terms of the Infraco Contract, then this would incur additional time and cost.

I believed that until the designs were completed, including the statutory consents and approvals process, the full cost implications for the consented and approved design was difficult to determine and evaluate, notwithstanding the QRA. This was the reason for my proposal for an additional £25m risk allowance to which TIE did not agree.

(3) Were you satisfied that the QRA contained an adequate allowance for the risks you raised in these e-mails?

In my experience the assumptions of the QRA seemed to be based upon an aspirational programme rather than upon the actual achieved delivery to date. Consequently the aspirational programme seemed, in my view, to be over optimistic; hence risks should be based on rates of submission delivered rather than what was hoped could be delivered.

Alternatively if TIE/SDS could show how the Roads and Planning design submissions process was to change so that designs submissions on the critical path would arrive on time and were of sufficient quantity and quality (complete packages) to be approved and thus meet the aspirational programme, then perhaps the QRA was possible. However, on the basis of evidence to date of programme slippage for submissions, partial package submissions and the many changes required to gain approval, it was difficult to accept how the assumptions in the QRA were achievable. Indeed this had been highlighted in the OGC report (CEC01496784 Conclusions page 3)

(4) How confident were you around that time that the SDS and MUDFA works would progress according to their respective programmes (and would be of the required quality)?

The aspirations of TIE for delivery and my experience of actual delivery by SDS for consents and approvals (and MUDFA) meant that I did not have confidence that the planned programmed progress could be delivered in the correct quality and quality required under the contracts. TIE did not provide me with a satisfactory explanation of what changes were proposed in the delivery process, referred to above, that would result in the programmes being achieved.

37. A meeting of the Legal Affairs Group took place on Monday 17 December 2007 (CEC01501051). The minutes noted that "WG [Willie Gallagher] reported that the Infraco Contract is now at 97% fixed price with BBS taking on design risk. Further negotiations to be

undertaken between now and financial close. AF [Andrew Fitchie] noted that CEC/TIE will need to be clear on what elements of SDS ongoing design novation will be included (or excluded) from novation agreement between BBS and SDS. Approval of design remains an item of concern for BBS as SDS are not tied to a timeframe for obtaining the required approvals whereas BBS are" (para 2).

(1) What was your understanding of these matters?

Initially the statement by WG suggested that only 3% of the contract was not as yet fixed and that further discussion were on going. This appeared to give comfort to CEC concerns. However on listening to Mr Fitchie's comments with regard to the SDS Novation and the timeframe for obtaining approvals not being tied in to the BBS contract, meant that I continued to be concerned that design risks not being controlled and fully accounted for under the contracts.

- 38. We understand that around the middle of December 2007 discussions took place at Wiesbaden, Germany, between representatives of BSC and TIE in relation to the Infraco price and that, on 20 December 2007, an agreement, or heads of terms, were reached (the Wiesbaden Agreement) (CEC02085660).
- (1) What was your understanding, if any, of the purpose and outcome of the meeting at Wiesbaden?

I was not involved in this matter and did not have access to papers or reports of this meeting, thus I am not in a position to make any informed comment.

(2) By whom were you advised of these matters?

I was not advised by anyone on these matters. I observed that meeting(s) were taking place and understood that ultimately that a price had been agreed.

39. An e-mail dated 18 December 2007, sent on your behalf (CEC01397825), attached a note, Tram Project Board Critical Issues (CEC01397826), in relation to a meeting of the Tram Project Board on 19 December 2007.

The note stated: "I. Negotiations, Firm prices – 97% fixed leaving Picardy Place and Lindsay Road as remeasurable ... 2. Budget ... The Approvals Risk is now allocated to TIE with a £10m provision for Change Control ...".

(1) What was your understanding of these matters? What was the basis for your note on these matters?

The basis for my Tram Project Board Critical Issues paper was to highlight and focus the attention of Directors for City Development and Finance to critical issues with tram project developments, as reported at the TPB. For example we were advised that under Budget item 2 that "revised figures have been discussed with Mr McGougan (Director of Finance) and accepted". As I had no knowledge of this I considered it important to ensure that both Directors were aware of what had been reported so that they could take any action required.

- 40. An e-mail dated 28 November 2008 from Nick Smith (CEC01400081) set out his views on certain key issues that the Directors should be aware of to inform their decision making process.
- (1) What were your views on the key issues noted by Mr Smith, in particular, under the headings Consents/Prior Approvals and Contingency?

I concur with Mr Smith's views generally, and specifically with regard to Consents and Prior Approvals and Contingency. I also agree the comment that "here are the key issues, which I think would be useful for Directors to be made aware of to inform their decision making process" (CEC01400081).

41. On 20 December 2007 Andrew Holmes and Donald McGougan presented a joint report to Council (CEC02083448) seeking members' approval on the Final Business Case, version 2.

The report appears to have evolved as follows:

- By e-mail dated 29 November 2007 (CEC01383999) Stewart McGarrity sent a copy of the draft report (CEC01384000) containing comments by himself and Miriam Thorne. The version of the draft report in existence at that stage noted that a further contingency of £25m was recommended to cater for changes from the preliminary design to final design (paras 3.3 and 4.3). An Appendix on Risks noted that designs were not complete and that "If the designs are built into the contract at contract close and the decision is made to change them at a later date, this will lead to additional costs and potential delay" (para 5). The Appendix also noted that if designs required to be reworked to obtain planning approval then, again, a variation order would be required at additional cost and delay (para 6).
- An e-mail dated 30 November 2007 by you to Rebecca Andrew (CEC01384035) stated "I have compressed the report as requested by Andrew to show what can be done. However I still have concerns about the completeness of information that informs the members decisions". In the compressed report (CEC01384036) the reference to an additional contingency of £25m in relation to design changes had been deleted.
- By e-mail dated 6 December 2007 (CEC01397621) Alan Coyle sent a draft of the report (CEC01397622) "for TPB circulation" following comments by Donald McGougan. The draft stated that "A Supplementary Report may be issued for the 20 December 2007 Full Council setting out the latest negotiated position with the Infraco contractor (BBS)" (para 5.5).
- By e-mail dated 12 December 2007 (CEC01397706) Alan Coyle sent you the most recent update of the draft report (CEC01397707).
- By e-mail dated 13 December 2007 (CEC01397719) Alan Coyle circulated a further draft of the report (CEC01397720). The reference to the possibility of providing Council with a Supplementary Report had been deleted as had the Appendix on Risks.
- (1) It would be helpful if you could explain, in general terms, the process by which the report

was drafted and finalised, including which individuals, from which organisations, had an input into drafting the report? What was your involvement?

The Directors for City Development and Finance briefed Ms Andrew and me to prepare a draft report entitled "Edinburgh Tram Contracts Acceptance" for the Council meeting of 20 December 2007. The first draft was prepared drawing on information from various TIE reports, and then, as requested by the two Directors, circulated to a restricted list of people on the Intranet who annotated their comments (tracked changes) on document CEC 0138400. Additional Mr McGarrity emailed Ms Andrew and me (CEC01383999) to arrange a meeting the following morning with Ms Clark and Mr Bell (TIE). We noted the issues raised at this meeting that reflected the track changes that TIE had made to the first draft and relayed this information to the Directorate. Subsequently the Directors determined which of the TIE track changes should or should not be included.

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On the instruction of the Director for City Development I compressed the report. As noted (CEC013840250) I expressed my reservations about the compression process and loss of information. Copies of the compressed tracked change report were provided on the 30 November 2007 to the Directors for City Development and Finance to inform them further as to the issues being raised by TIE. Following further amendments and alterations instructed by the Director of City Development and Finance the report was circulated again and further track changes added (CEC01384036). Further modifications by Mr Coyle, were instructed by the Director of Finance and circulated on 6 December 2007 to the TPB. Further changes were made and finally Mr Coyle, on behalf of the Director of Finance, made further changes on the 12 December 2007, and this became the final version (CEC02083448) for submission to Committee, signed of by the Directors of City Development and

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(2) To the extent that information in the report was provided by individuals outwith CEC, what steps, if any, were taken to confirm the accuracy of that information?

Finance.

All the changes were instructed at the direction of the Directors for City Development and Finance, taking into account the input from TIE (as noted in the track changes). I cannot comment further on the accuracy of the information provided by TIE in the track changes. I believe that Mr Coyle did attempt to seek clarification on a number of financial matters from TIE.

(3) Did you insert in the earlier draft of the report (i) the reference to an additional contingency of £25m for design changes and (ii) the Appendix on Risks and, if so, why? Why were these deleted from the version of the report presented to Council? What were your views on whether that was appropriate?

I did include in the first draft report reference to additional contingency of £25m for design changes and the Appendix on Risks, as, from my perspective, this was information to assist Committee on their deliberations. I do not know why this information was deleted. I refer to document CEC01383667 and my advice to the Director of City Development "I suggest that we (the Council) should make an allowance of £25m for this (design changes)" because I had had no further information from TIE that persuaded me otherwise. Based upon my limited access to information I was disappointed that these sections of the Committee report had been

deleted. However, I did not have the full picture and hence the decision to remove them may have been based upon other information available to the Directorate to which I was unaware.

- 42. The joint report to Council on 20 December 2007 (CEC02083448) noted:
- "The cost estimates for the project reflect provision for evolution as the detailed design will be completed in the coming months. The design is completed under the Infraco contract from the point of award of that contract through novation of the System Design Services contract with Parsons Brinkerhoff to Infraco" (para 3.2).
- "... Some cost allowance has been made for the risk associated with the detailed design work not being completed, at the time of financial close ..." (para 8.1).
- The estimate of £498m for phase 1a inclusive of a risk allowance as reported in October 2007 remained valid. The current price estimate was based on a compressed construction programme (para 8.2).
- "The fundamental approach to the Tram contracts has been to transfer risk to the private sector. This has largely been achieved" (para 8.10).
- "Risks retained by the public sector and which therefore bear upon the Council are explained in the Final Business Case section 11. These risks include:
 - o Agreements with third parties including delays to utility diversions.
 - o Finalisation of technical and prior approvals.
 - The market cannot provide Professional Indemnity Insurance to TIE vis-à-vis a claim by the Council against TIE, because TIE is wholly owned by the Council" (para 8.13).
- "There are additional risks such as third party agreements and consents where discussions and negotiations are continuing to reach an acceptable position in respect of allocation of risks" (para 8.15).
- "The risk contingency does not cover major changes to scope. It should be noted that the current construction programme is compressed to reduce the length of disruption and provide best value. Changes to the programme could involve significant costs, not currently allowed for in the risk contingency" (para 8.16).
- It was anticipated that the Notification of Infraco award would be issued on 11 January 2008, the Tramco and Infraco contracts would be awarded on 28 January 2008 and that construction on phase 1a would commence in February 2008 (para 8.19).
- The Conclusions included that, "The preferred bidder negotiations, in terms of price, scope, design and risk apportionment, give further reassurance that Phase 1a can be completed within the available funding and are consistent with the Final Business Case" (para 9.2) and that "The total forecast project cost is consistent with the final business case. TIE is confident that risk contingencies and the final approved design can be accommodated within the funding available" (para 9.3).

 Authority was sought from members for the award of the Tramco and Infraco contracts by TIE subject to price and terms being consistent with the FBC and subject to the Chief Executive being satisfied that all remaining due diligence was resolved to his satisfaction (paras 1.2 and 10.2).

The Final Business Case, version 2, dated 7 December 2007, was available to members (CEC01395434)

(1) What was your understanding of, and views on, the above provisions in the report?

My understanding was that the Directors of City Development and Finance had been provided with various inputs and concerns (from my perspective) relating to this Committee report. Discussion then followed with various parties within CEC and TIE, and at the end of this iterative and collaborative process the final report was prepared with the provisions stated within it. As noted in my previous answer I had concerns, but I had to accept that the Directorate had the bigger picture and having edited out some of my comments, had done so fully aware of my concerns.

(2) What was your understanding at that time of the extent to which the Infraco contract was for a fixed price (and the extent to which, and in what circumstances, the price was liable to change)?

I did not have any access to the details used to complete the complete Infraco Fixed Price Contract. However, on the areas where I had an understanding of the issues, such as a risk provision for the completion of the technical designs and prior approvals, I believe that my concerns were appropriate, based upon my limited knowledge of the Fixed Price Contracts. I believed that any design change had the potential to increase costs in this form of contract. Hence I believed that any designs completed after the tender had the potential to increase costs, but TIE advised this was covered by "funding availability" (Para. 9.3). Notwithstanding this, TIE gave an assurance that in paragraph 9.3 that 'TIE is confident that risk contingencies and the final approved design can be accommodated within the funding available".

Based upon my understanding of Para 8.15 "The risk contingency does not cover major changes to scope" but as noted earlier, compliance with the consents and approvals did not in my opinion constitute a change in scope.

(3) Did you consider that the report to Council on 20 December 2007 adequately set out the delays in relation to design, approvals and consents and utility works?

I believe that the input I made in the first draft was appropriate, however I appreciate that the Directors had a broader perspective on this important matter (with input from TIE) and had been fully informed of my concerns prior to editing their final Committee report.

(4) Do you consider that the report adequately set out the risks arising from these delays, including the risks arising from these works overlapping with the infrastructure works?

To some extent clauses 8.11, 8.13 and 8.16 in the report address the risks, but I still lacked an understanding as to adequacy of the full extent and provision for the risks

with this form of fixed price contract, including those risks arising from these works overlapping with the infrastructure works.

2008 (JANUARY TO MAY)

- 43. The minutes of a meeting of the Legal Affairs Group on 7 January 2008 (CEC01475121) noted that:
- "WG [Willie Gallagher] reported that the contract negotiations with BBS are proceeding satisfactorily and following the trip to Germany fixity on price, scope and programme as reported to Council on 20 December 2007" (p.1)
- "SDS have completed 70% of detail design. BBS are prepared to accept SDS under novation agreement (quality of design, programme and commercial position) ... Consents and approvals remains an area of risk that BBS are not happy to sign up to, as there is no time obligation on SDS to obtain all necessary approvals, whereas the Infraco contract has a liquidated damages mechanism in place which has a tiem [sic] dependency. The TIE commercial team are currenly working through these issues with BBS" (p. 4).
- (1) What was your understanding of, and views on, these matters?

I was not involved in either the contract or the contractual negotiations with BBS, consequently I do not have direct knowledge of this matter.

However, for example, I was concerned that "Consents and approvals remain a risk that BBS are not happy to sign up to, as there is not time obligation on SDS to obtain the necessary approvals, whereas the Infraco contract has liquidated damages mechanism in place, which has a time dependency".... albeit that TIE's commercial team were working through these issues with BBS. (CEC01475121 SDS Design Status).

(2) What was your understanding of the main issues that were the subject of negotiations between TIE and BBS at that time?

I did not have an insight to negotiations between TIE & BBS, as I was not involved. However, as noted in my response to 43.1 the post tender award completion of the design (*expressed as consents and approvals*) issue had still not been resolved contractually.

- 44. By e-mail dated 10 January 2008 (CEC01485884) Colin Mackenzie set out a list of items the Council required to be satisfied on.
- (1) What were your views on the matters in that list including, in particular, under Risk and Pricing?

I support the views expressed in this email since I collaborated in its formulation. Under "Risks" the intention was to encourage the Chief Executive to assist the Council gain "full transparency within the QRA", with specific examples stated under a-c. Under "Pricing" the intention was to encourage the Chief Executive to ensure that the Council sought "detailed analysis of prices, costs and risk allowances". The

Council's arms length company TIE seemed to be suggesting that all these matter were fully covered, but we thought an explanation should be sought from TIE on these issues.

- 45. The minutes of a meeting of the Legal Affairs Group on 21 January 2008 (CEC01476409), noted, in relation to Consents and Approvals (para 8), "NS [Nick Smith] asked who would be liable if SDS does not work to the programme MC [Mathew Crosse] noted that the SDS Novation Agreement will take care of this. At NS's request MC will confirm that the Agreement contains details of who will take the risk on knock on effects of delays" (you did not attend this meeting but sent your apologies).
- (1) What was your understanding at that time of the risks that could arise if SDS did not work to programme and the party that would be liable for these risks?

Based upon advise from TIE (Mr Cross) the risk was covered by the SDS Novation Agreement. Understandably, because of the importance and financial significance of this issue, Mr Smith sought confirmation from Mr Cross that the Agreement contained details of who was responsible for the knock on effect for delays.

I believe this was the correct action to take, because from my past contractual experience I thought it probable that TIE/CEC would be liable for delay to the SDS programme unless the Novation Agreement removed this liability from TIE/CEC.

- 46. An e-mail dated 22 January 2008 by Nick Smith (CEC00481318) noted a "significant issue with regard to design approvals and consents" against the background that "the design process is now over 12 months late in delivery".
- (1) What was your understanding of, and views on, these matters?

The emails demonstrate a number of points, including that compliance standards are a BBS liability. If CEC required a higher standard (betterment CEC00481318 page 4), than was specified in the contract this would require CEC to cover these additional costs. However, what constitutes a higher standard is not straightforward and requires negotiation for each compensation event, a process that is difficult to predict in terms of time and money.

(2) Were the matters in that e-mail chain ever resolved to your satisfaction?

I was not satisfied that the matters I had highlighted were fully resolved. It appeared to me, for example, that the Council had no authority or control over the contract yet may be liable for the consequences of the transfer of liability.

I understand that TIE had agreed with BBS to meet CEC Roads and Planning standards and Employers Requirements. However it appeared to me that it possible that CEC might now incur additional costs for complying with its own statutory processes. I do not understand why the Councils requirements ("difference in standards") were not fully incorporated by TIE into the BBS contract. This is not a situation that normally occurs when the Council is negotiating with a developer. Notwithstanding, my understanding on this matter was not comprehensive since CEC were not party to these contracts.

47. The Legal Affairs Group met on 18 February 2008 (CEC01474217).

By e-mail dated 19 February 2008 (CEC01400919), Colin Mackenzie advised Gill Lindsay that "The position regarding novation of the SDS contract to BBS was given next to no clarification last night [i.e. at the meeting of the Legal Affairs Group], with a contradictory explanation from TIE". Mr Mackenzie also noted, "I regret to have to record with you my concern about TIE's lack of transparency and co-operation with Council officers. I do not take this personally, but find it unacceptable that the Council is constantly having to press TIE for relevant information and face an evasive response. This is hardly conducive to a good working relationship".

(1) What were your views on these matters?

I agree with the views expressed by Mr Mackenzie in that the B team was only had partial access to the contractual picture with regarded to novation of the SDS contract to BBS and this, in my view, contributed to a strained working relationship between TIE and CEC.

48. The Construction Director's Report for the meeting of the Utilities sub-committee on 13 February 2008 (CEC01398499) noted (page 10) under Action Plan, "Review of output performance within the current live' sections over the prevailing periods has noted a reduction in target achievement. This is reflective of the congestion of services being uncovered within Leith Walk and latterly the city centre and the increasing output requirement to meet programme targets". The Key Issues/Blockers (page 15, para 4.0) included "Design delays in issuance of IFC drawings. Trend beginning to show again" (the minutes of the meeting are CEC01453676).

(1) What was your understanding of, and views on, these matters?

My involvement related to the quality of the road reinstatements. My comment on the reduction in targets (page 10 CEC01398499)) reflected an optimistic viewpoint, however I do accept that the site conditions on-street were difficult and an action plan was in place.

My comment on Key Blockers was that SDS had as yet not completed their design and could may lead to "potential problems" if there had to be further changes once drawings were considered complete.

- 49. On 18 February 2008 BSC produced a Design Due Diligence Summary Report, based on design information received by BBS by 14 December 2007 (CEC01449100). That document raised various concerns about design, including that "more than 40% of the detailed design information" had not been issued to BBS.
- (1) Did you see, or were you otherwise made aware of, this report?

I do not recall having access to this report.

(2) In any event, do you have any comments on the matters set out in the Executive Summary of the report?

Reading this report for the first time now I concur with the Executive Summary comments in the last two paragraphs with regard to SDS slippage of programme and the issue of whether construction design would have been novated to Infraco. The comment that "a novation is considered to present significant and unforeseeable risks to the project" was a concern I had, but this seemed to contradict with the advice from TIE.

- 50. By e-mail dated 22 February 2008 (CEC01474243) Graeme Bissett circulated a paper on "SDS Delivery and Consent Risk Management" (draft v2) (CEC01474244).
- (1) What was your understanding of the purpose and main conclusions/recommendations of that paper?

I generally concur with the Conclusions, with one exception. I am surprised by the open comment that" it is the view of tie and CEC project team that these factors can be relied upon to manage the exposure successfully", because CEC had no contractual control over SDS quality or quality of submissions. What CEC could control was the processing of the SDS submissions, so to that extent the review by CEC of submissions could be relied upon.

(2) What was your understanding of (i) the risks and liabilities arising from the overlapping design and construction period and (ii) whether agreement had been reached by this time between TIE and BBS as to which party bore these risks and liabilities?

I appreciate that there were risks and potential liabilities with respect to the overlap between the design and construction period and that these were not fully controlled because (i) the novation process was only partial and (ii) CEC had no contractual influence over either SDS or BBS. However, I believe that the process of "graduated risk management" had merit and I am pleased that Mr Conway played his part in seeking to manage this process. To me this does not mean that this process controls the risks but rather puts in place a prioritized process to minimise the impact of potential delays in completing the design packages to IFC status.

(3) What was your understanding of (i) the "process" and (ii) the "set of contractual terms" that would enable TIE and CEC to manage the risks arising from the overlapping design and construction period?

With respect to CEC approvals team, their role was to assess, record comments and return the submissions within an 8-week period and give priority to any of those submissions identified as critical. Priority was given by the Council to provide the required number of experienced staff to meet the planned and programed submissions from SDS.

My recall of the "process" was about prioritising, by TIE/CEC, of consents and approvals of those submitted packages that were most urgently required for the Infraco works.

I cannot recall what the meaning of the term "set of contractual terms", but suggest that this is a matter for TIE, as they, rather than CEC, entered into a contract with

BBS and CEC never had visibility of the contractual terms between TIE/BBS.

(4) What was your understanding of the amount of the contingency allowed for risks arising from design, approvals and consents and how, and by whom, that contingency had been arrived at?

The Existing Risk Contingency stated £3.3m, with respect to consent and approvals risks. I do not understand how this figure was derived. With respect to CEC consents and approvals process, as stated on page 1 under Outstanding design risk, "SDS have resisted accepting liability for BBS for the timeliness of submissions and approval of the design packages after Financial Close because "any delay, they argue, could result in hefty exposure" and "CEC's leverage over SDS on the issue is limited". My view remained that the risk contingency allowance should be substantial (provisionally £25m), notwithstanding the sensible managed processes that had been put in place to minimise the design risk.

(5) The paper noted that "the risk is focussed on construction programme delay". To what extent, if at all, was consideration given at that time to risks arising from the possibility that BBS may not have been able to fix a price for work relating to designs which were not then available (regardless of whether any such outstanding designs related to approvals and consents)?

SDS have stated, as noted above, that they had concerns about accepting the exposure to this risk and I have also stated that evaluating the design risk was a complex and difficult task in the context of a fixed price contract. I am not aware of the possibility that BBS "may not have been able to fix a price for work relating to design".

(6) The paper noted that it was at TIE/CEC's option that the risk contingency could be retained or traded for a cash sum and full risk transfer to BBS and that, at present, the tactic was to hold the contingency and seek to manage the risk. What was your understanding of, and views on, these matters?

I cannot recall this issue of retaining or trading for a cash sum in order that full risk was transferred to BBS. As the design risk was difficult to control and evaluate, I cannot understand, why TIE believed that, BBS would consider accepting the full risk transfer. This design matter was not resolved between SDS and BBS.

51. By e-mail dated 28 February 2008 to Gill Lindsay (CEC01400987), Colin Mackenzie set out his view that there had been a number of material changes to what had been reported to Council on 20 December 2007.

He noted, "I think it is fair to say that the number one risk for the Council now is the SDS novation, and the costs of dealing with that. It is still not clear (because the Council is not kept fully advised of ongoing discussions between TIE, SDS and BBS) what the implications are for the Council legally and financially". Mr Mackenzie recommended that members receive a further report explaining the material changes in the Final Business Case since December 2007.

In a reply dated 29 February (in the same e-mail thread), Ms Lindsay stated, "Essentially matters are unresolved re SDS and novation and other matters are unresolved such as PCG's

[Parent Company Guarantees] on which we understood there was agreement ... My concerns are around the robustness of risk and contingency as although I accept there are movements from risk to price and closing of some risks, I believe that the residual risk re SDS may be very significant and I understand we still have no figures to assess this".

In a reply dated 29 February Mr Mackenzie noted "We do appear to be having difficulties with nailing down the SDS novation and fixing the price and risks flowing from that".

(1) What were your views on these matters?

I support the views expressed by Mr Mackenzie and specifically "essential matters are unresolved re 'SDS and novation ... my concerns are around the robustness of risk and contingency"

52. A Highlight Report for the IPG on 29 February 2008 (CEC01246993) gave an update in relation to Planning Prior Approvals and Technical Approvals. The Highlight Report included a draft Report on Terms of Financial Close dated 21 January 2008 (the "Close Report") (appendix 1). The draft was to be updated to reflect current negotiations.

The draft Close Report stated that "Infraco has a substantive responsibility in relation to consents and approvals but there is a critical interface with TIE/CEC which is being defined at this stage" (p5).

The draft Close Report also noted that, "Crucially the price includes for normal design development (through to the completion of the consents and approvals process – see below) meaning the evolution of design to construction stage and excluding changes if design principle shape form and outline specification as per the Employers Requirements" (p31).

(1) What was your understanding of the terms of the draft Close Report noted above?

My understanding was that a changing (with respect to the last report to Council), but evolving situation appeared to be developing where there may be circumstance where either Infraco/SDS or TIE/Council may be liable for design and associated costs, with regard to consents and approvals (page 31 & 32 CEC01246993). The concept of both Infraco/SDS and TIE/CEC having their respective responsibilities and liabilities as per the notes in question 52, seems reasonable. However this was only acceptable to the Council if there was adequate QRA provision to cover all such allowances with respect to CEC. With regard to the removal from the Committee report of my proposed indicative design risk allowance of £25m in the QRA, it was difficult to understand why it was justified to significantly reduce the risk allowance to £3.3m. Also it was not clear what was meant by "wholesale failure of this process not being covered by QRA".

Infraco- Infraco (including SDS) bear the cost and programme consequences associated with not delivering the required information in a timely and sufficient manner to the consenting or approving authority. Note the requirements are set out on page 32 under the 4 bullet points.

TIE/CEC- "TIE/CEC bear the costs and programming consequences associated with a delay in granting consent or approval having received the required information in a

timely and sufficient manner and/or the cost and programme consequences of changes to design principles shape and form and outline specification (as per the ER) required to obtain the consent and approval there this arose from conditions outwith the BBS contract but for example consistent with conditions in the ER."

Also on page 32 (CEC01246993) The Risk Allowance does not provide for the cost or programme consequences associated with wholesale failure of this process- see "QRA & Risk allowances below".

- 53. An internal Weekly Report by Steve Reynolds, Parsons Brinckerhoff, dated 29 February 2008 (PBH00035854, para 2.1.1) noted, that "Duncan confirmed what I had suspected that he has not been kept fully in the picture of the evolution of the [Employer's] Requirements" (para 1.2) and that "Substantial progress was made at a meeting on Tuesday in relation to misalignment between the Employer's Requirements, the SDS Design and the BBS Offer. We succeeded in securing a change of stance from TIE that any changes required to achieve alignment pre or post novation will now be instructed and paid for" (para 2.1.1).
- (1) What was your understanding of, and views on, these matters?

This is the first time I recall having read this document (PBH00035845). I support the view expressed that "I had not been kept fully in the picture on the evolution of the (Employers) Requirements" (PBH00035854-0001).

PBH00035845 should be PBH00035854

54. By e-mail dated 10 March 2008 (CEC01399016) Colin Mackenzie advised that he could not support a letter from the Chief Executive of CEC that changes from the Final Business Case were within tolerable limits and was of the view that the Chief Executive should report to Council again on the various material changes. In a further e-mail later that day (CEC01399012) Mr Mackenzie stated, "I do wonder whether TIE can realistically confirm that the terms recommended are consistent with FBCv2 with our current state of knowledge. I agree with you on the requirement for DLA to advise on any procurement risks flowing from the change to the risk allocation on design approvals ... The FBCv2 ... made a very clear statement that the private sector would be taking on these risks".

(1) What were your views on these matters?

I support the views expressed by Mr Mackenzie, in relation to seeking further advice from DLA on any procurement risk flowing from "change in the risk allocation on design approvals" when compared to the Council's understanding (based upon advice from TIE) that the private sector would be taking these risks. The final issue to "notify members of changes to the costs, risk and delivery dates since 20 December 2007" (CEC01399012) was an important issue to raise and one I support in principle, but ultimately a judgement for the Council Solicitor (Gill Lindsay) to make.

55. By e-mail dated 11 March 2008 (CEC01490289) Alan Coyle advised TIE that in order for CEC to approve the Intention to Award (ITA), CEC would require a letter from Willie Gallagher on certain matters, including that "the price is now fixed (excluding know (sic) estimated costs)".

By e-mail dated 11 March 2008 Alan Coyle sent an e-mail giving an update on negotiations following a briefing with TIE (CEC01407769). Mr Coyle's e-mail noted that "Novation —

This is still ongoing. TIE are meeting with SDS this evening. TIE are more upbeat than yesterday and have said that nothing will change re price or risk allocation presented to us. If it does, they'll come back to us before ITA".

In a later e-mail on 11 March 2007 (CEC01544518) you advised TIE that CEC required a statement confirming the elements of the SDS designs that are being re-designed by BBS, if any, the working assumption to date having been that all of the SDS designs were to be adopted by BBS.

In a reply, Graeme Bissett stated "the information you want is embedded in the Infraco proposal ... As I think we discussed today, the liability would sit with BBS/SDS in relation to any redesign".

(1) What was your understanding of these matters?

This indicates that at this point in time that I believed that all of the SDS designs were being adopted by BBS. My email was part of the process of trying to understand where risks lay with respect to design costs. The response from Graeme Bissett that "liability would sit with BBS/SDS in relation to any redesign" (CEC01544518) was reassuring and comforting. However, the meeting with Steven Bell ("to take you through this") assisted me in updating the draft report, with respect to the design and novation processes.

The emails from Mr Coyle indicated, under DLA Letter of Financial Close, that the novation of SDS re: performance of risk, implied that the Council was only at risk for Approvals delay. Mr Coyle's (CEC01490289) email stating that "that the level of risk allowance, as determined by the QRA is appropriate, as detailed in Stewart's email that the price is now fixed (excluding known estimated costs)". The situation with regard to the liability of redesign is confused, as this term "redesign" (CEC01544518) is not explained. Also the statement that "Council is only at risk from Approvals delay" (CEC01407769) was also not fully defined.

56. The Construction Director's Report for the meeting of the Utilities sub-committee on 12 March 2008 (CEC01453676) noted, under Overall Performance to Date, that a total of 7805 metres (against a planned 9754 metres had been undertaken), including 44 chambers (out of 79 planned chambers).

In relation to Section 1B, progress in the period was less than anticipated.

The Action Plan noted that "Overall progress in period had identified a reduction in outputs, due to increasing workload and number of live sections" and that "Key areas to be targeted are North end of Leith Walk (output 33%) and the Mound/St Andrew Square (output 58%) which are substantially lower than the section overall average output of 80%".

Under Programme (para 2.2) it was noted "Latest production figures indicate outputs have dropped significantly (approx. 50% output planned achieved), especially in the last period. Indications are we are 3-4 weeks behind programme". Similar Key Issues/Blockers as before were noted (with the addition of a 1500 mm sewer under the proposed A8 underpass) (the minutes are CEC01456730).

(1) What was your awareness of, and views on, these matters?

I attended a number of MUDFA meeting to represent the Council's interests with regard to the poor quality of road reinstatements at the utility works.

I was aware of the optimism to recover the programme, but the subsequent failure to do so, I did suggest on one occasion, to Graeme Barclay (TIE MUDFA Manager) that a MUDFA programme be provided based on achieved production rates, rather than aspirational production rates, however, this was never produced.

(2) Did these matters cause you any concerns, including whether the MUDFA works may overlap with, and delay, the infrastructure works? Were these matters discussed within CEC? Were these matters discussed with TIE?

The two areas of concern with respect to conflict between MUDFA and Infraco were Shandwick Place and the Mound crossing at Princes Street. These issues were the responsibility of TIE. I was involved in advising MUDFA as to reinstatement large excavations in Shandwick Place and I also provided Engineering advice to TIE about the lack of trimming of the side slopes prior to reinstatement and my concerns of secondary settlement. I was not involved in the resolution of the Mound utility works, but I was aware that there were technical problems.

(3) How confident were you around this time that the MUDFA works would be completed by the end of 2008? Did your views in that regard change at any time (and, if so, when and why)?

I was not confident that MUDFA Works would be completed on programme, because previous programmes had not been met.

57. By letter dated 12 March 2008 (CEC01347797) DLA advised CEC on the Draft Contract Suite.

Graeme Bissett, TIE, appears to have had an input into the drafting of that letter.

(1) Were you aware at the time that individuals from TIE had an input into drafting letters from DLA to CEC?

This was a legal matter and therefore discussions with TIE were normally conducted confidentially at Council Directorate level. However, on this occasion I was provided with a copy of this letter, which I passed on to Colin Mackenzie to seek his and the Council Solicitor's advice. I was unaware that TIE may have had input to this DLA letter.

(2) Do you consider that to have been appropriate?

My understanding, from previous statements from the Council Solicitor (CEC01561179 page 2 Governance last paragraph) that the Council were relying on DLA to provide "independent" advice such as a letter of comfort; hence under these circumstances I did not think that it was appropriate for TIE to be involved.

- 58. On 13 March 2008 Colin Mackenzie sent three e-mails setting out certain concerns:
- At 9.07 am (CEC01399075) Mr Mackenzie advised Gill Lindsay of his concerns about Mr Gallagher's letter and CEC giving TIE authority to issue the contract award notice. He found it hard to agree with the suggestion that the final terms negotiated were consistent with the Final Business Case, noting "As we know, the salient facts are that price has risen by £10 million since December 2007; the project timetable is now 3 months later than predicted; and risk of Consents has not been taken by the private sector. I would be most uncomfortable if these facts were not made known to elected members ... before Tom Aitchison authorises TIE to issue the Contract Award Notice".
- At 2.04 pm (CEC01401032) Mr Mackenzie advised Gill Lindsay of concerns in respect of DLA's letter of 12 March including his view that "it does not offer the degree of comfort which the Council might have expected were it the contracting authority" and that "The Council is being asked to rely on a report for the purposes of permissions for issue of Contract Award Notice and thereafter Financial Close founded on matters which are still under discussion"
- At 3.55 pm (CEC01401628) Mr Mackenzie expressed concerns about a letter dated 12 March 2008 from Parsons Brinckerhoff to TIE (CEC01401629) advising of further reviews that would require to be carried out to ensure full alignment of the Employer's Requirements and the Infraco Proposals.
- (1) What were your views on these matters? To what extent were these matters dicussed within CEC? To what extent were these matters discussed with TIE?

I support the views expressed by Colin Mackenzie (CEC013990175, 014032 and should be 01401628). As noted these matters were drawn to the attention of the Council Directorate.

CEC013990175 CEC01399075

- 59. A full meeting of the Council took place on 13 March 2008. From the agenda (CEC02083387) and minutes (CEC02083388) members do not appear to have been given any update of the tram project (nor did members appear to have been given an update the Council meetings on 7 or 21 February 2008).
- (1) Are you aware why members were not given an update on the tram project at these Council meetings?

I was not aware why members were not given an update on the tram project.

60. On 18 March 2008 you sent an e-mail (CEC01401041) on the Current Project Status, which noted that a number of issues required to be addressed, including "Price and Funding figure and scope".

We understand that on 18 March 2008, TIE issued a Notice of Intention to award the Infraco contract to BBS.

(1) Did you consider that sufficient agreement had been reached on all matters as at 18 March 2008 to justify the issue of a Notice of intent to award the Infraco contract to BSC?

CEC0140141 should be CEC01401041

CEC0140141 should be CEC01401041

In my position statement (CEC0140141), as Tram Coordinator, I highlighted to the Council (Finance, Legal and the Director of City Development) what I believed was required for the Council to be in a position to issue the Notice of Intent to award the Infraco Contract to BSC. As noted, in my email there are still matters outstanding and to my knowledge the Novation Agreement had yet to be provided by TIE to CEC. Consequently, my personal opinion is that the Council was not in a position to proceed, until these matters had been agreed with CEC. As a matter of priority, I suggest that Mr Mackenzie passed my email (CEC0140141) onto the Council Solicitor.

61. An e-mail dated 18 March 2008 from Colin Mackenzie (CEC01399118) circulated DLA's Risk Allocation Matrix.

Mr Mackenzie stated, "I have never been a big fan of this document: it is a bit too abstract and one would really have to read the entire contract suite to put it in context and gain a full understanding. I still have concerns about the general movement of the more significant risks from Private to either Public or Shared. Enough has no doubt been said on that before now".

(1) What were your views on the Risk Allocation Matrix?

The risk allocation matrix, in principle, was a mechanism to allocate the risk to one of three categories; to that end it has some value. It showed that TIE/DLA Piper was seeking to administer and identify risks but did not explain how this process was evaluated nor the criteria used.

I concur with Mr Mackenzie's concerns about the movement of risks "from the Private to the Public or Shared" (CEC01399118).

- 62. An internal Weekly Report dated 28 March 2008 by Steve Reynolds (PBH00036973, para 1.1) noted that "it remains the case that tie has a price on the table which assumes approximately £12m of value engineering improvements will be delivered and a construction programme which does not reflect the design effort required to deliver those improvements. Tie appears comfortable with this state of affairs and has suggested that changes will be instructed on day one of the Infraco contract to address the imbalance. I do not believe the major stakeholders, including CEC are aware of the position and we must ensure that the Novation Agreement is worded such that it protects PB from any accusations of deception which could be levelled at tie in future".
- (1) What was your understanding of, and views on, these matters?

I was not aware that the Value Engineering (VE) at £12m did not "reflect the design effort required to deliver those improvements". I also concur with the sentiment expressed in this document when it states, "I do not believe that the major Stakeholders, including CEC, are aware of the position" (PBH00036973).

63. By e-mail dated 31 March 2008 (CEC01493317), David Leslie, Development Management Manager, Planning, CEC, sent a letter to Willie Gallagher (CEC01493318) expressing certain concerns in relation to prior approvals.

On 3 April 2008 you sent a letter to Willie Gallagher setting out similar concerns by the Transport Department relating to Technical Approvals and Quality Control Issues (CEC01493639).

(1) What was the purpose of these letters?

The purpose was to highlight CEC Roads and Planning concerns to the Chief Executive of TIE, that (1) programmes for consents and approvals were not being met by SDS and (ii) the quality of the submissions were not compliant with the required polices, guides, for example Road Safety Audit, hence only qualified consents and approvals could be given by CEC. Further, that when CEC highlighted issues to SDS, but these same issues are re-issued by SDS "but have not been addressed" (CEC01493639). Also the potential solution of CEC producing a lighting specification appears to be precluded because CEC has no contract with SDS.

As stated by Mr Leslie (CEC01493318) "I hope that this alerts you to my concerns and that we can achieve a speedy resolution". These communications give a very clear and concise illustration that CEC (Roads and Planning) are doing all they could under the circumstance to provide a robust and timely roads and planning consents and approvals service, notwithstanding the SDS submissions issues.

The expectation was that TIE should address the poor delivery of service from SDS (with whom they were contracted) so that the time taken to finalise the designs to IFC could be minimised and potentially mitigate any additional delays or increased and unplanned costs.

(2) To what extent were the letters discussed within CEC before they were sent?

The views expressed in these communications (CEC01493318 and CEC01493639) were agreed in principle within CEC (Roads and Planning) prior to being issued to TIE.

(3) What were the main concerns highlighted in the letters? What, for example, was your understanding of the "difficulties" noted in Mr Leslie's letter that could be created in the coming months "where BBS have been forced to make assumptions in their bid which do not correlate with our own expectations"?

Notwithstanding the poor quality of SDS submissions, the slippage of the programme timescale, did not change the Council's commitment to provide the approvals as quickly as possible, while still executing their statutory process. I do not have a clear recollection about the "difficulties" but these may be about staff resources because of the SDS programme slippages and the potential liability of additional costs to CEC in enacting its statutory role. The assumptions that BBS may have made not align with those of Planning, I request suggest you check this with Mr Leslie.

(4) Were the concerns in the letters ever addressed to your satisfaction?

There were usually some positive responses by SDS following discussions between TIE and SDS/BBS, but my recollection is that while there were some improvements in some cases, the quality was not completely adequate and the time line for design

submissions continued to slipping. Notwithstanding this, the approvals team maintained their vigour in processing the Roads and Planning consents and approvals, as the quality of the design submissions permitted.

64. The Construction Director's Report for the meeting of the Utilities sub-committee on 9 April 2008 (CEC01456414) noted, under Overall Performance to Date, that a total of 10081 metres (against a planned 12112 metres had been undertaken), including 54 chambers (out of 104 planned chambers).

It was noted (page 2) that "there has been no recovery of the previously reported slippage".

Cumulatively, the existing effect was a delay of circa 6 weeks on the affected sections.

The root causes were in 4 main categories: greater congestion of existing utilities than anticipated (principally affecting Scottish Water diversions); increased temporary diversion provision; slower than estimated chamber construction for BT chambers; and incomplete supply of supervisory and operative resource to meet the full demands of the Revision 06 programme and the enabling works (AMIS addressing). "The summary impact on the REV 06 Programme critical path suggests that 2 weeks delay is likely allowing for realistic implementation of the recovery plans to the MUDFA programme".

The Key Issues/Blockers were set out in para 7.0 (pp12-13) (the minutes of the meeting are CEC01301007).

(1) What was your understanding of, and views on, these matters?

I attended the meeting to represent the Council's interests regarding improved reinstatement standards and minimisation the impact of the temporary traffic management arrangements. My understanding of the programme delays was that they were usually reasonable, as working in such complex subsurface conditions were very difficult. The issues are (i) lack of realistic programming (ii) unknown or incorrectly located existing services and (iii) lack of control over third parties (e.g., BT).

(2) What were your views around that time of the prospect of the MUDFA works being completed by the end of 2008?

I had, as an observer, reservations about the completion by the end of 2008, based upon my experience of previous failures to meet programmed timescales.

(3) Was any consideration given to delaying signing the Infraco contract until the design and utilities works were completed or substantially completed? What were your views?

I would have preferred that the MUDFA works was substantially complete prior to letting the Infraco Contract. If my recollection is correct this was discussed, but I recall that TIE advised that the letting of the Infraco Contract could not be delayed? The reasons for this were not transparent to me.

65. An e-mail dated 9 April 2008 from Alan Coyle (CEC01401847) provided a high level break down of the QRA as follows:

Unmitigated delay costs were in the region of £3m per month. The QRA included an

allowance of circa £3m for SDS delay and a further £6m for General programme delay.

The QRA had reduced from £49m at FBC to £32m. The material change in the QRA process related to procurement risks for Tramco and Infraco closed out at the signing of the contracts. The significant changes to the FBC were as follows:

- Reduction of £24m reflecting the removal of major elements of the procurement stage risks in the negotiated base costs.
- Reduction of £3m reflecting the removal of other risk items into the negotiated base costs.
- Increase of £10m to provide for risks and uncertainties to be managed by tie ltd during construction.
- (1) What was your understanding of, and views on, these matters?

I was not involved in the decision to modify the figures nor was my opinion sought.

(2) Did you have any remaining concerns in relation to whether the QRA included sufficient allowance for the risks arising from design and utilities delay, including the effect of any such delays on the Infraco works?

I was pleased that the reduction in the risks had been noted by TIE. However, I had concerns about the occurrence of further design and utility delays and the adequacy of the risk allowances provision for these in the QRA.

66. By e-mail dated 11 April 2008 Colin Mackenzie advised Gill Lindsay of a difficulty that had arisen with the "Russell Road Bridge: Prior Approval" and which raised the question whether the sum allowed in the Quantified Risk Allowance for SDS delay (£3m) was sufficient (CEC01401109). Mr Mackenzie noted, "this is getting very close to calling upon the Monitoring Officer to become involved" (See also Mr Mackenzie's email dated 14 April 2008, CEC01256710).

(1) Although you do not appear to have been copied in on these e-mails, were you aware of the matters discussed in the e-mails? What were your views? Did you share Mr Mackenzie's concerns? What do you understand by Mr Mackenzie's reference to calling upon the Monitoring Officer to become involved?

I was not copied in on the emails, as I believe I was on leave.

I was only aware that there was an issue at Russell Road Bridge on my return from leave. It demonstrated that the Council's earlier concerns that TIE had not closed out all the issues in the contract or QRA.

If my recollection is correct the reference to the Monitoring Officer regards the arrangements to seek an independent view for the Council on specific tram project issues. It sought to raise this matter because the risk allowance stated in the QRA, was in my opinion not adequate to cover the MUDFA and the delay in finalising the designs (IFC). Thus in my viewpoint the Council may have been exposed to liabilities by default of SDS "Council are being backed into a corner as a result of the (SDS)

delay" (CEC01401109 page 1 Alan Coyle).

67. By e-mail dated 14 April 2008 Colin Mackenzie noted his view that it would be "prudent and proper" to report again to members before Financial Close of the Infraco contract was authorised given the various changes which had emerged since December 2007, including "the new final estimate of £508 million; a four month delay to the revenue operating date; and continuing concern over the risks to the Council arising from the SDS programme" (CEC01256710).

The chain includes an e-mail dated 16 April 2008 from Jim Inch to Tom Aitchison which noted "Given Colin's concerns it may be prudent to have a short meeting with Gill to confirm the present direction of travel".

(1) What were your views on the matter raised by Mr Mackenzie?

At the time of reporting of the FBC in December 2007, the Council was led to believe, based on advice from TIE, that all eventualities were adequately covered by the risk allowances in the QRA. However, by April 2008, it was becoming apparent, although not absolutely clear, that following the design freeze, in November 2007, that some liability may now fall to the Council. Consequently Mr Conway and Mr Mackenzie took the correct action in draw to the attention of the Directorate this important and potentially very significant contractual matter. The response from Mr Inch was "prudent to have a short meeting with Gill (with Tom Aitchison) (CEC01256710 page 2). I support that it is "prudent and proper to report again to Members before the Financial Close is authorised" I also appreciate that this is a decision for the Directorate to take.

68. The report provided for the IPG on 16 April 2008 (CEC01246992) attached (as appendix 1) an update of the table, "Critical Contractual Decision to enable Chief Executive to use delegated powers to approve tie to sign the contract with BBS".

Para 7.4 of the table stated, "What design version was the BBS contract priced against and what changes have subsequently taken place", to which there was a response, "Report by TIE on the Infraco Contract states in section 'Design Expectations of the Infraco' that V26 updated from V22 of the SDS design has been used for Price and Programme – Schedule 4 on pricing received from TIE".

We understand that version 26 of the design programme reflected the design available as at November 2007 and that, at the time of Infraco contract close, version 31 of the design programme was in force.

See also, in that regard, an e-mail dated 16 April 2008 from Andy Conway (CEC01247686) which stated, "As a general comment ..., have tie identified costs for all items that will require BBS changes? The scope of works related issues refer to the status of the design as of 25 November. Our concern is that if the design has changed, or at least developed, since then (and say a prior approval has been granted) then a change will need to be issued. Have tie undertaken an exercise to determine the extent and cost of changes that will be required since the design freeze in November?".

(1) What was your understanding at that time, and views on, which party bore the risk for

design development between versions 26 and 31 of the design programme (and, indeed, for any further development of design that was necessary to complete the design)?

I was on leave at this time, however Mr Conway, as noted in the email exchange, was dealing with this matter, in consultation with Mrs Clark and Mr Smith. I concur with Mr Conway's views as expressed in his email to Mrs Clark of 16 April 2008 (CEC01247686).

(2) What was your understanding of the extent to which, if at all, the QRA, or risk allowance, included for all risks to TIE/CEC arising from these matters?

The Council understanding was that the design changes and the modified OLE poles had been included either within in the contract or the QRA, based upon the Council's understanding of advice from TIE.

69. By e-mail dated 30 April 2008 (CEC01246045) Colin Mackenzie expressed concerns about letters from DLA dated 12 March (CEC01347797), 18 March (CEC01347796) and 28 April (CEC01312368), with Risks Matrix (CEC01312367).

By e-mail dated 2 May 2008 (CEC01222037) to Ms Lindsay you asked "Can you advise me on your comfort about the DLA letters (3 number) and whether they go far enough in meeting your expectations on quality and risk to enable you to advise or not Chief Executive and Directors on the contractual position towards agreeing for the documents to be signed".

(1) What were your views on the matters in Mr Mackenzie's e-mail? Did you share his concerns?

Although a legal matter in principle, I support of the views expressed by Mr Mackenzie and shared his concerns (CEC01246045).

(2) What was Ms Lindsay's reponse to your e-mail?

I do not recall getting a response to this email.

70. On 30 April and 1 May 2008 Colin Mackenzie sent e-mails to Gill Lindsay advising of his understanding that BSC had increased their price by a significant amount, there would be further negotiations and members would not be advised of these recent developments when Council considered the report to Council that day (CEC01241689). Mr Mackenzie considered that officers' duty to the Council would be best served by either "pulling the report, assembling the true picture and reporting again to members, or by being open to them about the changed situation".

(1) What was your awareness of, and views on, these matters?

From my perspective this constituted a potential major change to the Tram Project price and hence the advice from Mr Mackenzie had merit, with respect, to pulling the report until the suggested price increased could be clarified and then reported to members had merit. However, clearly this is a matter for the Directorate and Chief Executive to consider and determine.

- 71. The meeting of Council on 1 May 2008 was provided with a report dated 23 April 2008 by Tom Aitchison (CEC00906940). The report sought refreshment of the delegated powers previously given to the Chief Executive to authorise TIE to enter the contracts with the Infraco and Tramco bidders. The report noted:
 - the cost of the project was now £508m (comprising a base cost of £476m and a revised QRA of £32m), which increase was largely due to the firming up of provisional prices to fixed sums, currency fluctuations and the "crystallisation of the risk transfer to the private sector as described in the FBC" (para 3.5).
 - 95% of the combined Tramco and Infraco costs were fixed with the remainder being provisional sums which Tie had confirmed as adequate;
 - "As a result of the overlapping period of design and construction a new risk area has emerged which has been the subject of extensive and difficult negotiation. TIE Ltd advise that the outcome is the best deal that is currently available to themselves and the Council. Both TIE Ltd and the Council have worked and will continue to work diligently to examine and reduce this risk in practical terms" (para 3.10).
- (1) What was your involvement, if any, in drafting that report?

I was not involved in drafting this report.

(2) Are you aware whether members were advised at the meeting on 1 May 2008 of the recent increase in price and, if so, what explanation were they given for that increase? (see, in that regard, pp12/13 of the minutes of the meeting, CEC02083356, which note a "final price" of £508m).

I did not attend the meeting of 1 May 2008; consequently I am not in a position to make comment. The Committee Minutes (CEC02083356) does not indicate that the increase in project price was considered.

(3) What was your understanding at that stage of the risk and liabilities that had been retained by the public sector in relation to design, approvals and consents?

My understanding of the risk and liabilities for design approval and consents reflects the issues highlighted in the B Team Report (CEC01222467: 8.4) and also Mr Conway's email (CEC01247686), that is there may now be some transfer of risk from the private to public sector. Clarification was sought from TIE.

(4) What was your understanding of which party bore the risks arising from design development i.e. from any development of the design between November 2007 and completion of the design?

My understanding of the development of design issue was that CEC could be partially or wholly liable, because according to TIE; this may not now be covered in the QRA and clarification was sought from TIE (CEC01247686).

(5) Did you consider that the risk retained by the public sector in relation to design, approvals

and consents was consistent with the statement that there had been a "crystallisation of the risk transfer to the private sector as described in the FBC?

My recollection is that there was now uncertainty as to this statement "crystallisation of the transfer of the risk transfer to the private sector as described in the FBC" and consequently why clarification was being sought by CEC from TIE.

(6) What was your understanding of (a) the "new risk area" that had emerged as a result of the overlapping period of design and construction, (b) the "outcome" that had been arrived at in respect of that risk and (c) the steps that would be taken by TIE and CEC to reduce the risk?

I do not have a clear recollection, but it may be that the "new area of risk" related to the most recent revised Infraco programme (V26) which indicated that the design approvals and issue of IFC had now the potential to incur delay and thus possible further and additional costs and not be included within the QRA allowances, because the contract may be based upon V22. The position was unclear hence the requirement to seek clarification from TIE.

Mitigation of the risk would require CEC consents and approvals team to prioritise the design submissions and process them timeously, but my recollection is that this was already being done.

72. By e-mail dated 2 May 2008 (CEC01222466) Colin Mackenzie sent Ms Lindsay a report (CEC01222467) prepared by the "B" team "prior to the hiccup on price". The report noted the need to review the risk associated with consents and approvals and whether the present risk allowance of £3.3m was adequate.

(1) What was your awareness of, and views on, that matter?

I was aware of this report by Mr Conway, Mr Coyle and Mr Mackenzie (CEC01222467). The proposal (8.4) for "TIE re-assess risk £3.3m is adequate" was familiar to me as this was consistent with my earlier concerns regarding inadequacy of this risk allowance. Again this matter was unclear and hence TIE was being asked by CEC to clarify the position.

The Closed Report; B Team comments report (CEC01222466) was an important milestone in the tram project and hence it was essential that this information was highlighted and reported to the Directorate (from the perspective of the in-house CEC B team), so as to alert the Directorate to the issues/concerns and thus inform them, albeit taking into account other advice and information, so that they could take the appropriate actions and or decisions.

73. The Construction Director's Report for the meeting of the Utilities sub-committee on 7 May 2008 (CEC01300994) noted, under Overall Performance to Date, that a total of 12421 metres (against a planned 16051metres had been undertaken), including 65 chambers (out of 120 planned chambers). Under Period Progress it was noted (page 2) that there was a downturn in output from the preivous period i.e. 70% achieved in this period and 77% achieved in total to date. The cumulative effect on the sections was approximately 7 weeks. The overall effect on the critical path remained at 2 weeks, "but implementation of revised"

recovery programme actions required urgently". The key areas of delay were as before and additional demands/constraints imposed by Traffic Management. It was noted (page 3) that elements of the city centre works (the Mound area) would extend into the first quarter of 2009 (the minutes of the meeting are CEC01302139).

(1) What were your views on these matters?

I did not attend this meeting, however, Mr T Clark did attend on behalf of the Council with respect to temporary traffic management and reinstatement issues. The outcome of the predicted against actual not being achieved was the norm for this programme, albeit there were reasons provided for the failure to meet the predicted programme.

(2) Did you have any concerns in relation to whether the risk allowance adequately allowed for the risk of the MUDFA works delaying the Infraco works?

I was concerned, because of the MUDFA programme slippage had now a greater potential to impact upon the Infraco Works. I also recall that an unforeseen under ground structure in Princes Street/Mound junction further delayed the MUDFA works at the Mound and that this was compounded by time contingencies already being used up by earlier slippages in the programme. The Council's B Team report (CEC01222467) in section 2.2 and 9.4 highlights these concerns with Proposals and recommended Action for the Council Directorate (incl. Council Solicitor).

(3) Did you have any concerns as to whether the delay in the MUDFA works, and the risks arising therefrom, had been properly and fully reported to members of the Council?

I did recognise this issue was of concern. Referring to document (CEC01222467) under item 2.2 "Risk of delay to Infraco and MUDFA is this adequately taken account of" and 9.4 MUDFA Impact on Infraco requires clarification including 'buy in' from stakeholders was highlighted to the Council Directorate to give them visibility of this to consider including this in a Committee report.

74. On 7 May 2008 Rebecca Andrew sent Gill Lindsay an e-mail (CEC01222074) attaching a draft report by the Chief Executive for the meeting of CEC's Policy and Strategy Committee on 13 May 2008 (CEC01222075).

The report advised of the further increase in cost (from £508m to £517.2m) and sought approval for the Chief Executive to instruct TIE to enter into the relevant contracts.

Gill Lindsay's response the same day noted, "Appropriate forum re Committee choice was discussed today with Council Secretary and Jim Inch. This will likely lead to discussion with Tom" (CEC01248981).

By e-mail dated 8 May 2008 Stan Cunningham, Committee Services Manager, advised Ms Lindsay that the current plan for tabling the report meant that "it may be the first time that many of the members are aware of this matter. This is not satisfactory ..." (CEC01248988).

An e-mail dated 9 May 2010 by you (CEC01351492) noted that you had redrafted the report to include key elements of a document e-mailed by Graeme Bissett on 8 May 2008 (CEC01294645), "Financial Close Process and Record of Recent Events" (CEC01294646)

(the Executive Summary of which had been drafted to facilitate inclusion in the Council's report to the Policy and Strategy Committee).

(1) What were your views on whether it was appropriate that a decision on final approval for the tram project went to the Policy and Strategy Committee rather than a full meeting of the Council (or an alternative committee of the Council, for example, the Tram sub-committee or the Finance or Transport committees)?

I had no input to this decision nor were my views sought, as this is a matter for the Directorate and Chief Executive to determine. Consequently I have no view on this matter.

(2) Do you know why (and by whom) it was decided to put the matter to the Policy and Strategy Committee? Did that cause you any concerns?

The decision to put a Committee papers up to the Policy and Strategy Committee was by the Chief Executive in consultation, I believe, with his Directorate.

75. On 12 May 2008 (at 18.49 hours) Graeme Bissett circulated an e-mail (CEC01338846) attaching a final set of TIE's internal approval documents.

The Financial Close Process and Record of Recent Events dated 12 May 2008 (clean copy, CEC01338847; tracked changes, CEC01338848) noted that a response was received from BBS on 7 May 2008 which proposed a payment of £9m to BBS and "Further examination of the contract terms surrounding the design management process, which although unclear pointed to an extended design and consent programme with potentially material adverse consequences for the construction programme" (p4).

(1) What was your understanding of that matter?

I do not have a full understanding of these matters, as I was not party to the discussions. I would suggest that, from my perspective, and now reading the bullet point literally "although unclear", this could mean that "extended design and consents programme" could have "material adverse consequences for the construction programme". Consequently an appropriate risk allowance was required to cover this potential risk.

76. On 13 May 2008 the Council's Policy and Strategy Committee considered a report by the Council's Chief Executive (CEC01246115).

The report advised that the estimated capital cost for phase 1a was now £512.2 million. The report stated that "Offsetting the increase in cost is a range of negotiated improvements in favour of TIE and the Council in order to reduce the risk of programme delays and minimise exposure to additional cost pressures, as well as better contractual positions".

(1) To what extent were you involved in drafting the report to Committee? To what extent were TIE involved in drafting that report?

The Directorate asked both myself and Ms Andrew to, reconfigure and compress the TIE report (CEC1338848) as a draft Policy and Strategy Committee report. The content of the Committee report was based upon input taken directly from Mr G

CEC1338848 should be CEC01338848 Bissett (TIE) and his report Edinburgh Tram Project Financial Close Process "This document is intended to be objective synopsis of the evolution of the Infraco contract suite negotiations in order to put in one place the key events and to support approval of the final negotiated position" (Page 2)(CEC01294646) and Records of Recent Reviews (CEC1338848). This is the first time that access had been given to the negotiation process by TIE to Ms Andrew and myself. I do not recall if TIE was involved in the drafting of this Committee report. The Committee report, following normal procedures was drafted (i) by Ms Andrew and myself (ii) edited a number of times following comments by the Directorate (iii) approved on the deadline for submission by the Directorate and subsequently passed for signature to the Chief Executive for tabling at the Committee meeting. It should be noted that tabling of papers at Committee was not normal practice (CEC01248988).

CEC1338848 should be CEC01338848

(2) What are your views on the statement noted above?

It was a statement that sought, in a compressed format, to explain that the increased costs were off set against the resultant benefits of lower risks of "programme delays and minimise exposure to additional cost pressures, as well as better contractual positions" and "contract terms to ensure they remain best value and fully aligned with relevant regulations (page 1)" to TIE/CEC based upon the Financial Close document (CEC01338848).

(3) Do you agree with it? If so, what do you consider were the "improvements" and "better contractual positions" that reduced the risk of programme delays and minimised exposure to additional costs?

I agree with the statement to the extent that it was based upon advice from TIE and sought to explain how the negotiated increased price was justified against the reduction of risks to the public sector "Offsetting the increased cost is a range of negotiated improvements in favour of tie and the Council, in the areas of programme delay mitigation, cost exposure capping and more advantageous position" (CEC01338848 page 1) and "The net result is that tie has negotiated a cash and contingency price amendment in favour of exposure elimination which substantially offsets the majority of price amendment." (page 6). I recall that the "improvements" related to the reduced risks and that the "better contractual positions" because the onus was on the contractor to minimise programme delays and thus minimise exposure to additional costs and delays. Also "Tie has recommended that the final terms negotiated represent the best result achievable for the public sector and that the council should authorise tie now to proceed with the contract close" (CEC01338848 page 1).

77. Infraco contract close took place on 14 and 15 May 2008, as part of which a number of contracts were signed, including the Infraco contract (CEC00036952) and novation of the SDS contract to BSC.

I do not recall seeing this Infraco Contract document (CEC00036953) until now, consequently all my comments relate to my views now and not when the contracts were signed (14-15 May 2008).

CEC00036953 should be CEC00036952

In the content of my response to the questions (77.1-6) your attention is drawn to

document (CEC01222467) Report on Terms of Financial Close, which demonstrates my views as Tram Coordinator and in association with Mr Coyle, Ms Andrew (Finance) and Mr Mackenzie and Mr Smith (Legal). This and earlier emails sought to keep the Directorate fully aware of issues, by providing suggested Comments Proposals and Actions with regard to the "Closed Report v 28.04.08". Notwithstanding this I did appreciate the Directorate had access to confidential information and held confidential meetings with TIE, consequently they had a greater overall understanding of the salient issues when reaching their decisions.

By way of overview, what was your understanding of the following matters at contract close:

- (1) The extent to which detailed design was complete (and all necessary statutory approvals and consents had been obtained), the extent to which these matters were outstanding and when the detailed design would be completed (and all approvals and consents obtained)?
 - I believe that the detailed design was only partially complete (80% of the design drawings were 80% complete and reported as 60% complete by SDS). The response of the consents and approvals team to design submissions was all qualified, because the packages were not complete. The completion of the design to IFC was projected on various programmes, but the end date kept slipping, hence the end date for completion of the overall design was uncertain.
- (2) The extent to which utilities diversions were complete, the extent to which these works were outstanding and when these works would be completed?
 - With reference to document CEC01302139 MUDFA Sub Committee Report, I was aware that the works were not complete at the time of reporting (for example Shandwick Place and Princes Street/Mound Junction). The extent of the risk allowance is set out in this report and evaluated within the QRA. The time line for completion related to the various programme completion dates, however, these end dates were revised typically on a monthly basis, hence the end date for completion of MUDFA was uncertain.
- (3) The likely effect on the Infraco works and contract (and the cost of the tram project) if the outstanding design (and approvals and consents) and outstanding utilities diversion works were not completed within the anticipated timescale?

The likely impact on the Infraco contract is considered by the TIE Financial Close report (CEC013388480) with risk contingencies accommodated within the QRA of £32m summarised on page 4 (Noted improved position on the following items: (i) General programme delay £6.6m, (ii) Delay due to design and consents £3.3m, (iii) Contamination risk £3.4m and (iv) Road reinstatement-direct costs £2.0m).

CEC013388480 should be CEC01338848

- (4) The provision made in the risk allowance for the above matters?
 - The QRA had assessed all of the above risks and TIE had determined an appropriate allowance, including £3.3m for Delay due to design and consents and £6.6m for General programme delay (CEC01338847 Page 4).
- (5) To what extent did TIE discuss the above matters with CEC?

It is my understanding that these confidential contractual matters were probably discussed between TIE and the Directorate and the Chief Executive and I believe discussed at the Emergency meeting of the TPB 30 April and subsequently at the TPB 7 May 2008 (CEC01338848 Page 3).

(6) To what extent were CEC able to consider these matters for themselves and to what extent were CEC reliant on information provided by TIE?

CEC were not involved in the Infraco negotiations, consequently my understanding is that CEC had to rely upon advice provided by TIE.

- 78. The pricing provisions of the Infraco contract were set out in Schedule 4 (USB00000032).
- (1) When did you first become aware of Schedule 4?

I had no exposure or access to Schedule 4.

(2) What was your understanding of the extent to which the Construction Works Price of £238,607,664 was a fixed price?

I had no knowledge of the Construction Works Price.

(3) What did you understand to be the main exclusions, provisional sums, assumptions and conditions?

I had no any knowledge of the main exclusion etc.

(4) In what circumstances did you consider that the price was likely to change?

I had no any knowledge of likely price change

- 79. In relation to the Value Engineering deductions shown in Appendix A of Schedule 4 of the Infraco contract (USB00000032):
- (1) What was your understanding of what would happen if the VE savings were not achieved?

I can only assume that this would imply an increase in the budget, if VE savings were not realised.

- (2) What were your views as to whether the VE savings were likely to be achieved?
 - The VE saving assumption had been reduced, however based upon assurances from TIE, these were achievable. The majority of VE savings did not relate to Roads and Bridges (USB00000032 Appendix A). I recall that CEC approvals and consent team were consulted on VE with regard to road and structures (Appendix C items 10,12,13,14 and 15 and Appendix D 3 and 6).
- (3) In the event, were these Value Engineering savings achieved (and, if not, why not)?

I do not recall having the information to know if the Roads and Bridges VE saving were made.

80. Schedule 4 of the Infraco contract (USB00000032) contained a number of Pricing Assumptions.

At the time of Infraco contract close:

- (1) What was your understanding of the purpose and effect of the various Pricing Assumptions in Schedule 4? To what extent had that been discussed with you (or with others in CEC)?
- (2) What did you consider were the main Pricing Assumptions that were likely to change and result in Notified Departures and why?
- (3) Approximately how many Notified Departures did you consider were likely to arise?
- (4) What did you consider to be the likely total value of the Notified Departures?
- (5) To what extent did TIE discuss the above matters with CEC?
 - (1)-(5) I do not recall having access to Schedule 4, and therefore I cannot comment.
- 81. Pricing Assumption 3.4 of Schedule 4 (USB00000032) dealt with design development.
- (1) What was your understanding of the meaning of that Pricing Assumption, including which party bore the risk that design development would result in a contract change?

I do not recall having access to Schedule 4 and therefore I cannot comment.

82. Schedule 4 defined the "Base Date Design Information" as "the design information drawings issued to Infraco up to and including 25th November 2007 listed in Appendix H to this Schedule Part 4".

Appendix H of Schedule 4, however, did not list any drawings and, instead, simply stated that the BDDI was "All of the Drawings available to Infraco up to and including 25th November 2007".

- (1) Are you aware why Appendix H of Schedule 4 did not list the drawings comprising the BDDI?
- (2) Did that cause any problems at a later stage (and, if so, what problems arose and how were they resolved)?
 - (1)-(2) I do not recall having access to Schedule 4 including Appendix H and therefore cannot comment.
- 83. At Infraco contract close the SDS contract was novated from TIE to BSC.

(1) What was your understanding in relation to who would be responsible for managing the design process after novation and for ensuring that all outstanding design and all outstanding statutory approvals and consents were completed/obtained on time?

BSC managed the design process from initial design through to issue of IFCs with SDS (PB) carrying out the design work and TIE project managing, this progress included responsibility for gaining consents and approvals from CEC through TIE's Novation contract with BSC. The CEC consents and approvals team were requested to process the design submissions within an 8-week period.

(2) What responsibility and powers, if any, did TIE have after novation in relation to managing the design process and ensuring that all outstanding design (and all outstanding statutory approvals and consents) was completed/obtained on time?

I assume (N.B. I do not recall having seen this contract until now) that under the terms of the novation contract between BSC and TIE, that TIE was responsible for project managing this contract.

- (3) Do you consider that any problems arose from the fact that (i) changes to, and completion of, design was primarily under the control of BSC (as a result of novation of the SDS contract to BSC) but (ii) changes to design, or delay in completing design, could give rise to a departure from one of the Pricing Assumptions in Schedule 4 of the Infraco contract and, therefore, give rise to a Notified Departure (leading to an increase in the cost of the project)? Was any consideration given by CEC or TIE to that potential difficulty prior to SDS Novation?
 - i) SDS were still responsible for producing the design submission package for consent and approval and preparing the IFCs, so I am not aware of any more problems with controlling the design with BSC than with SDS. I should explain that I was seconded, from September 2009 until November 2011, to TIE, hence my comments only relate to the period prior to September 2009.
 - ii) I do not recall having any knowledge of Schedule 4 and hence I cannot make further comment. I can only recall that TIE advised CEC of the benefits of novation of SDS to BBS and I cannot recall TIE advising CEC of any potential difficulties.

2008 (JUNE TO DECEMBER)

84. In July 2008 a Peer Review (led by Malcolm Hutchison) was carried out (CEC01327777).

The report noted, under MUDFA Lessons Learned, that "The fact that the completion date remains uncertain (works 60% complete) will have an increasing impact on the Infraco works".

The report noted, under Contract Issues, "It is unclear to the review team where risk lies for design development. BBS and tie in interview considered risk lay with the other party".

(1) Were you aware of that review?

I was aware that the review was being carried out, but I cannot recall being involved.

(2) What were your views on the matters noted above?

The partial state of completion of the MUDFA works was well documented and where this overlapped with Infraco works there was going to have some impact, but any costs were assumed by CEC to be included in the QRA (based upon advice from TIE). I do not recall having visibility of this document (CEC01327777).

85. Following contract close, a major dispute arose between TIE and BSC in relation to the interpretation and application of the Infraco contract (including Schedule 4) and claims made by BSC in respect of alleged changes to the contract.

We understand, for example, that, in total, approximately 738 INTCs were notified by BSC between Infraco contract close and Mar Hall in March 2011.

By way of overview:

(1) When (and how) did you first become aware of the dispute (see, for example, your e-mail dated 28 August 2008 to Colin Mackenzie, CEC01057495)?

My awareness was through discussions with TIE on the 28 August 2008.

(2) What did you understand to be the main matters in dispute? What was your understanding of the main reasons for the dispute?

I did not recall having exposure to this contractual information; therefore I did not have an understanding of the issues.

(3) Were you surprised by the number of INTCs?

I was not surprised that disputes would arise, however, I believed that when I became aware of the financial scale of the disputes and the potential liability to the Council that it would be prudent for CEC to consider how to protect its best interests. Consequently I sought guidance and direction from the Head of Transport (CEC01057495).

(4) What do you consider were the main INTCs in terms of value and importance?

I did not have a detailed knowledge of the disputes only an indication of the potential and indicative financial quantum of the disputes.

(5) To what extent were CEC aware of the risk of such claims arising prior to contract close? To what extent did TIE (or DLA) discuss that risk with CEC prior to Infraco contract close?

Tie's advice to CEC appeared to be that that the QRA had covered all the risks. However, in a contract of this scale and complexity the potential for disputes could be expected. I refer to document CEC01222467, which made comment, by others, and myself on the Terms of the Financial Close.

86. An e-mail dated 9 September 2008 by TIE (CEC01165569) circulated a letter consulting

on new Traffic Regulation Order (TRO) measures (CEC01165571) that was being sent to 44,887 stakeholders, a note of proposed public meetings (CEC01165572) and a note of top issues from final design meetings (CEC01165570).

See also, a Briefing Note dated 25 March 2009 by Keith Rimmer (TIE00695896) which noted that between spring 2007 and summer 2008 the Roads Design/TRO design completion and the end date for the statutory process slipped by over 1 year.

(1) It would be helpful if you could explain, in general terms, (i) the procedure and timescales for obtaining a TRO (including the consultation requirements) and (ii) and the relationship between the roads design and a TRO (e.g. can roads design not be finalised until a TRO is obtained)?

TRO Process & Timeline (23 Sept – 16 October 2008) and (9 February 2010- October 2010)

- (i) Draft TRO Public Exhibitions 23 Sept -16 Oct 2008
- (ii) Prepare TRO drawings, Statement of Case and TRO schedules based upon the detailed designs
- (iii) Public Exhibition (3 weeks) weeks because of extensive area affected by TROs)
- (iv) Statutory Bodies consultation (2 weeks) (Police Road Haulage Fire & Rescue etc.)
- (v) Modify TRO drawings (BSC) and schedules (if required)
- (vi) Advertising of the Order and Place TRO on public deposit (3 weeks))
- (vii) Review of Objections (for tram this could be 4-6 weeks)
- (viii) Reporting to Committee 6-8 weeks lead time to allow for preparing the report and the lead time into the committee agenda)
- (ix) Making the Order (4-6 weeks)

NB A change to the TRO legislation, as noted below, dispensed with the provision of a Hearing, although previously an allowance had been made in the QRA for a Hearing.

The provisional requirement for a Public Hearing to consider the objections was not required following an amendment to the Local authorities Traffic Order (Procedure)(Scotland) Regulation 1999, which allows a Council discretion to dispense with a public Hearing in circumstances where a project has previously been subject to a full Parliamentary scrutiny and subsequently been approved by the Scottish Parliament.

The purpose of the Public Exhibition was two fold, one to explain to the public how the tram will be integrated with the existing Roads and informally seek potential objections to the draft TROs. This provided early feedback from the public. Any omissions or additions to the proposed orders were then determined by CEC so that SDS could then make timeous modifications to the design drawings and also the TRO drawings. I recall that the out come of this early consultation exercise (Sept/Oct 2008) meant that there were only relatively minor modifications required to the design drawings, following the formal consideration of objections by CEC in October 2010.

The TRO drawings and schedules required substantially complete design drawings so that the schedule (e.g. length of yellow line etc.) can be determined for length and location. The finished design required to show the road marking and signs including all the TROs yellow or red lines and signs so that these can be marked and delineated or located on the Road in accordance with the approved or Made TROs.

The TRO scheduling and drawings required substantially completed detailed designs so that the details of the restriction, parking restrictions (pay bays, disabled bays, parking permits etc.) can be scheduled. Consequently, the TROs are dependant upon substantial completion of the design, but the TROs do not significantly effect the design other than minor modifications, if the Council chooses to modify the proposals to accommodate public objections. The tram public consultation and Exhibition (2008) assist in highlighting TRO issues that required amendment or modification, at an early in the design process, hence the design team required relatively few changes after formal public consultation in 2010.

(2) In relation to the tram project, what TROs required to be obtained? What was the original timescale for obtaining the TROs? When were all TROs actually obtained? What were the main reasons for that delay? What effect, if any, did that have in finalising the roads design? What effect, if any, did that have in carrying out the Infraco works?

Original time line for the TROs was spring 2007, based upon original design completion time line. In the event the TROs were Made in autumn 2011. The delay was primarily caused by the delay in substantial completion of the detailed design, and thus was not caused by the TROs programme.

The effect on the detailed Roads/tram design was as per the normal statutory sequence of events for TROs with detailed design drawings being modified following the various consultation stages and when final orders are Made. Following the early public consultation in 2008, there were relatively few modifications required to the final TRO drawings.

Traffic Regulations Order stages requiring modifications to the detailed drawings: (i) modification to accommodate Statutory Consultees, (ii) modifications following the public exhibitions (2008) (iii) very minor modifications after the review of objections by the Council. The lining and signing schedules were incorporated within the Infraco works and followed the normal course of events.

I am not aware of any delay being incurred by the Infraco contractor during the works, however I can only comment up to November 2011.

(3) To what extent, if at all, did the delay in obtaining TROs result in increased cost and/or delay to the tram project??

There was a delay, due to late delivery of the detailed designs, in the TROs, but once the designs were substantially completed the TRO programme proceeded as per the revised programme. I am not aware of any reasonable delays to the Tram works and I can confirm that the TRO were Made in adequate time for the Tram to operate.

87. A Period Report by BSC for the period to 13 September 2008 (CEC01154352) noted (page 15, para 4.2.1.2) under Prior Approvals, that "BSC is continuing to inform tie of the delays or potential delays regarding prior and technical approvals due to numerous design canges from CEC during the formal consultation stage. It is of great conern that after the extended period of informal consultation new ocmments are received at this stage which will, in many cases impact on the IFC dates and will require change instructions to be issued for the design to be amended. The informal consultation process, intended to avoid this problem, cannot be considered successful" and, under Technical Approvals (Roads), "... As noted above, the number of comments from CEC in their formal responses is a real problem e.g.: 1C1 and 1C3 (minus 1C2) had 1200+ comemnts (70 pages of comments) after an extended opportunity to jointly particulate in design development" (similar concerns were expressed in the Progress Report to 8 November 2008, CEC01169379, section 4).

See also, the matters noted in the minutes of a BSC/SDS Design Assurance meeting on 16 September 2008 (TIE00500425).

(1) What were your views on these matters?

BSC made statement such as "potential delays regarding prior and technical approvals due to numerous design changes from CEC". I believe that this was CEC carrying its statutory duty, compliance with Standards, and that the time taken reflected the inadequacies of some of the design submissions. Additionally subsequent design re-submission frequently required repetition of some of the same modifications as previously highlighted in the consents and approvals response from CEC. Hence I would argue this is not a delay but rather the time required to be taken to achieve the appropriate compliance with the consents and approvals statutory process. The ultimate effective integration of the tram infrastructure into the urban environment, I suggest, demonstrates that this statutory process was both necessary and effective.

Detailed checks and subsequent comments were made, albeit on the piece meal delivery of tram design drawings and partial packages, as they were submitted to CEC. Further comments were made by CEC to take account of new submissions that resulted in further issues that required being resolved. Consequently these were typically not additional design changes, but further comments based upon new design issued in the next design submission(s). Further submissions were often only partial submissions and often previously noted comments had not been taken into account and had to be commented on again. Consequently further comments on the next phase of the design drawing submissions were required, when additional information on separate elements such as signs, traffic signals, etc. were provided but conflicted with the previous submission. These further comments were reasonable and arguable assisted SDS in ultimately achieving the final construction process (IFC). Therefore the time taken to gain approval is the time taken, subject to the quality and completeness of the package when submitted, so to my mind this is not the cause of design delay but rather the effect. Also, subsequent submissions may require earlier "approved in principle" drawings to be further modified to take account of clarifications provide or the impact of new elements in drawings and the interrelationship between drawings on the ones previously submitted.

Collectively, all parties were concerned with the longer time it took than programmed to achieve the IFC stage. My understanding is that BSC were in the best position to

influence this, while TIE, with whom the contract was made with BSC and then BBS, were best placed to manage and apply contractual conditions so to improve the level of quality and completeness of packages for submissions. CEC role was to review the submissions and to provide informed and comprehensive comments back to the designers to provide the necessary information to allow the designer to either provide additional information or modify the drawings to achieve compliance with the consent or approval process. This is a process familiar to the Council, but was more complex because the contractual client was TIE rather than, as normal, CEC. I also believe that adequate resources, including experienced staff, were made available by CEC to review the submissions, even though SDS frequently did not meet the planned programme for design submissions.

What is noted above does not constitute a design change, in my opinion. Design changes were where the Council chose to instruct changes for reasons other than for approvals and consents, while modification to the drawings to complying with the approvals and consents process was part of the contracted statutory process. Following the Charettes for example, there were some design changes proposed by CEC. For example, the tram stop at Haymarket was integrated with the future link with the railway station. In such circumstances BBS have a case that these constituted design changes for which they may be eligible for additional fees, but the scale of this was small relative to the overall Tram project. The major impact of the Charettes proposals was the improved integration of the interchange at Picardy Place, however this was not built.

- 88. An e-mail dated 11 December 2008 by Damian Sharp (TIE00248531) noted that he chaired an Approvals Task Force, that the Design meeting required to be recast with a remit to resolve design issues holding up construction and that, since the SDS novation, "we haven't had a good grip on design production versues programme".
- (1) What were your views on these matters?

The issues identified in the paper (TIE00248531) predominantly relate to contractual issues, in which CEC did not have a role. It is interesting that some good progress was being made. However, the approval task force did not work well, because for example of "commercial issues", as noted by TIE (TIE00248531 para. 3).

(2) Why was design still incomplete (and approvals and consents still outstanding)? What were the main problems and/or problem areas?

Please refer to my answer in 87.

2009

89. A dispute arose in relation to the Princes Street works due to start in February 2009.

After discussions and correspondence over a number of weeks, the dispute was resolved by parties entering into the Princes Street Agreement (CEC00302099) (we understand that an initial draft of the agreement was agreed on 20 March 2009, to allow work to commence on 23 March, and that the final version of the agreement was signed on 30 May 2009).

(1) When (and how) did you first become aware that there was a dispute in relation to the works at Princes Street?

I do not recall seeing this document (CEC00302099) before.

I was first involved when Princes Streets' site soil bearing capacity site investigation demonstrated at the excavation stage that ground conditions at formation level (interface between natural ground and road construction) were unsuitable to carry the superimposed traffic load, at a number of locations. This had not been anticipated, based upon the pre-construction site investigation information and analysis. The investigation method of using a Light Weight Deflectometer (LWD) to measure bearing capacity in a cored out sections of the road construction appeared to have given some erroneous bearing capacity results at the formation level.

(2) What was your understanding of the basis, and underlying cause(s), of the Princes Street dispute?

I understand the dispute had additional issues (other than noted in 89.1), but CEC had no formal role with regard to site supervision. My brief review of the document seems to indicate that this was more about the extent of liability for the formation, under the terms of contract. The hatched area on the drawing on page 9 (CEC00949148) appears to indicate a hatched area that BBS claims was not their liability.

CEC00949148 should be CEC00302099

(3) What was your understanding of why BSC refused to start work on Princes Street?

I was not involved in this matter. Normally when disputes arise records can be taken (daywork sheets: recording plant labour and materials) so that works can progress and these claims can be evaluated subsequently either based on existing rates or some revised rate.

(4) Are you aware why was it agreed that BSC would carry out the Princes Works at demonstrable cost (plus overhead and profit percentages etc)?

I was not involved in this matter. I did appreciate the need for the works to be completed or terminated in time for the Council's Christmas embargo (to facilitate safe access by the public during the Christmas period) of civil engineering works and perhaps this has a bearing on this situation.

(5) What were your views on that agreement? Did you consider that that was likely to result in the cost of the Princes Street works being greater than the sum allowed for these works in the Infraco contract?

I have no further comments on this matter because I was not involved.

90. We understand that discussions took place between TIE and BSC in the second half of 2009 to explore the possibility of using the Princes Street Supplementary Agreement as the basis of a new, or supplementary, agreement in respect of the remainer of the on-street works.

(1) To what extent, if at all, were you aware of, or involved in, these discussions?

- (2) What were your views on the proposal that a new agreement, based on the Princes Street Agreement, be entered into for the remainder of the on-street works?
 - (1)-(2) I did not recall have access to or an understanding of the contractual documents, hence I cannot advise you on this matter.
- 91. We understand that you were seconded to TIE around the summer of 2009 as Roads and TRO Manager.
- (1) It would be helpful if you would clarify when and why you were seconded to TIE, your duties and responsibilities and when and why that secondment ceased?

I was approached by the Director of City Development following discussions and offered a secondment to TIE. The Director and TIE considered that my Roads and urban design expertise and specialist knowledge of the TRO process provided the necessary experience that TIE required but did not have. My duties were to advise on Roads design and construction issues and deliver the TRO programme through to Making the Orders. My secondment ceased on my retirement from the Council in November 2011. In this role I reported to Mrs Susan Clark of TIE.

- 92. By e-mail dated 17 June 2009 (CEC00949148) you noted that a significant proportion of the MUDFA works did not have QMS records.
- (1) It would be helpful if you could explain that issue and how it was resolved?

I had been approached, in my new role, by Sheena Smith to provide some advice to assist her resolve this matter. Consequently I wrote to Dennis Murray, who was best placed, within TIE, to resolve this matter with the parties. Having flagged up this issue I had no further involvement in this matter.

2010

93. By joint report to Council on 14 October 2010 (CEC02083124) Donald McGougan and David Anderson provided a refreshed Business Case for the tram project, focussing on a line from Edinburgh Airport to St Andrew Square, with a high degree of certainty of cost and programme certainty.

The contingency planning work undertaken by the Council and TIE had identified funding options which could address project costs of up to £600m; "Due to the current uncertainty of contractual negotiations, it is not possible to provide an update at this time on the ultimate capital costs of the project" (para 3.1).

It was noted that "The overall outcome of the DRPs, in terms of legal principles, remains finely balanced and subject to debate between the parties" (para 2.50).

- (1) Did you have any any input into drafting that report?
- (2) What were your views on the matters noted above?

- (1)-(2) I was not involved in this matter, as I was working with TIE as Roads and TRO Manager from September 2009
- 94. On 16 December 2010 Tom Aitchison provided the Council with an update on the refreshed Business Case (CEC01891570).

The report noted that a line from the Airport to St Andrew Square was capable of being delivered within the current funding commitment of £545m.

At the meeting an amendment was passed by members to request a review of the business case by a specialist public transport consultancy that had no previous involvement with the Edinburgh tram project (see Minutes, CEC02083128, p22).

- (1) Did you have any input into drafting the report to Council?
- (2) Did you have any views at that stage as to whether a line from the Airport to St Andrew Square was capable of being delivered within the funding commitment of £545m?
- (3) Are you aware why members requested an independent review by a specialist consultancy with no previous involvement with the tram project?
 - (1)-(3) I was not involved in this matter, as I was seconded to TIE as the Roads and TRO Manager, and did not have access to information on which to form a view.

2011

95. Mediation talks took place at Mar Hall between 8 and 12 March 2011. TIE prepared a mediation statement (BFB00053300) as did BSC (CEC01927734).

Sue Bruce delivered an opening statement on behalf of CEC (CEC02084575) and Richard Walker delivered an opening statement on behalf of BSC (TIE00670846).

We understand that a statement "ETN Mediation – Without Prejudice – Mar Hall Agreed Key Points of Principle" was signed by the parties on 10 March 2011 (the principles of which were then incorporated into a Heads of Terms document (CEC02084685).

- (1) Were you present at the mediation (and, if so, what was your role)?
- (2) If you were present, what discussion and negotiation took place that week?
- (3) What were your views on the outcome of the mediation? Do you consider that the outcome was reasonable? Do you consider that it represented best value for money for the Council?
 - (1)-(3) I was not involved in with the Mediation process

96. On 30 June 2011 the Council were advised of the options for the tram project in a report by the Director of City Development (CEC02044271).

It was recommended that the Council complete the line from the Airport to St Andrew

Square/York Place, at an estimated cost of between £725m and £773m, depending on the risk allowance.

Around that time McGrigors, Solicitors, produced a draft "Report on Certain Issues Concerning Edinburgh Tram Project — Options to York Place" (CEC01942218) to (CEC01942225) and Atkins produced a short "Independent Review" report to "validate the processes and procedures carried out in the McGrigors reports ... and to give a sense check on the figures taken forward to the Budget Analysis spread sheet produced by [CEC]" (CEC02085600) (see also, Atkins' final report on the "Edinburgh Tram — Business Case Audit" produced in July 2011, (CEC01914308).

(1) Did you see any of these reports and, if so, what were your views?

I was not involved in this matter and did not see the reports.

97. On 25 August 2011 the Council were given a further update by way of a report by the Director of City Development (TRS00011725).

The report noted that Faithful and Gould had worked with Council officers in validating the base budget for the proposed works..

There was a requirement for funding of up to £776m for a line from St Andrew Square/York Place (comprising a base budget allowance of £742m plus a provision for risk and contingency of £34m).

Additional funding of £231 was required, which would require to be met from Prudential borrowing, at an estimated annual revenue charge of £15.3m over 30 years (which, applying a discount rate, resulted in a present day value of the additional borrowing of £291m).

At the Council meeting, members voted in favour of an amendment that a line should be built from the Airport to Haymarket.

The Faithful and Gould report dated 19 August, on the Post Settlement Agreement Budget, is CEC02083979.

(1) Again, did you see these reports and, if so, what were your views?

I was not involved in this matter and I do not recall seeing these reports

- 98. On 15 September 2011 a full and final Settlement Agreement (BFB00005464) was entered into between TIE, CEC and the consortium.
- (1) Were you involved in, or aware of, the Settlement Agreement? If so, what were your views on the agreement? Did you consider it to be reasonable? Did you consider that it represented best value for money?

I was not involved in this matter and consequently I do not have a view.

99. We understand that following the Settlement Agreement the line from the Airport to York Place was completed within the revised programme and budget with very few, if any, formal disputes arising.

(1) Do you have views on why, following the Settlement Agreement, the line to York Place was completed within the revised programme and budget?

I was not involved in this matter and consequently I do not have a view.

PROJECT MANAGEMENT, GOVERNANCE AND CONTRACTORS

100. In relation to TIE:

(1) Which body or organisation do you consider was ultimately responsible for ensuring that the contracts and works were properly managed, including the interface between the different contracts and works?

TIE was in contract with the parties hence, I believe, their role and responsible was to manage the contracts and the interface between the contracts and works.

However, CEC as Employer may have had some role with regard to overview of the TIE to ensure that they were complying with their responsibilities under their contract with CEC.

(2) Did you have any concerns at any stage in relation to TIE's project management of the tram project or the performance of any of TIE's senior personnel or Board members?

TIE's staff worked strenuously in its demanding Project Management role on the Tram project. I did not have any concerns about TIE's senior personnel with whom I engaged. I had very little engagement with the tram Board members, even though I did attend some of the meetings in a non-executory role.

(3) Did you have any concerns at any stage in relation to TIE's reporting to CEC (or others)? If so, what were these concerns and what was done to try address them?

My limited access to the full picture limited my understanding of issues and outcomes. Emails and reports were made that highlighted relevant issues to the Council Directorate (e.g. CEC01222467).

(4) Are you aware of there having been any tensions between TIE and CEC (and, if so, what do you think were the underlying reasons for that - see, for example, e-mail exchange involving Colin Mackenzie and TIE in September 2007, CEC01667399)?

I was informally aware of this matter, "settlement of claims by SDS" (CEC01667399 0003), and discussed this with Ms Andrew, as this was financial matter. I asked her to send the email to Susan Clark addressing the key issues, following discussion with her Director. I was not aware of the subsequent correspondence trail. This email highlighted the possibility that TIE may not have appreciated the limits of their delegated powers.

101. In relation to CEC:

(1) How were important matters relating to the tram project reported by TIE to CEC

(including by whom and to whom)?

Important matters were related through the Chief Executive and/or Council Directorate (usually City Development, Finance and Council Solicitor). Additionally selected Councillors were members of the Tram Project Board, where important matters were table and discussed. In my Tram Co-ordination role, I sent communications to the Directorate, highlighting issuing for their consideration, usually in consultation with my colleagues (B Team) in Finance and Legal.

(2) How were the views and requirements of CEC fed back to TIE?

In a similar way as noted in 101.1.

(3) In general, how were members (including the Council Leader, the Finance and Transport Convenors, Group Leaders and individual members) advised of developments in relation to the tram project?

To my limited knowledge they were informed through the Councillors on the Tram Project Board and through Committee reports.

(4) To what extent did the need for commercial confidentiality conflict with the need to keep members informed of matters relating to the tram project? What steps were taken to address that conflict? Were these steps successful?

Commercial confidentiality was a significant matter and one that was managed by limiting access of information. I cannot comment as to how this was managed with regard to members, as I was not involved in advising members, this was a matter for the Directorate.

(5) Did you have any concerns, at any stage, in relation to whether matters relating to the tram project (including, in particular, in relation to price and risk) had been properly and fully reported to members? Do you consider that members were in a position to take properly informed decisions in relation to the tram project (and, if not, why not)?

I was not typically in a position to take a view on this as the Directorate was involved with members and I was unaware of what they advised members other than the information provided in Committee reports.

I did have concerns about the level provision of the design risk allowance and I was disappointed when the level of this in the QRA was significantly reduced in the Committee Report on 20 December 2007(CEC01384000). However, as I did not have the full picture, that there may have been good reasons for this, but I was not advised of them.

(6) Did you have any concerns at any stage in relation to the performance of senior CEC officials or members?

My role as Tram Coordinator was to keep the Directorate informed as to matters within my knowledge. The Directorate always acted in professional manner towards me.

(7) Which officer (or officers) in CEC do you consider was ultimately responsible for ensuring that the tram project was delivered on time and within budget?

I am not well placed to take a view on this matter. The ultimate responsibility may have been with the Chief Executive, however, he might have delegated these responsibilities to his Directorate.

- 102. In relation to the Tram Project Board (TPB):
- (1) How were important matters relating to the tram project reported by TIE to the TPB (including by whom and to whom)?

This was primarily done through papers to the Board, and also some private briefings.

(2) How were the views and requirements of the TPB fed back to TIE?

Through the Board members and internal briefings by TIE's management team.

(3) Did you have any concerns at any stage in relation to the performance of the TPB or any members of the TPB?

As I did not have full access to the private and confidential information, it was not possible for me to make an informed view on this matter.

103. In relation to TEL:

- (1) How were important matters relating to the tram project reported by TIE to TEL (including by whom and to whom)?
- (2) How were the views and requirements of TEL fed back to TIE?
- (3) Did you have any concerns at any stage in relation to the performance of TEL or any members of TEL?
 - (1)-(3) I had very limited dealings with TEL, but they were always very helpful and professional towards me.
- 104. In relation to the Scottish Government (SG) and Transport Scotland (TS):
- (1) How were important matters relating to the tram project reported by TIE to SG/TS (including by whom and to whom)?

Monthly reports were filed by TIE/CEC to TS even though they withdrew from the Tram Project Board (December 2007).

(2) How were the views and requirements of SG/TS fed back to TIE?

The formal channels of communications.

(3) Did you have any concerns at any stage in relation to the performance of SG/TS or any ministers or senior officials?

I had no exposure to meetings with senior members of TS or SG Ministers

(4) What were your views on the decision taken around July 2007 that TS should play a lesser role in the governance of the project?

I was surprised that SG/TS played a lesser role after December 2007, as they has a continuing interest in their £500m investment in the project. From my experience from working with the Scottish Government Civil Servants, their input to the TPB on such a major project could have drawn on their knowledge and experience of major infrastructure projects and given them the chance to provide advice raised questions or challenged opinions.

105. In relation to the inter-action between the different bodies and organisations involved in the project management and governance of the tram project:

(1) How were important matters relating to the tram project reported between these different bodies and how, and by whom, were decisions taken in relation to these matters?

The Governance for the Tram project was very complex. Communication with different parties depended upon their role and responsibilities as set out in the Governance Arrangements (CEC01566500-0001). The requirement for confidentiality resulted in my having a very limited engagement with some organisations.

(2) What were your views in relation to the governance arrangements for the tram project including, in particular, the effectiveness of the governance arrangements (see, for example, a diagram showing the governance structure in 2007, CEC01566500)?

Roles and responsibilities and accountability were at times difficult to comprehend under the complex Governance arrangements. For example the Council was providing a statutory service to a design services company (such as SDS) but the Council did not have a contract, as this was with the Council's arms length company (TIE). This made communication and determination of authority and responsibilities very difficult to fully understand and at time challenging.

Personally it appeared to me that from time to time TIE had a slightly different understanding of Governance and their relationship with CEC (refer to CEC01667399) than CEC had as client. The arrangements for relationships with regard Governance were complex as illustrated by the Governance Arrangements (CEC01566500-0001).

(3) Did you have any concerns at any stage in relation to the governance arrangements?

As noted above this was a complex process and combined with changes to the Tram Organisational structure this made matters at times confusing and challenging to fully understand.

(4) Which body or organisation do you consider was ultimately responsible for ensuring that

the tram project was delivered on time and within budget?

Within my simplistic understanding of Governance arrangements TIE was the arms length delivery vehicle and was responsible for delivering the tram project to time and budget, until TIE's role ceased. The Council then became directly and contractually responsible with its Project Management partner (Turner & Townsend) for delivery of the Tram project.

106. In relation to the main contractors involved in the tram project:

- (1) Did you have any concerns at any stage in relation to the performance of any of the main contractors, or the senior personnel employed by these contractors?
- (2) If so, what were your concerns and what was done to address them?
 - (1)-(2) I was disappointed with the attitude of the main Infraco contractor and especially when they employed the terms of the contact to effectively and progressively stall the works, instead of keeping the project progressing and subsequently negotiating the settlement of disputes.

CONSEQUENCES

107. By way of overview:

(1) What do you consider were the main consequences and effects (on residents, traders, businesses and developers etc) of the delays in completing the tram project?

Poor public impression of the organisations working on the Tram project and disappointment that the tram did not operate over the whole planned route. For example the disruption in putting utility services from Picardy Place to the Docks had no ultimate benefit of an operational tram on this section of the route.

(2) What steps were taken by the Council by way of mitigation?

Improved public relations with supporting staff to liaise with members of the public and better communication with the media. A further improvement was realised.

(3) What do you consider to be the main continuing consequences and effects of the shortened tram line (i.e. on the parts of the city the tram line was due to, but does not, serve)?

This adversely impacted upon the business case, limited the benefits of the tram as there was less of an increase in modal shift from the car to public transport, and less extent of the tram service to the public.

(4) What to you consider are the main continuing consequences of the cost and time overrun of the tram project?

The cost and time overrun resulted in the tram service being opened later and over a more restricted route, to the public, Also a longer period of on-street disruption and a

larger draw down on the public purse than anticipated.

(5) As far as you are aware, were the design and the utilities diversion works between York Place and Newhaven completed to a satisfactory standard (or is any design or utilities work in that section outstanding)?

From my limited knowledge of the utility works (MUDFA) these were substantially completed (according to TIE), but specific work packages, I believe were transferred into the Infraco contract.

FINAL COMMENTS

108. By way of final thoughts:

(1) How did your experience of the Edinburgh Trams Project compare with other projects you have worked on (both previously and subsequently)?

The complexity of engineering a railway (tram) into an existing urban streetscape including a World Heritage Site, while still maintaining the city open for business, was very challenging. The management and operations structure seemed very complex and made effective communication and efficient working challenging.

(2) Do you have any views on what were the main reasons for the failure to deliver the project in the time, within the budget and to the extent projected?

I suspect that the causes for delays and increased cost are multi-factorial.

(3) Do you have any comments, with the benefit of hindsight, on how these failures might have been avoided?

Improved and better-informed decision-making at key stages (with the required time to achieve this) so that unintentional consequences were minimised and the project better controlled. A simpler Governance structure with shorter lines of communication and clearer lines of accountability aligned with the appropriate authority.

(4) Are there any final comments you would like to make that fall within the Inquiry's Terms of Reference and which have not already been covered in your answers to the above questions?

The operation of the tram has been a success as judged by public usage levels exceeding those predicted in the business case. That lessons learned from the Tram Inquiry may ensure that other major projects, including the possible expansion of the Edinburgh Tram, can be delivered on time and on budget.

I confirm that the facts to which I attest in these answers, consisting of this and the preceding 76 pages are within my direct knowledge and are true. Where they are based on information provided to me by others, I confirm that they are true to the best of my knowledge, information and belief.

Witness signature:		
2	JULIE DEMIZ	<u> </u>

Date of signing: 27006 3017

Supplementary Question for Duncan Fraser

Question:

Can you advise the Inquiry as to the identity of the company liaison officer for each of TIE and TEL, at the that time and if the officer changed, the identity of the successors in that role?

Response:

I cannot advise the Inquiry as to the identity of the company liaison officer for either TIE or TEL, either at the noted time of March 2008 or subsequently. Indeed I cannot recall reference being made to the role of company liaison officer while I was working on the Tram Project.

I can advice the Inquiry that Jim Grieve (the suggested name ref: CEC01392168-page 3) was the then Acting Head of Transport, in March 2008, who reported to Andrew Holmes Director of City Development (retired April 2008). Mr Grieve retired after the appointment of Marshall Poulton as Head of Transport, an appointment made by Dave Anderson (appointed April 2008) the then new Director of City Development.