



In association with



KYRGYZDORTTRANSPROJECT



Central Asian Border Crossings

Technical Proposal
Annexes A, B & C



Prepared for

European Commission

February 2001

COPY

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Carla Osório
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels

Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/ MMT/ 003

Date 1 February 2001

Dear Ms Osório

LETTER OF UNDERTAKING: – SCR-E/110622/C/SV/WW

I, the undersigned, being the authorised representative acting for and on behalf of the Consortium of Scott Wilson Kirkpatrick and Compass GmbH, having read and understood the invitation to tender dossier, comprising the terms of reference, the draft contract and all annexes as listed in the invitation to tender, which form part of the terms and conditions of the contract:

- Acknowledge being in possession of the said documents;
- Confirm that the proposal has been drafted according to the guidelines received;
- Undertake to perform the contract in accordance with the terms and conditions of the contract; and
- Will remain bound by the tender submitted for 90 days from the date of deadline submission of tenders.

In the event of the contract being awarded to the consortium formed by Scott Wilson Kirkpatrick and Compass GmbH and led by Scott Wilson Kirkpatrick, it will be signed by:

J L Nutt
Regional Director

The contact person for the project:	Bank details of the company/consortium:
J L Nutt Scott Wilson Kirkpatrick Network House Basing View Basingstoke Hants RG21 4JG Fax: 01256 816835 Email: john.nutt@swkeurope.com	HSBC plc Holborn Circus Branch 31 Holborn London EC1N 2HR Account number: 37126781 Sort Code: 40 03 28

Date:

Name of Company:	Name of Authorised Representative:	Signature:
Scott Wilson Kirkpatrick	J L Nutt	
Compass GmbH	M de Buhr	

Part of the worldwide Scott Wilson consultancy group

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UK Offices: Abingdon, Basildon, Basingstoke, Birmingham, Chesterfield, Crewe, Edinburgh, Glasgow, Inverness, Leeds, London, Manchester, Morley, Nottingham, Peterborough, Plymouth, Swindon, Telford and over 30 offices worldwide



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European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB000SB

Date 30 January 2001

CENTRAL ASIAN BORDER CROSSINGS:- SCR-E/110622/C/SV/WW

I, Geoffrey Redwood, in the capacity of Company Secretary of the firm of consulting engineers Scott Wilson Kirkpatrick and Co Ltd, do solemnly declare and certify that the company I represent:

1. is not bankrupt or being wound up, does not have its affairs administrated by the court, has not entered into an arrangement with its creditors, has not suspended business activities or is not in any analogous situation arising from a similar procedure under national laws or regulations;
2. is not subject of proceedings for a declaration of bankruptcy, for an order for compulsory winding-up or administration by the court or for an arrangement with creditors or of any other similar proceedings under national laws or regulations;
3. has not been convicted of an offence concerning professional conduct by a judgement which has the force of "res judicata";
4. has fulfilled obligations relating to the payment of social security contributions in accordance with the legal provisions of England;
5. has fulfilled its obligations relating to the payment of taxes in accordance with the legal provisions of England.

A handwritten signature in black ink, appearing to read 'G M Redwood'.

G M Redwood

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European Commission
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Rue Montoyer, 31
B-1000 Brussels
Belgium

Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/SWK1

Date 5 February 2001

CENTRAL ASIAN BORDER CROSSINGS – SCR-E/110622/C/SV/WW

Employers Certification of Professional Experience indicated in Curriculum Vitae's

We hereby confirm that Scott Wilson Kirkpatrick & Co Ltd employs the following employees in the capacities shown in the proposal.

Adrian Tite, Geoff Redwood, Martin Oaten, Mark Maunsell-Thomas, Ann Harvey, Achille Calzetti, Peter Webb, Ruth Golombok, Stephen Vincent, Gareth Hearn and David Judge.

We also confirm that their Curriculum Vitae's give full and correct accounts of their professional experience during their employment.

Yours faithfully
for SCOTT WILSON KIRKPATRICK & CO LTD

A handwritten signature in black ink, appearing to read 'G. H. French'.

G H French
Managing Director

Part of the worldwide Scott Wilson consultancy group

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Certificate No. FS 825

«KYRGYZDORTRANSPROJECT»
State Design Institute



Государственный проектный Институт
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Исх. № _____ от « _____ » _____ 2001 г.

Scott Wilson Kirkpatrick and Co. Ltd
Scott House
Basing View
Basingstoke
Hampshire
RG21 4JG

February 5, 2001

Dear Sir/Madam,

We hereby confirm our willingness to join Scott Wilson Kirkpatrick and Co. Ltd for execution on the exclusive basis of the EC TACIS Project, "CENTRAL ASIAN BORDER CROSSINGS" Contract No SCR-E/110622/C/SV/WW (Kyrgyz part of the project).

L.M. Alibegashvili
Director

«KYRGYZDORTRANSPROJECT»
State Design Institute



Государственный проектный Институт
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SCR-E/110622/C/SV/WW

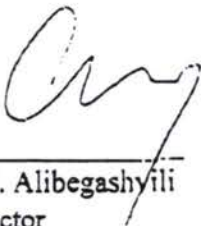
HSMSB000SB

5 February 2001

CENTRAL ASIAN BORDER CROSSINGS:- SCR-E/110622/C/SV/WW

I, Alibegashvili Levan Markovich, in the capacity of director of the firm of "Kyrgyzdortransproject", do solemnly declare and certify that the company I represent:

1. is not bankrupt or being wound up, does not have its affairs administrated by the court, has not entered into an arrangement with its creditors, has not-suspended business activities or is not in any analogous situation arising from a similar procedure under national laws or regulations;
2. is not subject of proceedings for a declaration of bankruptcy, for an order for compulsory winding-up or administration by the court or for an arrangement with creditors or of any other similar proceedings under national laws or regulations;
3. has not been convicted of an offence concerning professional conduct by a judgement which has the force of "res judicata";
4. has fulfilled obligations relating to the payment of social security contributions in accordance with the legal provisions of Kyrgyzstan;
5. has fulfilled its obligations relating to the payment of taxes in accordance with the legal provisions of Kyrgyzstan.



L.M. Alibegashyili
Director



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Annex

A

TERMS OF REFERENCE





EUROPEAN COMMISSION

SCR - Common Service for External Relations
Directorate E - Invitations to tender, contract and legal matters
Procurement of services

Scott Wilson Kirkpatrick & Co Ltd
Attn.: Mr Adrian Tite
Scott House, Basing View
UK - Basingstoke, Hants RG21 4JG

**Invitation to tender issued by the European Commission
for a project financed from Tacis funds**

Project Title : **Central Asian Border Crossings**

Project N°: **SCR-E/110622/C/SV/WW**

The European Commission (Contracting Authority) invites your consortium consisting of Scott Wilson Kirkpatrick & Co Ltd (Lead company) and Compass GmbH, to submit a tender for the above mentioned project according to the enclosed tender dossier.

The following documents are issued to enable you to prepare your tender:

- I. This invitation to Tenderers (including list of firms invited to tender and the detailed evaluation criteria for this tender.)
- II. Instructions to Tenderers (Vers. 1/6/2000).
- III. General Regulations for Tenders and the Award of Service Contracts financed from Tacis Funds (Vers. 6/2000).
- IV. Draft Contract with annexes:
 - Annex A: Terms of Reference.
 - Guidelines: to prepare Annex B (Organisation and Method), Annex C (List of Staff) and Annex D (Breakdown of Prices). (Vers. 01/06/00)
 - Annex E: General Conditions for Service Contracts financed from Phare/Tacis Funds (Vers. 1/97).
 - Annex F: Tax and Customs Arrangements; Model of Bank Guarantee; Reporting

These documents constitute the complete tender dossier.

The short-listed firms or consortia can neither join together nor enter into subcontractual relationships amongst themselves.

The maximum proportion of services rendered by sub-contractor is 30% of the total contractual amount.

Interviews are not envisaged at the evaluations.

The total budget available for this contract amounts to EURO 2,000,000 .

Tenders (Technical proposal: 1 original and 6 copies, Financial proposal: 1 original, 2 copies) must be submitted to the Contracting Authority and must have been received on Tuesday 20 February 2001 at 16:00 hours local time at the latest, at the following address:

Tacis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Fax (+32-2) 548 14 59
(office hours: 8:30 - 18:00)

Your attention is drawn to the fact that pursuant to the General Regulations for Tenders and the Award of Service Contracts financed from Tacis Funds (Article 3) and the Instructions to Tenders (Point H.2.), requests for supplementary information shall be addressed to the Contracting Authority in writing (via Fax N° +32 2 548 14 59) only.

In addition the Contracting Authority draws your attention to Article 8.2 of the General Regulations.

Receipt of this letter should be acknowledged by fax. Please inform us to the aforementioned address within 10 days of receipt whether you intend to submit a tender.

Yours faithfully,

For the Contracting Authority



Carla Osório
Procurement Co-ordinator

Attention : When addressing your offer to the Tacis Procurement Unit please strictly limit yourself to above address.

Avoid to add or to use any other terms (e.g. Commission, European Union, ...). In these cases your offer may be submitted to the wrong place and risks to be delivered at the Procurement Unit after the deadline.

*1-58
C. Osório*



EUROPEAN UNION - TACIS

Technical Assistance to Central Asia- TRACECA

TRADE AND TRANSPORT SECTORS

Terms of Reference

for

**CENTRAL ASIAN ROAD BORDER CROSSING
(incl. ROAD FEASIBILITY STUDY)**

Final Recipient :

**TRACECA Region Cabinet of Ministers,
Ministries of Transport and
Customs Authorities**

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1. BACKGROUND

1.1. Needs of Beneficiary

The beneficiaries of the project are:

- Ministries of Transport of Kazakhstan, Kyrgyzstan
- Customs Authorities of Kazakhstan, Kyrgyzstan, Tajikistan, Turkmenistan and Uzbekistan
- Cabinet of Ministers and Road Department of Uzbekistan

The transport and communications infrastructure in the Central Asian Republics was developed as part of the large, inward looking Soviet transport system. From the standpoint of Central Asia, the system was designed to facilitate relations and domestic trade with the northern and European part of the FSU. Trade links to the South and East were quite minimal, and there were no customs controls at internal border crossings.

TRACECA has already completed projects and plans others to improve this situation. These initiatives include the completed Trade Facilitation project, and two projects for the establishment of an Intergovernmental Joint Committee for the Implementation of the TRACECA Multi-Lateral Agreement (IGC-MLA), and to improve the workings of the TIR system with the International Road Union (IRU).

The Asian Development Bank (ADB) is equally concerned that non-physical barriers to trade, including inefficient customs systems, can stifle regional development. The ADB is presently developing a project for rehabilitation of the Almaty-Bishkek road, which is the busiest interstate road link on the Central Asia section of the TRACECA route. The estimated project cost will be 100 MUSD in Kazakhstan, and 6,3 MUSD in Kyrgyzstan. For this project the ADB is insisting that the infrastructure investment project includes measures to reduce border crossing delays. Cognisant of the work that TRACECA has done in this domain, the ADB has invited TRACECA to participate in the improvement of the border crossing facilities part of their project, and TRACECA has agreed to this. TRACECA grant financing will reduce the loan burdens of the roads rehabilitation project on both countries concerned, and will provide the opportunity to integrate these facilities into a more comprehensive regional movement for trade facilitation improvements. Such integration will be promoted at policy level through the IGC-MLA, as well as "on the ground", through this present project.

The ADB is insisting on signature and implementation of a "Cross Border Agreement", regulating traffic between Kyrgyzstan and Kazakhstan. The Almaty-Bishkek Road Rehabilitation loan disbursement is linked to the CBA. The objectives and terms of the Cross Border agreement are generally compatible with the TRACECA MLA.

It would in fact be technically logical to extend the computerisation of the border crossing procedures as widely as possible. Software systems developed and implemented by certain EU member states, by UNCTAD, and by the IRU all allow integration.

No beneficiary country to date has declared and held to a strong commitment to implement an international off-the-shelf software product for customs system management such as ASYCUDA or SOFLX. Plans for regional integration are still more limited.

Physical infrastructure at the relatively new border crossings is of varied quality. Typically the existing facilities have been adapted from other uses, or hastily constructed. An exception is Uzbekistan, where quite substantial works have been carried out to establish some border posts.

In practice TRACECA road traffic enters Central Asia through the Port of Turkmenbashi. Most traffic is destined for the several economically active and populous cities of Southern Uzbekistan, Bishkek in Kyrgyzstan, and Chimkent, Taras and Almaty in Southern Kazakhstan. Some traffic deviates towards Khojent or Dushanbe in Tajikistan, and Osh in Southern Kyrgyzstan.

The important Central Asian TRACECA road border crossings are the Port of Turkmenbashi, Turkmenistan/Uzbekistan (Charzou), Kazakhstan/Kyrgyzstan, and Kyrgyzstan/ Kazakhstan (Bishkek). An Uzbek/Kyrgyz border crossing close to Osh, and the Uzbek/Tajik border crossing serving Khojent should also be considered, as well as possibly others.

The inclusion by the ADB of the border crossing on the Almaty-Bishkek road highlights the need for improvements at these points as a condition for infrastructure investments to be made. Real improvements achieved by beneficiary states with TRACECA assistance at other border crossings would obviously facilitate further investment. TRACECA participation will furthermore provide the opportunity for designing and specifying the systems to be compatible with a broader regional concept for freight clearance procedures at border crossings, or elsewhere.

With the same objective Uzbekistan plans to upgrade the TRACECA roads on its territory, which will be about 1500 km long ("Uzbek Corridor"). It will include rehabilitation of the existing national roads as well as some new construction. The Uzbek Corridor will connect Uzbekistan to Europe via Kazakhstan in the north-west and Turkmenistan in the south-west and to China and Far East via Kyrgyzstan in the east.

The road network in Uzbekistan comprises about 43,500 km of roads, of which 96 per cent are paved. However, the condition of the roads is far from satisfactory and is deteriorating rapidly. The Road Agency, Uzavtoyol, is responsible for public roads and highways, while Uzavtotrans controls the state-owned entities involved in road transport such as the transport companies. Uzbektranzstroy and Uzvodstroy are state-owned contractors, which carry out the construction work in the transport sector. They all report to the Cabinet of Ministers.

1.2. Problems to be Addressed

Presently delays at border crossings and inland clearance terminals for road freight transporters can be long. Such delays threaten to eliminate the time gains achieved by improved road infrastructure.

Telecommunications links at border crossings are mostly weak, particularly for supporting data interchanges. These impact on the efficiency of all customs procedures and roles.

A lack of equipment and in particular automated data processing equipment both at the border crossings, the inland regional centres, and the central customs agencies, aggravates the problem.

The Government of Uzbekistan intends to upgrade the Uzbek section of the TRACECA corridor route. This is consistent with the objective of the European Bank for Reconstruction and Development (EBRD) in its Strategy for Uzbekistan to develop the transport sector, in recognition of the land locked nature of the Central Asia region and the need to establish efficient trade routes to international markets. In response to The Uzbek Government request, the Bank has agreed to cooperate with the State Road Agency, Uzavtoyol and the Road Board in preparing an investment which will facilitate and support the improvement of the road network in Uzbekistan. A pre-feasibility study has been carried out to identify priority road sections for rehabilitation between Tachkent (Uzbekistan) and Osh (Kyrgyzstan). The Government of Uzbekistan now wishes to appoint Contractors to undertake a feasibility study for the selected road, followed by detailed engineering design and the preparation of tender documents.

1.3. Co-ordination with Other Donors and Other Projects

1.3.1 Other TACIS actions

Several relevant TACIS projects are related to this one, and should be referred to during the course of implementation. For the purposes of preparing technical proposals for this project, essential details are provided hereafter.

'EUROCUSTOMS' TACIS Team (the "Customs 2 Report" Appendix C provides a synopsis of actions under the project). Specialist know-how transfer, in the fields and forms listed below, has comprised the major part of this programme;

- Risk Assessment
- Harmonised System, Tariff and Valuation Methods
- Legislation and Codes
- Dog Training
- Study tours to EU and familiarisation with EU methods

TRACECA Project 'Trade Facilitation'

Several comprehensive technical deliverables were issued:

Computer Systems Report dated November 1996. Recommendations and notes include:

- Reference to a certain previous "ERMIS" Report on computer systems in the CIS, which does not appear to be available.

- Inadequate power and telecommunications systems severely inhibit customs operations and the implementation of automation by computerisation. Radio modems were recommended for data transfers to and from remote locations with poor telecommunications lines
- ASYCUDA and SOFLX are frequently mentioned. ASYCUDA is recommended for implementation (though according to an independent expert's verbal report, at least one EC/Phare well-funded action to promote ASYCUDA has not been successful). SOFLX was seriously considered by authorities in Kyrgyzstan and Turkmenistan, but neither decided to implement. It may be assumed that the implementation of a full national computerised customs system is well beyond the scope of this present project.
- Computers were used by customs services mostly for statistical and word processing.
- The level of computerisation varies quite considerably from country to country
- System architecture should be based on the capital city, then extended to regional and border post level.
- Input to computer systems should be made at the earliest possible stage in processing a consignment
- Input by traders and declarant companies is encouraged
- Within the region, use of standard customs documents is inconsistent
- A National Trade Data Transfer System should be an ultimate goal
- Greater awareness of computerisation should be promoted within customs services

Customs Border Post Report, October 1996;

- Notes that poor office equipment is a constraint on good operating procedures
- Recommends that computers and printers be supplied at all major crossings, and that all officers have basic training and keyboard skills
- Reiterates the problem of basic communications at border crossings, and recommends the installation of satellite phone systems and facsimile machines
- Recommends that all border crossings should be equipped with a stand-by generator
- Recognises the need for control detection and testing equipment, mentioning end-scopes, drug testing kits and Geiger counters, and training in the use and maintenance of such equipment

Trade Documents and Customs Procedures Report recommends use of UN trade documents.

TRACECA Project 'International Road Transport Transit Facilitation'

This project started in the second half of 1999. It will cover training in road freight transport operator licensing and will provide both training and equipment for operation of the TIR system. Beneficiaries are the national road freight transport associations, and the customs committees. The project was proposed by the IRU, and will be run in collaboration with them. This present project must ensure an efficient interface between the TIR/SAFETIR systems, where installed or being installed.

TRACECA Project 'Road Maintenance'

Several IFIs are planning major investments in roads, so the project focus was to sustain existing programmes and to encourage further IFI interest. The project carried out investigation at pre-feasibility level on the impact of new or much improved road. Module E « Pre-feasibility » led to EC National project in Kyrgyzstan for rehabilitation of corridor Uzbekistan-Kyrgyzstan-China.

Uzbekistan Road Sector Development Project - Project Preparation.

This is a pre-feasibility study of the road network in Uzbekistan carried out under EBRD financing to recommend priority developments. The selection of the road rehabilitation covered by these Terms of Reference is based on the conclusions of this study.

1.3.2 Asian Development Bank/European Bank for Reconstruction and Development

As noted in a previous section, this project originates in part from a request by the ADB to TRACECA to participate in the rehabilitation of the Almaty-Bishkek road and by The EBRD to TRACECA to participate in the rehabilitation

of the Tachkent-Osh road. The engagement of TRACECA as a participant in the ADB and EBRD roads rehabilitation projects is defined by these TOR.

EBRD has been working since June 2000 on the Project preparation and will finance within the Bank's Tacis Transport Framework Agreement a pre-feasibility study for the Uzbek road project.

TRACECA has collaborated closely with the two other donors named, particularly on issues of regional trade facilitation. The project Contractor must be expected to liaise with those banks' officers during execution of the project.

2. RATIONALE AND OBJECTIVES

2.1. Overall Objectives

The overall objectives of the project are to improve the conditions for road transport on the most heavily trafficked section of the TRACECA route, in Central Asia, concentrating on the road border crossing facilities and associated inland functions.

For Module B, this will be achieved by the rehabilitation of the "Selected Road(s)", on the basis of the recommendations of the pre-feasibility study. Specifically, the Contractor is required to:

- (i) determine the rehabilitation works needed to extend the useful life of the road for the most economic number of years, taking the existing and forecast traffic loads into account, and
- (ii) prepare detailed engineering designs and tender documents for the rehabilitation and assist The Uzbek Government in the tendering procedures.

2.2. Project Purpose

The project has two Modules :

The first Module (A) is principally for the supply of border crossing equipment, but for completeness and integration, will include necessary design and training components associated with the facilities. For promotion of, and conformity with a harmonious regional transport policy environment, the project will be linked to the IGC-MLA. The project responds to the ADB request participation in the Almaty-Bishkek road rehabilitation. This purpose is enlarged to involve the other Central Asia TRACECA states, in the interests of regional cohesion.

The project is not concerned with physical infrastructure. Equipment is to be installed in existing facilities or new facilities supplied by others. The functionality of the systems may require equipment to be installed at the border crossings, at busy inland terminals, and in the customs services central data-processing facilities. The general recommendations of previous projects were to reduce the number of activities carried out at the border crossings.

The sub-objectives of the project are:

- conceptual design of a flexible, regionally integrated, modular system for eventual full automation of the beneficiary customs services
- schematic and detailed design and specification of pilot modules for implementation within the project
- provision, installation and commissioning of the necessary IT and telecommunications equipment to implement the pilot system
- provision of basic enforcement equipment such as drugs kits and infra-red document control devices
- training, and maintenance of the system

The functions and characteristics of the fully automated systems, as expressed by beneficiaries will include:

- comprehensive and reliable statistical services

- automated issue of documents, general reduction of paper work, and acceleration of all processing
- improved recognition of illicit goods
- improved valuation of goods and revenue collection
- processes to assist in reduction of fraud
- centralised accounting of customs revenues
- support to non-tariff related controls such as licences and quotas
- general management of the customs service
- improved communications links both between customs posts, management services and other organisations such as freight forwarders and customs agents
- general enhancement of the service to clients
- interfaces with other services related to border posts, such as security and immigration control
- data formats clearly defined to allow easy interface with divers external users (eg. Direct Trader Input, or DTI), and for regional interchanges
- full protection from illicit use and access to the system
- low maintenance requirements
- reliable and robust, with technical back-up and protection systems in the case of partial failure
- flexibility in adaptation to possible future changes in legislation, and organisation of the customs service, preferably without the need for intervention by foreign consultants
- evolutive, open and flexible for extension on a modular basis
- maximum clarity of the system design and documentation, to allow easy comprehension and accessibility by local IT specialists
- fully supportive to the implementation of the TRACECA Multi-Lateral Agreement and the ADB Cross Border Agreement

The second Module (B) is the Feasibility Study (including tender documents) for the selected road(s) on the segment Tachkent-Osh .The study will carry out an investigation and design of the upgrading and appropriate pavement strengthening, improvement and rehabilitation works needed to extend the useful life of the road for the most economic number of years, taking the existing and forecast traffic loads into account.

For the road section agreed between EBRD and the Uzbek Governement (segment of the road Tachkent-Osh) it will be required to produce the detailed working project with the scope of work, specification and cost estimates for the construction(+/-5%) including Tender documents.

Surveys and topographic investigations of the road section should be carried out under the technical category required.

Contractor shall carry out :

- Identification of IRR.
- Training of local staff in update survey methods.
- While carrying out investigations and preparing of deliverables required for the project, the appointed Contractor will be required to co-operate closely with local consulting organisations and EBRD.
- economic and technical studies for the remedial measures to be taken and the optimal allocation of the planned investments on the road links ;
- detailed field investigations of soils and materials, of the residual strength of the pavements, of road geometry etc. ;
- surveys of structures including bridges, culverts, retaining walls, erosion protection works etc. ;
- traffic surveys, including traffic counts at several locations and origin-destination surveys;

- detailed engineering design of proposed upgrading, rehabilitation, reinforcement and realignments, in accordance with the preliminary technical and economic indications for the allocation of the loan funds ;
- preparation of drawings, bills of quantities and specifications, for the eventual execution of the works by international competitive bidding ;
- cost estimates (+/- 5%)
- environmental impact assessment ;
- division of the proposed works into appropriate contractual packages and preparation of pre-qualification and bidding documents, in conformity with the procurement procedures of the financial institutions involved.

While carrying out the studies and preparing the deliverables required for the project, the appointed Contractor will be required, in partnership with local design entity, to familiarise them with the methodology of such studies. Specific training components will be foreseen within the project to ensure a maximum practicable degree of know-how transfer.

2.3 Expected Results

The project should:

- reduce delays for traffic at border crossings
- reduce fraud
- reduce the passage of illicit goods
- improve the quality of cross-border trade statistics
- improve the efficiency of customs service operations
- improve awareness of the advantages and limitations of computerisation to customs service operations
- produce an agreement at expert level on regional interfaces for national customs computerised systems
- promote regional trade integration

For the Module B, the assignment is to be carried out in two phases. Phase 1 will comprise the data collection, engineering, economic, environmental and feasibility studies necessary to meet the first objective of defining the rehabilitation works and will be concluded with a Feasibility Report. Phase 2 will comprise the detailed engineering design and preparation of tender documents.

Commencement of Phase 2 will be conditional on acceptance of the recommendations of the Feasibility Report by the Client and the Bank. Should the Contractor wish to use the period between submission and acceptance of the Feasibility Report to carry out any additional survey work necessary for the detailed engineering design, this must be made clear in his Works Programme.

2.4 Contract extension

The European Commission may, at its own discretion, extend the project in duration and/or scope, subject to the availability of funding. Any subsequent extension of the contract would be subject to satisfactory performance by the Contractor. This shall be judged, in particular, in terms of the progress towards the achievement of the project purpose, and the delivery of the anticipated results. The intervention of events outside the Contractor's control shall also be taken into consideration.

3. RISKS AND ASSUMPTIONS

Computerisation and other equipment supplies will not in themselves lead to reduced border crossing delays.

Off-the-shelf customs software systems have a chequered reputation. Risks of such systems are perceived as:

- Lack of training materials, maintenance and consultancy assistance in the Russian or local languages

- Lack of local representation and support
- The daunting scale of the organisational transformations necessary to implement a full national off-the-shelf IT based system
- Lack of flexibility and possibilities for the agencies concerned to adapt the system to their own particular needs

The assumed advantages of such systems are international standardisation, and avoidance of "re-inventing the wheel".

The assumption of this project is that modular systems can be implemented, fully comprehensible and eventually adaptable by the beneficiaries themselves. The modules will be useful in themselves in furthering overall objectives, and be vectors for know-how transfer.

The eventual decisions on national systems in each country based on an off-the-shelf international product, or home grown one, is not crucial to the success of this project. While the project comprises a high content of equipment supply, there is little risk that the customs services concerned will be saturated beyond their needs for basic familiarisation with automated data processing, advanced telecommunications equipment, and progressive implementation of appropriate automated national and regional systems.

The linking of this project with the ADB/EBRD conditional financing of the Almaty-Bishkek road is assumed to highlight the concern of all international agencies for linking external investment for infrastructure improvement with facilitation of regional trade.

Various other difficulties will be encountered:

- a) the existing data are outdated;
- b) the existing designs were made to FSU standards;
- c) the Contractor should decide, in consultation with the beneficiaries, what design to apply, in particular regarding the axle load standard for the pavement design (either the EU standard of 11.5 tons, or any standard more suitable - economically and technically - for traffic, trade and transit conditions in Central Asia);
- d) the existing information is partial only and fragmented, and must be supplemented by much field work;
- e) the field work is challenging, and accommodation during project execution will be basic;
- f) inspection of roads, geo-technical and topographical surveys, traffic surveys, need to be done in a timely manner;
- g) *For Module B, local design institutes* may be expected to be full partners.

The staff of the Road Departments are competent, very experienced and motivated.

4. MAIN COMPONENTS

4.1 *Module A*

4.1.1 Tasks

4.1.1.1 General Diligence

The Contractor will take a balanced approach to furthering the overall objectives of the project.

The apportionment of the supply budget should find a balance between automated trade facilitation systems, enforcement items, and other dispositions such as emergency generators, which might be necessary at some locations to keep the customs system working at a basic level.

Also, the Customs procedures at border crossings should be integrated in so far as institutionally possible, with the other controls, such as immigration and border security.

The level of computer skills available in each national customs agency should be investigated in a structured way, discussed fully with the customs committees' managements, and taken into account by the Contractor from the outset of the project. The IT, other tools, and training supplied should be well matched with the capacities of the beneficiaries to effectively exploit them.

4.1.1.2 Review of Previous Reports and Recommendations of TRACECA, International and National Agencies

The Contractor will review previous relevant advisory and training work including those sponsored by :

- TACIS
- WTO and WCO

He will also obtain and review national plans for customs system development, computerisation and reports of the principle problems, as viewed by national agencies. He will interview freight forwarders, licensed declarants and other users of the system.

He will consult with the Eurocustoms project or its successor.

4.1.1.3 Survey of Concerned Border Crossing, Inland Terminals and Central Customs Agency Data Processing Facilities

The Contractor will make a thorough survey of the facilities at the concerned border crossings, and inland centres. He will pay particular attention to power and telecommunications capacity and reliability at each node of the project system. He will ensure provision of adequate UPS, back-up generators, and telecommunications links to ensure that whatever system installed is highly robust, and that it can function in the event of power failures or erratic telephone links.

4.1.1.4 Liaise with the IJCMLA

The Contractor will send a delegate to each ICJMLA meeting (scheduled to occur twice yearly). He will present and promote technical and administrative proposals for customs IT standardisation to the IJCMLA.

4.1.1.5 Project Consultative Committee

The Contractor is to form a consultative committee of experts from each country to consider compatibility issues (data, architectures, etc).

Committee members should typically be heads of IT departments of the national customs committees, or other informed and responsible customs officers. The consultative committee meetings should be encouraged to invite others such as representatives of Eurocustoms, WCO, the IRU, FIATA, national road freight transport associations, and national freight forwarders associations, as advisers, or observers. However, dispersion of project focus should be avoided or little will be achieved. The first priority of the committee should be the resolution of regional technical compatibility issues at the customs officer level.

The committee should meet several times within the course of the project, at different locations each time. The Contractor should promote a free interchange of ideas between the countries at expert level, assist and encourage experts to make proposals, for example for compatible data formats, and systems for tracking of cargoes along the TRACECA route. Where political decisions may be necessary to implement such systems, or enforce standards, then formal submissions should be made to the IJCMLA.

The consultative committee should help to design the training curricula. As far as is practical, trainees should be brought together at one location within the region for the training events. This will encourage regional integration.

4.1.1.6 Conceptual Design

The Contractor in collaboration with the consultative committee will create a conceptual design of a flexible, regionally integrated, modular system for eventual full automation of the beneficiaries' national customs services. This should take into account the basic recommendations of the Computer Systems Report.

It will be used by the project as a regional framework for the individual modules implemented within each country. It should highlight:

- the technical interfaces required to be implemented by each country if and when they choose to set up a regional automated system
- qualitatively, the cost/benefit or lost opportunity implications of avoiding integration, using criteria to be proposed by the Contractor (e.g. time delays for users, inefficient use of man-power of the customs services, extending or limiting opportunities for fraudulent practices, etc.)

4.1.1.7 National IT Management Strategies

The Contractor will recommend an IT management strategy for each country. This will define how the overall management of computerisation will be undertaken in the longer term. It will also define the role of the present project, as part of that overall long term strategy for implementation. Whatever may be recommended in previous reports, these terms of reference take no position on the merits or otherwise of ASYCUDA, SOFLX or any other system which might constitute a possible basis for such long term strategies

4.1.1.8 Border Crossing System Designs

The Contractor will make schematic designs, detailed designs, and specifications for pilot modules for implementation within the project, in collaboration with the national authorities concerned, and according to international accepted best practice.

The recommendations of the TRACECA Trade Facilitation Computer Systems Report Section 3.2 System Functional Specification, are summarised below as guidelines:

- 1 Brief details of the consignment are recorded by customs at point of entry
- 2 Approval to move inland is given
- 3 Notification of expected arrival is sent by the border post to the regional office at which the declaration is to be presented, or to the exit border post for transit goods
- 4 Declaration is presented at the regional office, or by direct trader input
- 5 Declaration is checked and notification sent to the border post of entry, or to the central office
- 6 Goods in transit are presented at the border of exit, checked and notification sent
- 7 Data is captured from the declaration and any errors corrected. Validity checks and revenue calculations are made and reported
- 8 Further checks as appropriate, decisions on physical checks necessary etc
- 9 Documentary and physical checks as decided prior to payment
- 10 Payment made and goods released
- 11 Contraband report issued if checks reveal non-conformity
- 12 Reports are generated after a given period and displayed at locations concerned and central office. Discrepancies are reported and followed up if necessary.
- 13 Statistics are extracted from the system
- 14 Post release audit checks are identified by system and records transferred to a management information module
- 15 For exports, the same procedure would apply with initiation at the regional office

This description of a national system can be converted to apply to the region simply by extending the data transfer mechanisms across borders.

Where countries have opted for different systems, it will be necessary to create the interfaces for data exchange. It will not be necessary to create these interfaces under the project, if it is clear that the countries concerned are not

institutionally prepared to implement such data links. The degree of regional system integration, bi-lateral or multi-lateral, or none, is to be decided in the consultative committee forum.

Target processing times should be set for trucks travelling under the various regimes applicable (eg. 10-12 minutes for TIR).

The total functioning of the various checks and operations at the border should be considered (e.g. customs, immigration/border guards, veterinary, phyto-sanitary, technical checks including weights, and dimensions, any taxes collected at the borders). The project will review, and attempt to integrate such diverse activities. Reports recommend that collection of taxes should not take place at the border crossing itself.

The above guidelines are to be considered as descriptive of the core of the system processes to be supplied by the project, on a pilot basis for the border crossings designated. The Contractor in consultation with the authorities of the individual countries must decide on the equipment and software they require to be supplied under the present project for their pilot implementation module. This will relate to their present equipment, their existing commitments to software systems, the functions they wish to include in this project, their declared IT management strategy, and of course, to the project budget.

4.1.1.9 System Architecture

The following suggestions on system architecture were proposed by one of the beneficiary customs authorities. They are presented in these TOR as indicative of the aspirations of the beneficiaries, but not as a prescription:

Each automated border post should incorporate a standard design of LAN, which shall link the customs post, entrance and exit check points. Two computers are proposed one being used as a server with an INFORMIX DMS installed, the other will be a work station. Each border crossing should have appropriate telecommunications facilities.

In the regional customs agency one server with ORACLE DMS should be installed, with two workstations.

Data transmission between border crossing points, the regional customs agency and the central customs agency should be implemented by means of high speed digital communications lines, high speed digital radio bridges BreezeLink E1, and/or HDSL modems.

Tables of required equipment and services follows.

Table of technical facilities required for implementation of automatisisation

#	Name	Unit of measurement	Quantity	Price US\$	Amount US\$
1	Network equipment	Set	4	1774.00	7096.00
2	Server	Piece	1	1500.00	1500.00
3	Computer	Piece	51	1000.00	51000.00
4	Printer HP LJ 1100	Piece	16	400.00	6400.00
5	UPS 420	Piece	50	150.00	7500.00
6	Modem	Piece	8	260.00	2080.00
TOTAL:					75576.00

Table of Technical Facilities Required for Provision of Communication and Data Transmission

#	Name	Unit of measurement	Quantity	Price US\$	Amount US\$
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1	Electronic card and Upgrade kit	Set	32	-	87800.00
2	Breeze Link radio modems	Piece	8	8500.00	68000.00
3	IP4PX routers	Piece	8	3650.00	29200.00
4	HDSL modem	Piece	8	1500.00	12000.00
5	Equipment installation	-	-	-	28352.00
TOTAL-				217352.00	

Table of Training and Software Cost

<i>Cost of Software Products for the Central .Apparat of SCC</i>		
<i>Product Name</i>	<i>Price US\$</i>	<i>Total Price US\$</i>
<i>Oracle Enterprise Server for 8 licenses</i>	17960	
<i>Tuning Pack for 8 licenses</i>	1160	19120
<i>Developer/2000 – 3 licenses</i>	26985	
<i>Designer – 1 license</i>	7495	34480
<i>Express Analyzer – 1 license</i>	865	
<i>Express Server – 1 license</i>	5895	
<i>Express Object – 1 license</i>	5795	12555
<i>Delphy Instrumental System</i>	2800	2800
<i>Developer Suite (WEB) – 1 license</i>	9495	
<i>Application Server (WEB) for 8 licenses</i>	1900	11395
		80350

<i>Training Cost</i>		
<i>Name of Software product</i>	<i>Training Cost for 1 Specialist US\$</i>	<i>Total Price US\$</i>
<i>1 Administrator of ORACLE data base</i>	5060	10120
<i>ORACLE Application development engineer</i>	4400	17600
<i>Olap analyst</i>	1440	1440
<i>Designer 2000</i>	6480	6480
<i>UNIX Network Administrator</i>	2900	5800
<i>UNIX System Administrator</i>	2900	2900
		44340

<i>Cost of Software Products for 4 ASCC, where Automatic Border Crossing Posts are situated</i>		
<i>Name of the Product</i>	<i>Costs US\$</i>	<i>Total Price US\$</i>
<i>Windows NT-Server – 20 licenses</i>	3000	3000
<i>Informix Universal Server – 10 licenses</i>	4000	4000
		7000
<i>Training Cost</i>		
<i>Name of a Software Product</i>	<i>Training Cost for 1 Specialist US\$</i>	<i>Total Price US\$</i>
<i>Administrator of INFORMIX Database</i>	3000	6000

Administrator of Windows NT Network	2900	2900
		8900
<i>Cost of Software Product for 4 Automatic Border Crossing Posts</i>		
<i>Name of the Product</i>	<i>Cost US\$</i>	<i>Total Price US\$</i>
Windows NT-Workstation for 8 Stations	2400	2400

<i>Total Cost Table</i>	
<i>Name</i>	<i>Cost in US\$</i>
Technical Equipment	292928.00
Software	89750.00
Training	53240.00
Total	435918.00

The TRACECA Trade Facilitation Computer Systems Report recommends central linkage, as against border linkage, for regional integration. This report generally recommends development of the system from the centre, to regions, to the border crossings. This approach is not mandated on the present project, while some degree of integration of the border crossings functions with the regional and central authorities is.

4.1.1.10 Equipment Selection

The previous tasks provide guidelines for selecting equipment and software for procurement within the project. Enforcement and other equipment suggested for inclusion in the project includes:

- Axle weigh pads
- Generator sets
- Drug kits
- Infra-red document inspection equipment
- Endoscopes
- Search mirrors
- Geiger counters
- Office furniture where essential for operations

These TOR do not prescribe a procurement list for any country. After the technical surveys and discussions with the beneficiaries, the Contractor will propose and agree with each individual beneficiary country a procurement list for that country.

4.1.1.11 Procurement

The Contractor will write detailed specifications and procure the IT, telecommunications, software, enforcement equipment as determined in previous tasks.

The Contractor will act as the Procurement Agent for TACIS, either by employing staff specialising in that domain or by sub-contract.

The rigorous application of TACIS rules on supply contracts is to be foreseen.

Any software to be written explicitly for the project may be written by the Contractor, or he may procure it by contract. Regional suppliers of software able to provide full Russian or local language support are to be preferred.

This preference is to be expressed in the terms of the procurement tenders arranged under the project. Contractors are encouraged to employ local experts for writing software.

4.1.1.12 Installation, Commissioning and Training

The Contractor will install the equipment, commission systems, debug software, and fully train the beneficiaries' customs staff in the use of the systems installed (see also Section 4.1.1 concerning the Contractors responsibility for selecting appropriate systems)

He will ensure that all documentation, manuals, warranties and training is provided at least in English and Russian languages.

The Contractor will make practical recommendations on suitable remuneration levels, and ongoing training programmes, for specialist professional staff required to run the systems set up under the project.

4.1.1.13 Follow-up Support

The Contractor will provide follow-up support on system usage during a period of 6 months after provisional acceptance of the equipment or commissioning of the systems, whichever is the latest. This service is in addition to warranties which will be provided under the equipment supply contracts.

He will generally explain to the beneficiaries their rights under the warranties.

He will monitor the functioning of the systems, and include indicators of project impact in his Final Report

4.1.2. Implementation Procedures

The Contractor should foresee expertise in the following domains:

- management of (TACIS) supply contracts;
- customs, trade facilitation, border crossing procedures
- local and foreign IT and telecommunications

The key experts should be familiar with work overseas, preferably in the CIS. A small expatriate team is preferable to maintain relational continuity with the beneficiaries (e.g. an IT expert familiar with customs/EDI acting as Team Leader and principle expert, with short term input from a serving EU customs officer, and from a TACIS procurement expert).

The Contractor should spend a maximum of time in the beneficiary countries. Only tasks which could not be done in the region may be done in the EU. Reports, specifications and other written deliverables should be prepared and translated only in the region. All of the Contractors team members should involve the beneficiaries in all tasks they undertake on a day-to-day basis, and openly transfer know-how.

Equipment supplied should have local maintenance guarantees and facilities. Software supplied or developed should likewise have full local representation and support. During evaluation of tenders great attention will be paid to the credibility of local IT support which is proposed by tenderers, as such support will be crucial to the sustainability of the project. Well established local consultancies or local agencies of EU companies should be fully integrated into the project as sub-Contractors or suppliers of hardware and software.

As mentioned in the Tasks, training events should as far as practical be held at one location to bring together the local experts concerned. All costs for transport and accommodation of local experts for training, for consultative committee meetings, or for other reasons, should be supported by the project.

4.1.3 Project Schedule

The total duration of the project will be 24 months.

The project's milestones are :

• Inception report	end of month	2
• Progress report with system design and specification	end of month	6
• Progress report and start installation	end of month	12
• Complete commissioning and training	end of month	18
• Follow-up support	during 6 months	
• Draft Final Report	end of month	22
• Final Report	end of month	24

4.2 *Module B*

4.2.1 Phase 1 - Feasibility

4.2.1.1 General

The data collection in Phase 1 is considered to follow on from that carried out in the pre-feasibility study. It is not intended to repeat any work already undertaken or to change any basic premises.

In the succeeding sections, the Phase 1 tasks are considered under the following headings:

- (a) Traffic data
- (b) Road and bridge condition surveys
- (c) Topographical surveys
- (d) Geotechnical surveys
- (e) Preliminary designs and estimates
- (f) Environmental investigations
- (g) Economic evaluations
- (h) Reporting.

4.2.1.2 Traffic Data

The Contractor shall review and assess the adequacy of all previous traffic data for the purpose of designing the rehabilitation of the "selected road(s)". Traffic data shall include vehicle flows by type and diurnal patterns, together with representative axle loads and probable growth factors. Vehicle operating costs (VOCs) shall be determined by vehicle type, together with the possible effects on these of congestion and changes in speed/flow relationships e.g. on gradients. Traffic data shall be determined for discrete homogenous sections of road where it is apparent that these may differ from the average patterns.

Should the Contractor consider that additional traffic surveys of any kind (e.g. vehicle counts, axle loads, O/D patterns, localised variations) are necessary, full details should be given in the Inception Report together with proposals for carrying these out.

4.2.1.3 Road and Bridge Condition Surveys

In addition to establishing the existing condition of the road, the purpose of the condition surveys is to assess the causes and rate of deterioration in order to determine the most economic rehabilitation strategies.

The physical condition survey of the road should include visual cross-section data on pavement, shoulders, verges, embankments, cuttings, retaining walls etc. It should be supplemented by a pavement condition survey which should include any available historic construction data, test pitting or drillings to confirm pavement layer thicknesses and a deflection survey along the whole road to assess present pavement strengths or already failed sections.

The bridge condition survey should include examination of all bridge components to assess their load carrying capacity and probable future life. It should also include minor drainage structures and the associated drains, with an assessment of their adequacy.

4.2.1.4 Topographical Surveys

Topographical surveys should be carried out in sufficient detail to form the basis for detailed contract drawings for the reconstruction. They should also include - either in the first instance or at a later stage - detailed horizontal and vertical local surveys of any junctions where improved layouts might be required or sections of road where realignments would be beneficial.

4.2.1.5 Geotechnical Surveys

In conjunction with the pavement surveys, representative sampling and testing of pavement layers and formation should be carried out to determine their characteristics. The stability of existing earthwork, slopes should be verified. An investigation of materials sources and quarries should be undertaken to verify their suitability for pavement construction and to determine appropriate criteria and testing requirements to be included in the Technical Specification. The materials sources investigation should include the sources of bitumen for pavement construction.

4.2.1.6 Preliminary Designs and Estimates

Alternative rehabilitation strategies should be investigated as part of the feasibility phase and for this purpose preliminary designs and estimates will be made. It is expected that the aspects of investigation will include at least the following:

- (a) Criteria for overlaying or reconstructing pavement
- (b) Effect of adopting FSU or current European legal axle load
- (c) Design life (in years or standard axles etc)
- (d) Assumptions regarding frequency of major maintenance interventions
- (e) Benefits/costs of relieving critically trafficked sections e.g. by dualling, realigning, redesign of junctions or providing climbing lanes where appropriate.

Cost estimates for the finally proposed schemes should be separated into foreign exchange and local currency and indicate the amount of any local taxes and duties.

4.2.1.7 Environmental Investigations

The alignment of the rehabilitated road will remain broadly unchanged and the project is unlikely to involve significantly increased impacts on the natural environment such as major erosion, changes of streams, underground water and/or interference with animal and plant life. However, it will be necessary to plan measures to minimise the impact of the construction resulting from materials extraction and the construction processes. The Contractor shall prepare an Environmental Assessment analysis appropriate to the Bank's Environmental Category B, comprising:

- (a) identification of key project-related concerns with regard to environmental impacts on human health and safety,
- (b) compilation of key, environmental, health and safety regulations that will be relevant to the proposed project, and
- (c) cost estimates of appropriate mitigation measures and their incorporation into the engineering designs and contract documents and an Environmental Action Plan outlining the steps to be taken to implement the recommended mitigation measures.

4.2.1.8 Economic Evaluations

The economic analysis should essentially follow the methodology adopted in the pre-feasibility study. For the purposes of the evaluation, the project is to be separated into discrete but coordinated alternative betterment options, to determine the investment strategies displaying the highest socio-economic returns. Cost estimates should be based on whole life costing, including subsequent maintenance, debt servicing and environmental mitigation measures etc. The economic analysis should be based on discounted flows of costs and benefits, leading to Net Present Values and Internal Rates of Return. Sensitivity analysis should be carried out for the significant variables, including the cost of capital, traffic growth rates, design parameters and VOCs etc.

4.2.1.9 Reporting

Two months after commencement of work on the assignment, the Contractor shall provide an Inception Report to the Client and the Bank summarising his initial findings. This report shall include a review of the data obtained to date, with recommendations for any further surveys that are considered to be required and the proposed Works Programme as a detailed bar chart schedule indicating the expected timing for key events. An Interim Progress Report is to be submitted at the end of month 6, giving a brief review of progress. A Feasibility Report should be submitted at the end of Phase 1 summarising the work done and including details of the recommended rehabilitation strategy and the proposed design standards to be adopted. Further details of the distribution of reports are given in section 6.

Should the Contractor consider it advisable for better liaison to prepare detailed Working Papers on separate aspects of the work, these should preferably be included as annexes to scheduled reports, rather than being submitted on an ad hoc basis.

4.2.2 Phase 2 - Detailed Engineering & Tender Documents

4.2.2.1 Detailed Engineering Design

The detailed engineering design should be carried out on the basis of the agreed investment proposals set out in the Feasibility Report. It should be to a level suitable for international competitive bidding by open tendering in accordance with EBRD procurement procedures.

Design details (e.g. of culverts, road furniture, etc) should be in accordance with existing Uzbekistan standards unless the Contractor considers these to be unsuitable or capable of improvement.

4.2.2.2 Tender Documents

Tender documents should be prepared in English in accordance with the FIDIC Conditions of Contract for Works of Civil Engineering Construction (Fourth Edition 1987, with 1992 reprint amendments), amended if necessary to comply with the EBRD's rules and any particular conditions, required by The Government of Uzbekistan. They should include detailed engineering drawings, specifications and Bills of Quantities.

4.2.2.3 Prequalification of Contractors

The Contractor shall prepare Prequalification Documents with suitable criteria for the prequalification of contractors and implement the prequalification process. The documents and prequalification procedures shall be in accordance with the EBRD's current standards. On receipt of the prequalification applications, the Contractor shall prepare a Prequalification Report for EBRD and Government of Uzbekistan, giving his recommendations on which contractors should be prequalified.

4.2.2.4 Tender Procedures

The Contractor's advice and assistance to Government of Uzbekistan in contract procurement will include but not be limited to the following:

- (i) production and distribution of tender invitations and tender documents
- (ii) arranging tender visits and answering tenderers' enquiries on behalf of the Client
- (iii) evaluating tenders and making recommendations to the Client on the selection of contractor
- (iv) preparing final contract documents for contract signature with the selected contractor,
- (v) advising the Beneficiary on formal contract notices and procedures that may be necessary prior to commencement of the works. This activity will include ascertaining whether any permits or licences are required under Uzbekistan regulations to allow the Contractor to have formal status as engineers contributing to a construction project in Uzbekistan.
- (vi) advising the Beneficiary on any permits or licences which may be needed for a construction company (including foreign construction companies) to operate in Uzbekistan and incorporating these requirements into the project documents (including the tender documents and other documents, as appropriate).

4.2.2.5 Reporting

At the end of Phase 2 the Contractor should submit a Design Report summarising the whole of the work, the planned rehabilitation strategy and the proposed contractual arrangements. This report should contain an Engineer's Estimate for the contract works, separated into foreign and local currency, together with any expected taxes and dues.

4.2.3 Implementation Procedures

4.2.3.1 Contacts and Liaison

The Partner Organisation, on behalf of the Beneficiary, for the project will be Uzavtoyol and the Contractor will report to the Director. Written reports will be copied to the EBRD's designated staff. The Contractor should at all times liaise closely with the responsible Ministry and the concerned local agencies.

The Contractor will maintain continuous close liaison with Uzavtoyol through the latter's designated staff. In addition to the formal reporting requirements, a regular programme of briefing meetings should be instituted by the principal staff.

The Contractor is expected to carry out at least 60% of the work in Uzbekistan and is encouraged to work with local staff and individuals.

4.2.3.2 Administration and Logistics

Government of Uzbekistan will provide the following support and services to the Contractor:

- (i) all available data and information relating to the project
- (ii) suitable furnished and serviced office accommodation with heating, lighting, electricity and international telephone connections, the Contractor will be responsible for the cost of all international calls
- (iii) necessary arrangements for obtaining all visa, permits, licences and customs clearance necessary for the performance of the services in Uzbekistan.

The Contractor will supply all necessary computer hardware and software and equipment to be used for road surveys. On conclusion of the assignment, this equipment will be handed over to Uzavtoyol.

4.2.4 Project Schedule

The Contractor will be expected to mobilise his team and start work within two weeks after contract signing. The assignment will be implemented according to the following indicative timetable:

	<u>End of Month</u>
Contract signing	0
<u>Phase 1</u>	
Mobilisation	0.5
Inception Report submitted	1.5
Interim Progress Report submitted	4
Draft Feasibility Report submitted	7
Final Feasibility Report issued	9
<u>Phase 2</u>	
Draft Prequalification Documents submitted	9
Prequalification Documents issued	11
Prequalification applications returned	14
Draft Tender Documents submitted	14
Prequalification Report submitted	15
Final Tender Documents issued	16
Draft Design Report submitted	17
Final Design Report issued	19
Construction Tenders returned	20
Tender Evaluation Report submitted	21
Contract Award	23

This schedule may be modified as the work proceeds, in consultation with the Beneficiary, the Bank and the European Commission and on the general principle that it should be kept as short as possible consistent with effective project management and provision of the obligatory intervals for reviews and approvals.

4.3. Global Budget

The global budget is 2 000 000 EURO, broken down as follows for the purposes of tendering this project:

Module A /	
System design and specification, training activities (TA)	400 000 EURO
Supply of equipment and software (investment)	1 100 000 EURO
Module B / Feasibility Study	500 000 EURO
Total	2 000 000 EURO

To allow a margin of flexibility, the design, specification and training activities may later be varied up to 70% of total budget, depending on needs and requirements in each state, and always in common agreement between the Contractor, the beneficiary authorities, and TACIS.

The firm commitment of TACIS to the participation in the ADB Almaty-Bishkek Road Rehabilitation Project is for USD 800 000, or USD 400 000 each to the Kazakh and Kyrgyz border posts on this stretch of road. These sums include both the investment and the associated TA. The investment items need not all be physically located at the border crossing, but could be in part located, for example, at the regional customs centres and or at the central customs authorities head office in Astana. The important principle to respect is that the items supplied are to be affected to a functional scheme for the facilitation of customs procedures for traffic using the Almaty-Bishkek border crossing.

The remaining budget of approximately MEURO 0.7 (depending on future EURO/USD exchange rates) is to be allocated to the following border crossings:

- Port of Turkmenbashi
- Turkmenistan/Uzbekistan (Farab)
- Uzbekistan/ Kyrgyzstan (Osh)
- Uzbekistan/Tajikistan (Khojent)

Each land border crossing shall be considered as comprising two border posts, one post for each country. At the Port of Turkmenbashi only one post in total is involved. Each border post to be budgeted equally (i.e. approximately 100 000 EURO per post). Similarly to the Almaty-Bishkek Road border crossing, it is not imperative that all equipment supplied is to be installed at the border. It is however essential that the equipment be serving the traffic at the designated border crossings, even if not physically present there.

Software written specifically for the project, if written by the Contractor in-house or by directly employed local consultants, should not exceed 5% by total value of the contract. Such services may be included in the investment budget.

If a Procurement Agent is sub-contracted by the Contractor, the agent's fee should be included in the TA budget.

5. REPORTING

5.1 Reports

The Inception Report, Progress Reports and (Draft) Final Report for the project are to be delivered in the numbers, languages and locations as follows :

	Bound		Loose-leaf		CD (Eng. + Rus.)
	English	Russian	English	Russian	
TACIS Brussels	2	1	0	0	1
TACIS National CU (5 states)	2	6	1	1	1
TACIS Moni- toring Team (Central Asia – Europe)	2	1	0	0	0
TRACECA Coordination	2	2	1	1	1
Counter-parts	As necessary	As necessary	As necessary	As necessary	As necessary
EBRD	2	0	2	0	0
Asian Development Bank, Manila and local	3	0	0	0	1

Lists of addressees for each report are to be provided to the TACIS CUs.

At least one copy of each report should be delivered directly to the key project counter-part.

Copies of the Delivery Notes to the recipient(s) are to be provided by fax to the Tbilisi TRACECA co-ordination office.

In order to implement the reports on the TRACECA web site, the report must be provided by the contractor under an electronic format such as PDF – Acrobat Reader in order to include photographs, booklets, maps, diagrams, drawings ... One report has to correspond to one Acrobat reader file. Reports transmitted in multiple files and of different kind will be refused.

All information to obtain the necessary software (Adobe Acrobat Pro 4.0 or higher) for creating Acrobat Reader files can be obtained at the following Internet address :

<http://www.adobe.com/store/products/acrobat.html>

The importance of high quality Russian texts, delivered on time, cannot be over emphasized. The reporting dates in these TOR are for the delivery of the Russian language text and the English language text to be provided at the same time.

Reporting is to be in accordance with TACIS Guidelines.

These foresee :

Project Inception Report

An Inception Report shall be issued within 2 months of the start of the project. It shall summarise initial findings and propose any modifications to the methodology and work plan. In particular it will adapt the work plan to the needs of the beneficiaries taking into account the activities of other Technical Assistance programmes, avoiding duplication of effort and addressing unfilled needs.

It will also confirm or modify institutes/organisations/consulting bodies to be directly involved in the implementation.

The report distribution lists will be included.

Project Progress Report

These reports will be submitted at the end of months 6, 12 and 18. They will cover progress to date.

(Draft) Final Report

The Draft Final Report will be submitted at the end of month 22 and the Final Report at the end of month 24.

All reports must include an Executive Summary.

It would be incorrect to assume that changes to project scope which require changes to the Contractor/TACIS contract can be effected by a Report.

5.2 Deliverables

Module B will require specific deliverables. The distribution of documents to be supplied by the Contractor is shown in the table following. In addition to the bound reports, copies of all English text and tables should be submitted to the Bank on computer diskettes in Word 6.0 and Excel 5.0 software.

When the issue of draft documents is stipulated, Uzavtoyol and the Bank will respond with their comments within four weeks. The Final documents will then be issued taking account of these comments, within four weeks after receipt of the comments from Uzavtoyol and the Bank.

Documents	Numbers	Recipient	Language
Draft Feasibility Report	4	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
	1	TACIS Coordination	English
	1	TACIS Monitoring Team	English
Final Feasibility Report	4	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
	1	TACIS Coordination	English
	1	TACIS Monitoring Team	English
Draft Prequalification Document	4	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
Prequalification Documents	4	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
	As required	Applicants	English
Prequalification Report	4	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English

Draft Tender Documents	6	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
Final Tender Documents	6	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
	As required	Tenderers	English
Draft Design Report	4	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
Final Design Report	4	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
Tender Evaluation report	4	Uzavtoyol	Russian
	1	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
Final Contract Documents	6	Uzavtoyol	Russian
	2	Uzavtoyol	English
	2	EBRD	English
	1	TACIS Brussels	English
	As required	Contractor	English

6. FACTORS ENSURING SUSTAINABILITY

6.1. Institutional Appraisal

The project is linked to a broad effort by TRACECA and by the Asian Development Bank to facilitate trade within the region, and to encourage the adoption of customs procedures equivalent to EU and international practice. The consultative committee to be set up within the project is intended to provide a forum for local experts to meet and discuss technical problems associated with integration of customs procedures. This complements policy discussions which are the domain of the IGC-MLA.

Large transport investment projects are already being undertaken by development banks. They are examining in detail the institutional structure of the Beneficiary. These TOR require the Contractor to take institutional initiatives by other donors, as well as previous Tacis TRACECA projects, into account.

6.2. Economic and Financial Appraisal

Faster and more efficient border crossing procedures would both encourage regional trade, and provide higher customs revenues.

The feasibility studies included in this project are linked to EBRD investment projects for a road segment between Tachkent and Osh.

6.3. Political Environment

There is a clear political mandate for this project, evidenced by the signature of the TRACECA MLA in Baku in September 1998, at Presidential level, and by the requirement for signature of the ADB Kazakhstan/Kyrgyzstan Cross Border Agreement as a condition for the Bishkek-Almaty Road Rehabilitation loan. At the time of preparation of these TOR, the ADB agreement had been included in the Memorandums of Understanding between the ADB and the countries concerned, and signed at Ministerial level.

7. ENVIRONMENTAL IMPACT

There are only slight environmental implications to the module A. Vehicles delayed at border crossings do emit atmospheric pollutants while waiting, and this source would be reduced by the project.

Environmental impacts are an issue for the feasibility studies and will be addressed in the Module B.

The direct environmental impact of the project is expected to be low, though the construction of potentially required new bridges and bypasses may have a non-negligible environmental impact. However, the safer road traffic conditions resulting from the rehabilitation and upgrading of roads are likely to reduce the number of accidents.

8. MONITORING AND EVALUATION

The appointed Contractor should meet with the TACIS monitoring Team early in the project to agree a set of project M&E indicators.

Indicators might include:

- Due diligence in supplying equipment and training which is:
 - matched to the computer skills available in beneficiary countries customs agencies
 - readily maintainable at the locations where it is installed
- Agreement at expert level on regional interfaces for national customs computerised systems
- Adoption at working practice level, of customs clearance procedures which:
 - reduce delays at border crossings and inland terminals
 - improve revenue collection
 - reduce illicit traffic
 - improve the quality and availability of cross border trade data
- the existing studies, designs, surveys and plans are inventoried, consolidated, updated and completed;
- additional investigations, surveys, plans, engineering designs, drawings, bills of quantities, technical specifications and cost estimates are made;
- a detailed bankable feasibility study, including technical, economic and environmental feasibility, is prepared;
- pre-qualification and bidding documents are issued;
- transfer of know-how to Beneficiaries and local design institutes is realized.

STATEMENT OF ENDORSEMENT

Project Title: Central Asian Road Border Crossings

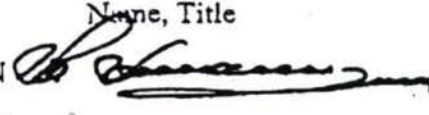
Recipient Institutions:

Ministry of Transport, Communications and Tourism of Kazakhstan/Customs Committee of Kazakhstan
 Ministry of Transport and Communications of Kyrgyzstan /Customs Committee of Kyrgyzstan
 Customs Committee of Tajikistan
 Customs Committee of Turkmenistan
 Customs Committee of Uzbekistan

We, the undersigned, hereby declare that we,

1. have carefully read the outline Terms of Reference (TORs) of the Project, which are attached to the present Statement of Endorsement;
2. agree that the outline TORs appended to hereto will serve as the basis for the development of the full Terms of Reference;
3. accept that this Statement of Endorsement is also applicable to the full Terms of Reference and that no further endorsement will be necessary for project implementation to commence;
4. approve the TOR, and are prepared to accept the technical assistance therein described;
5. accept that the experts in charge of rendering the technical assistance according to the outline TORs be selected according to the procedures of the Commission of the European Communities;
6. undertake to exert all our best efforts in order to make the rendering of the experts' technical assistance possible and to extend said experts our fullest co-operation. In particular, we undertake to put at the experts' disposal, free of charges, our facilities and staff, as they may be necessary;
7. undertake to acquire, free of charges, the ownership of the equipment purchased for the implementation of the Projects, as and when the transfer of property of said equipment is provided for under the outline TORs or the contract between the Commission of the European Communities and the experts, and to provide said experts with separate official statements certifying the receipt of the equipment;
8. shall allow, upon reasonable notice, independent inspectors, appointed by the Commission of the European Communities, and/or the Court of Auditors of the European Communities, to monitor the development of the Project and undertake to give said inspectors and/or the Court of Auditors the necessary assistance.

For and on behalf of:

	Name, Title	Place	Date	Signature
KAZAKHSTAN			24.01.99	
KYRGYZSTAN				KARIBZHANOV
TAJIKISTAN				DOBHANGOSHIY
TURKMENISTAN				
UZBEKISTAN				



ЗАЯВЛЕНИЕ ОБ ОДОБРЕНИИ.

Название проекта: Центральные Азиатские автодорожные пограничные посты

Учреждения-получатели:

Министерство транспорта, коммуникаций и туризма Казахстана/Таможенный комитет Казахстана

Министерство транспорта и коммуникаций Кыргызстан/Таможенный комитет Кыргызстан

Таможенный комитет Таджикистана

Таможенный комитет Туркменистана

Таможенный комитет Узбекистана

Мы, ниже подписавшиеся, настоящим заявляем, что мы:

1. Тщательно изучили описание Технического задания Проекта (ТЗП), приложенного к настоящему Заявлению об Одобрении;
2. Согласны с тем, что описание ТЗП будет служить основанием для разработки полного Технического задания;
3. Согласны с тем, что это Заявление об Одобрении является также приемлемым для полного Технического задания и в будущем другое одобрение не будет необходимым для осуществления проекта;
4. Одобряем данное описание ТЗП и готовы принять описание в нем техническое содействие;
5. Согласны с тем, что эксперты, которым поручается оказывать это техническое содействие согласно ТЗП, были отобраны в соответствии с процедурами Комиссии Европейских Сообществ;
6. Обязуемся приложить максимум усилий к тому, чтобы сделать возможным оказание нами технического содействия этим экспертами и полностью сотрудничать с ними. В частности, мы обязуемся, по мере необходимости, бесплатно предоставлять и распоряжение экспертов наши оборудование и персонал;
7. Обязуемся бесплатно приобрести право собственности на приобретенное оборудование для осуществления этого Проекта, в соответствии с тем как передача права собственности на это оборудование предусмотрена ТЗП или контрактом между Комиссией Европейских Сообществ и экспертами, и предоставить вышеупомянутым экспертам официальный документ, удостоверяющий получение этого оборудования;
8. Будем разрешать, при получении мотивированного извещения, независимым инспекторам, назначенным Комиссией Европейский Сообществ, и/или Счетной Палате Европейских Сообществ, контролировать ход выполнения работ по этому проекту, и обязуемся оказывать вышеупомянутым инспекторам и/или Счетной Палате необходимое содействие.

От имени и по поручению:

	Имя, должность	Место	Дата	Подпись
КАЗАХСТАН				
КЫРГЫЗСТАН	Замиров Замиров С.С.	Бишкек Бишкек	11.09.99. 15.09.99.	<i>[Signature]</i> <i>[Signature]</i>
ТАДЖИКИСТАН				
ТУРКМЕНИСТАН				
УЗБЕКИСТАН				

[Signature]

STATEMENT OF ENDORSEMENT

Project Title: Central Asian Road Border Crossings

Recipient Institutions:

Ministry of Transport, Communications and Tourism of Kazakhstan/Customs Committee of Kazakhstan

Ministry of Transport and Communications of Kyrgyzstan /Customs Committee of Kyrgyzstan

Customs Committee of Tajikistan


Customs Committee of Turkmenistan

Customs Committee of Uzbekistan

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6. undertake to exert all our best efforts in order to make the rendering of the experts' technical assistance possible and to extend said experts our fullest co-operation. In particular, we undertake to put at the experts' disposal, free of charges, our facilities and staff, as they may be necessary;
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For and on behalf of:

	Name	Title	Place	Date	Signature
KAZAKHISTAN					
KYRGYZSTAN					
TAJIKISTAN	M. Kasymov	Deputy Chairman	Customs Office Dushanbe	21.09.99	
TURKMENISTAN					
UZBEKISTAN					

ЗАЯВЛЕНИЕ ОБ ОДОБРЕНИИ

Название проекта: Центральные Азиатские автодорожные пограничные посты

Учреждения - получатели:

Министерство транспорта коммуникаций и туризма Казахстана/Таможенный комитет Казахстана
 Министерство транспорта и коммуникаций Кыргызстана/Таможенный комитет Кыргызстана
 Таможенный комитет Таджикистана
 Таможенный комитет Туркменистана
 Таможенный комитет Узбекистана

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3. согласны с тем, что это Заявление об Одобрении является также приемлемым для полного Технического Задания и в будущем другое одобрение не будет необходимым для осуществления проекта;
4. одобряем данное описание ТЗП и готовы принять описанное в нем техническое содействие;
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8. будем разрешать, при получении мотивированного извещения, независимым инспекторам, назначенным Комиссией Европейских Сообществ, и/или Счетной Палатой Европейских Сообществ, контролировать ход выполнения работ по этому проекту и обязуемся оказывать вышеупомянутым инспекторам и/или счетной Палате необходимое содействие.

От имени и по поручению:

	Имя, должность	Место	Дата	Подпись
КАЗАХСТАН				
КЫРГЫЗСТАН				
ТАДЖИКИСТАН				
ТУРКМЕНИСТАН	<i>Председатель</i>		<i>05.10.99</i>	<i>[Подпись]</i>
УЗБЕКИСТАН	<i>полномочивший</i>			

[Подпись]

ЗАЯВЛЕНИЕ ОБ ОДОБРЕНИИ

Название проекта: Центральные Азиатские автодорожные пограничные посты

Учреждения - получатели:

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 Министерство транспорта и коммуникаций Кыргызстана/Таможенный комитет Кыргызстана
 Таможенный комитет Таджикистана
 Таможенный комитет Туркменистана
 Таможенный комитет Узбекистана

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8. будем разрешать, при получении мотивированного извещения, независимым инспекторам назначенным Комиссией Европейских Сообществ, и/или Счетной Палате Европейских Сообществ, контролировать ход выполнения работ по этому проекту и обязуемся оказывать вышеупомянутым инспекторам и/или Счетной Палате необходимое содействие.

От имени и по поручению:

Имя, должность Место Дата Подпись

КАЗАХСТАН

КЫРГЫЗСТАН

ТАДЖИКИСТАН

ТУРКМЕНИСТАН

УЗБЕКИСТАН

Аришов. 7. Ташкент 11.09.99.
 Саид-Азиз
 первый зам.
 председателя ГТК РУ





Annex

B

ORGANISATION & METHOD





B1 INTRODUCTION

1.1 The Team

The proposed Team for this project has been specially selected on the basis of extensive international and local experience, both in terms of relevant skills and regional expertise. Each firm brings its own strengths to the consortium and together they are able to provide a team of diverse and experienced experts for the project.

As the lead firm, **Scott Wilson** has extensive experience of both Customs and road projects in the TRACECA states on behalf of Tacis, ADB and the World Bank. They have been undertaking Tacis projects in the Central Asian Region since 1995 and are currently involved in projects in all the disciplines for this project in Kazakhstan, Kyrgyzstan, Turkmenistan, Tadjikistan and Uzbekistan, with project offices in each state. Scott Wilson are complemented in this project by **Compass GmbH**, with their specific experience in Customs IT systems and its relationship to border operations. Compass also have extensive experience of Phare and Tacis projects which ensures that they will be an ideal partner for this project.

The team fully recognises the importance of local involvement and support. This is particularly important in the context of Module B. The local firm, **Kyrgyzdortransproject** (KDTP), has extensive national experience of road design and planning in the target area and has worked with Scott Wilson on previous projects. KDTP also has international experience having worked on aid-funded work in the region, including experience in Uzbekistan.

The Consortium will conclude an agreement with an Uzbekistan institute for Module B should this tender be successful. The Consultant has held meetings with design institutes in Uzbekistan in the proposal preparation stage, and will make a final decision during the Mobilisation and Inception Visit, concerning the best institute to contract with which will be compatible with the Ministry of Transport, Uzavtoyol and consortium member KDTP.

Scott Wilson is highly experienced in leading project consortia in trade facilitation and road development programmes in Central Asia and recognises that a vital key to a successful outcome is to develop integrated teams of international and national specialists capable of generating practical, implementable proposals that result in genuine improvements to trade and transport. This results from the knowledge and experience gained of the expectations of the designated project recipients.

1.2 Team Strengths

The specific team strengths that will be brought to this project include:

- Extensive experience in Central Asia including relevant TRACECA projects
- Strong Scott Wilson management of complex projects, as shown by a proven track record of successfully completing over 10 Tacis and TRACECA transport-related projects in the past 6 years



- A wide range of international experience as leading worldwide Consultants in the transport sector with particular experience in the highway and road transport sub-sectors, including on-going projects in all the recipient states
- Current on-going experience working with the Customs and Ministries of Transport in all the recipient states
- Current experience in addressing port operational issues at Turkmenbashi Port on behalf of EBRD
- Dedicated procurement department within Scott Wilson, who are also procurement agents for the British Government
- Preparation of training materials for EBRD personnel on EBRD procurement procedures
- Extensive procurement of IT and other equipment for Customs undertaken on behalf of Tacis
- Strong technical and training experience and skills resource base in all aspects of Customs and highway sub-sectors
- Independent IT consultancy. Neither Scott Wilson nor Compass have commercial links to specific hardware or software suppliers

The Module A team is already familiar with the Border posts and the Customs Authorities in the region, as members of the team are currently working with Customs in all the recipient countries, and have visited all of the named border crossings for this project. The proposed Team Leader for Module B has worked in Uzbekistan and recently drove the length of the Tashkent – Osh road to review the scope of the works required for this project.

1.3 Proposal Content

This Proposal is divided into the 6 Annexes as requested by the European Commission. These are as follows:

Annex A - Terms of Reference.

Annex B - Organisation and Method.

Annex C – List of Key and Non-Key Experts (inclusive of CV's)

Annex D - Breakdown of Prices (separate volume).

Annex E - General Conditions for Service Contracts financed by Phare/ Tacis funds (Vers 1/97)

Annex F – Model Bank Guarantee, Reporting Guidelines

Annex B (this document) is divided into the following 5 sections and has been structured to reflect the needs of the Terms of Reference in an orderly layout as follows:




B1 – Introduction (this section)	Introduction to this proposal
B2 – The Consultant	An overview of the members of the Consortium
B3 – Project Appreciation	A thorough detailing of our understanding of the assignment, description of the current situation, the critical project issues and comments on the terms of reference
B4 – Methodology	The methodology to be used to achieve the results required under the project
B5 – Project Organisation and Staffing	A description of the Team, the project staffing plan and narrative description of the key senior personnel.



B2 THE CONSULTANT

In this section we set out the experience of the companies in the Consortium.

2.1 Scott Wilson

 Scott Wilson is a leading international consultancy, one of whose specialisations is the transportation sector. Scott Wilson provides an integrated range of capacity building, management, planning, engineering and environmental services, and undertakes projects from initial planning and conception through to procurement commissioning and maintenance for Clients worldwide.

Scott Wilson's international reputation is based upon its recognised high performance and its comprehensive understanding of regional environments with their specific needs. This is reflected in its well-established and long-term presence in many countries. This situation is only possible when a Consultant is able to undertake projects that meet the aspirations of the project recipients.

Scott Wilson has a well-deserved reputation for strong leadership of technical projects and has successfully completed many Tacis and TRACECA projects. The Company is able to manage multi-sector projects and prides itself in the ability to successfully transfer knowledge and experience to counterparts during the life of a project, and to do this in the most sustainable and practical way.

Over the past 9 years Scott Wilson has been involved with many transport-related projects throughout the CIS and has had a permanent presence in Central Asia since 1995. The Company has a strong and solid record worldwide in all transport related fields, including those required for both modules of this project:

- Customs Procedures
- Trade Facilitation
- IT Management systems
- Road Feasibility Studies
- Tender Management
- Environmental Impact Assessment
- Border Crossing Development
- Customs IT systems
- Road Design
- Traffic Forecasting
- Contract Administration
- Goods, infrastructure and IT procurement
- Training & Knowledge Transfer

All of these services have been undertaken in the Central Asian States included in this project.

Scott Wilson's team has previously undertaken assessments at all the nominated border crossings, are familiar with the use of Customs IT in the Region and have undertaken assessments of, or transited, most of the major highways in the recipient countries.



Scott Wilson is probably the most experienced Consultant in border and Customs procedures having managed all of the following projects:

- Tacis TRACECA Trade Facilitation, Customs Procedures and Freight Forwarding
- Tacis Border Crossing Programme Phases 2 and 2a
- Tacis TRACECA International Road Transport Transit Facilitation
- ADB Cross Border Framework Agreement
- ADB Customs Reform Programme
- EBRD Institutional development for Turkmenbashi Port
- EBRD Institutional Development for the Port of Aktau, Kazakhstan
- Tacis TRACECA Legal & Regulatory Framework

All these projects have involved site evaluations at border crossings, working with central and regional Customs and many have also involved evaluation of Customs IT systems and procurement on behalf of Customs using Tacis procurement rules. Most of these projects have been undertaken in the Project target area.

IT Experience

Scott Wilson has been at the forefront of the use of computer programs developed for planning, design and project management. Programs are available for:

- Transport planning and transport information systems for regional governments in the CIS and Russia
- Project management and programming - powerful programs for project planning, control and management and for construction contract billing and cost control.
- Financial accounting, cost control and management information - a complete system providing on-line current information for managers and directors, accounts and staff services personnel.
- Highways and airport engineering - a full range of programs for alignment, earthworks, plotting and optimisation, contract management, updating interim certificates and price fluctuations.

In addition, Scott Wilson has undertaken evaluations of existing Customs IT computer systems in all the target countries.

Highways

Scott Wilson is one of Europe's major international road and highway Consultants with specific experience in development of the road network in the CIS. We are currently working in Kazakhstan, Kyrgyzstan and Uzbekistan on the following highway projects:

- EBRD Road Sector Development Project (Uzbekistan)
- ADB Road Rehabilitation Project (Uzbekistan)



- World Bank Urban Transport Project (Kyrgyzstan)
- World Bank Highway Project (Kazakhstan)
- IDB Murgab - Kulma Pass (Tadjikistan)

Scott Wilson are therefore familiar with the road network to be evaluated under Module B and with road design standards in use in the Region. Scott Wilson's proposed team leader for Module B drove the length of the Tashkent – Osh road during the preparation of this proposal and is therefore familiar with the current condition of the road.

Procurement

Scott Wilson has a long established expertise in the procurement of goods and services on behalf of Client organisations. With BSI (ISO 9001) accreditation for procurement, Clients are assured that their needs will be met by a team dedicated to the provision of services to the highest professional standards. Scott Wilson has no links with any manufacturer or supplier of equipment and does not act as a trading house. The firm is currently a registered procurement agent with the British Government's Department for International Development.

Relevant recent experience includes:

- **Equipment Procurement**
 - Procurement of Customs computer equipment for the introduction of SAFETIR as part of the TRACECA International Road Transport Transit Facilitation Project
 - Procurement of IT systems for the Port of the Nizhny Novgorod regional administration and the port of Nizhny Novgorod in Russia
 - Procurement of communications equipment for the Azov Don Basin State Administration for Waterways and Shipping
- **Construction procurement**
 - Preparation of tender and contract documentation for infrastructure at 15 border crossing points for the Tacis Border Crossing Study Phases 2 and 2a
 - Procurement of contractors as part of the Asian Development Bank Road Rehabilitation Project in Uzbekistan (1997)
 - Procurement of contractors as par of the Kyrgyz Republic Urban Transport Project (2000)
 - Preparation of tender and contract documentation for infrastructure at the Bug River border crossing point for the Tacis Bug River Bridge Proposed Second Crossing Point project (1999-ongoing)

Technology Transfer

Scott Wilson's expertise in technology and knowledge transfer is built upon a philosophy of working closely with counterpart staff, the Client organisation, beneficiaries, recipients and stakeholders in order to ensure the long-term sustainability of results. Our understanding of the diverse range of individuals and organisations potentially affected by any programme of



change or implementation enables us to ensure that likely outcomes are understood and anticipated at the outset of the project and that potential disruption within and without an organisation is kept to an acceptable minimum.

Where change is required, Scott Wilson ensures that the change programme is developed jointly with consultation at all levels within the organisation, and with other stakeholders as appropriate. The process of consultation, development of a longer term vision, identification of change management needs and new skills through training are all essential elements in ensuring that change becomes institutionalised within the culture of the workforce and durable, even over the longer term. Communication between the consultant and the client organisation is of primary importance throughout the process of management of change.

It is vital that the strategic potential of the organisation's human resource is recognised and that its development can be planned for. Through on-the-job training, Scott Wilson has established a prominent reputation for fostering the emergence of individual skills and providing institutions with the ability to function effectively long after the departure of expatriate staff. Sustainability is the key to all our work methods.

Scott Wilson's relevant recent experience includes:

- Tacis TRACECA International Road Transport Transit Facilitation – training of trainers for the road transport industry
- EBRD Institutional Development for Turkmenbashi Port
- EBRD Institutional Development for Port of Aktau, Kazakhstan
- ADB Customs Reform Programme

Quality Assurance

Scott Wilson's quality system is based upon the requirements of those parts of BS EN ISO 9001 that are relevant to a consultancy service. Scott Wilson is registered by BSI (QA) as providing an effective quality system.

Scott Wilson Experience

Since 1991, Scott Wilson has managed and undertaken many projects throughout the CIS. Scott Wilson are currently working on projects with both Customs and Ministries of Transport on behalf of these organisations in the Region and are extremely familiar with the project environment and the issues to be addressed. Projects in the Region and CIS of particular relevance to this project are shown in Table 1 below:



Table 1: Scott Wilson Relevant Experience

Funding Agent Year Country	Project Description	Relevance
<p>EC Tacis 1997 - 1999</p> <p>Moldova Ukraine Russia Poland Belarus</p>	<p>Border Crossing Study Phases 2 and 2a</p> <ul style="list-style-type: none"> ▪ To promote the facilitation of trade and the movement of people between the EU/CEEC and the NIS by the development of infrastructure, equipment and services at the NIS borders ▪ To liberate the constraints imposed upon trade and traffic flows by inefficient border crossing procedures and inadequate infrastructure at 15 border control zones through the production of feasibility studies, design of modern border crossing facilities and improvement of equipment resources ▪ Preparation of long term strategic plans for transport, covering road and rail aspects, and development of proposals for upgrading freight border facilities, including new terminals and road/rail infrastructure ▪ Preparation and signature facilitation of Memoranda of Understanding between the European Commission and the national governments for border crossing procedures and co-operation ▪ Procurement of works contracts for design and construction of new border crossing infrastructure at each of the borders ▪ Development of Terms of Reference for follow-on projects for Customs training and equipment procurement to be let by the European Commission 	<p>Border crossing facility design and appraisal</p> <p>Identification of procedural, equipment and infrastructure constraints</p> <p>Border zone traffic management and facility layout</p> <p>Production of detailed specifications of equipment to enhance controls</p> <p>Institutional strengthening and capacity building</p> <p>Procurement construction works</p> <p>Production of Feasibility Studies</p>



Funding Agent Year Country	Project Description	Relevance
<p>EC Tacis TRACECA</p> <p>1999-ongoing</p> <p>Kazakhstan Kyrgyzstan Turkmenistan Uzbekistan Tadjikistan, Ukraine Moldova Georgia Azerbaijan Armenia</p> <p>Mongolia</p>	<p>International Road Transport Transit Facilitation</p> <ul style="list-style-type: none"> ▪ Assist 11 countries of the TRACECA region to create the most favourable conditions for road transport ▪ To set up the basic elements with national Customs Authorities and Ministries of Transport ensuring adherence to the ADR Agreement, the TIR Convention and SafeTIR, in countries where the principle has been established and to encouraging the use of the TIR Convention of 1995 in those countries not yet compliant. ▪ Creation of working pilot systems for SafeTIR transmission of data to IRU ▪ Procurement agents for SafeTIR IT and training equipment ▪ To establish a permanent training structure for the road transport industry in each of the countries, so that they can be financially secure, beyond the duration of the project ▪ Train trainers to deliver courses international transport related courses to transport operators 	<p>Procurement of IT equipment</p> <p>Evaluation and development of IT systems to facilitate border transits</p> <p>Delivery of training in Customs procedures</p>
<p>EC Tacis TRACECA 1996-7</p> <p>Kazakhstan Kyrgyzstan Turkmenistan Uzbekistan Tadjikistan Armenia Azerbaijan Georgia</p>	<p>Trade Facilitation, Customs Procedures and Freight Forwarding</p> <ul style="list-style-type: none"> ▪ Proposals for EDI and management information systems for national Customs authorities ▪ Site surveys and recommendations for development of border crossings ▪ Standardisation of transport and trade documents ▪ Formation of Freight Forwarding Associations • Proposals for reform of customs procedures to facilitate trade ▪ Institutional strengthening including the promotion of transport and trade associations ▪ Training and transfer of technology (courses in 7 countries) 	<p>Recommendations for improvements to border facilities</p> <p>Proposals on development of Customs IT systems</p> <p>Institutional development within Customs and the forwarding industry</p> <p>Training</p>



Funding Agent Year Country	Project Description	Relevance
<p>EC Tacis TRACECA</p> <p>1995-7 Kazakhstan Kyrgyzstan Turkmenistan Uzbekistan Tadjikistan Armenia Azerbaijan Georgia</p>	<p>Legal and Regulatory Framework</p> <ul style="list-style-type: none"> ▪ The introduction of legislative changes to national transport laws and regulations to promote regional harmony ▪ Institutional Strengthening including the promotion of trade and transport association. ▪ Reform of customs and freight forwarding procedures ▪ Training and technology transfer 	<p>Training</p> <p>Customs legislation</p>
<p>ADB Nov 2000 Ongoing Kazakhstan, Kyrgyzstan Uzbekistan Tadjikistan China</p>	<p>Development of Customs Reform Programme</p> <ul style="list-style-type: none"> ▪ Identification of current Customs environment and constraints ▪ Evaluation of current reform programmes ▪ Assessment of existing and proposed programmes in the region relating to Customs assistance of all the IFIs ▪ Identification of programme deficiencies ▪ Proposals for a targeted development programme based on technical assistance and development loans to achieve sequenced reforms within Customs in the region so as to promote trade 	<p>Assessment of border operations and constraints</p> <p>Evaluation of current Customs programmes in IT</p> <p>Identification of communication deficiencies</p>
<p>EC Tacis Dec 1998 – Ongoing</p> <p>Ukraine Poland</p>	<p>Bug River Bridge Proposed Second Crossing</p> <ul style="list-style-type: none"> ▪ Feasibility study for reconstruction of bridge and approach road at the border zone between Ukraine and Poland ▪ Inspection of condition of existing facilities and identification of upgrade/replacement requirements ▪ Review of design of replacement facilities ▪ Development of tender documentation ▪ Preparation and signature facilitation of Memorandum of Understanding between the European Commission and the Governments of Ukraine and Poland for border crossing procedures and co-operation ▪ Procurement of works contracts for construction 	<p>Feasibility study</p> <p>Tender documentation & evaluation</p> <p>Road bridge design and condition appraisal</p> <p>Border zone traffic management and facility layout</p>
<p>EBRD 2000</p> <p>Uzbekistan</p>	<p>Road Sector Development Project – Project preparation</p> <ul style="list-style-type: none"> ▪ Pre-feasibility study on Tashkent – Osh Road ▪ Prioritisation of works ▪ Study of Uzbek road network 	<p>Pre-feasibility study</p> <p>Familiarity with Uzbek road network</p>



Funding Agent Year Country	Project Description	Relevance
Islamic Development Bank 1998 Ongoing Tadjikistan	Mugab - Kulma Pass Road Project <ul style="list-style-type: none"> ▪ Feasibility study ▪ Economic appraisal ▪ Construction Supervision ▪ Detail design, and preparation of tender documents for a 32 km high level pass on the Chinese border. 	Feasibility Detailed design Preparation of tender documents
Islamic Development Bank 1999-2000 Tadjikistan	Shagon - Zigar Road <ul style="list-style-type: none"> ▪ Preparation of feasibility study and preliminary design of 34km ▪ Geomorphological, environmental, and hydrological surveys ▪ Economic appraisal to justify alternative route chosen 	Feasibility study Design Condition survey
ADB 1997 Uzbekistan	Road Rehabilitation Project <ul style="list-style-type: none"> ▪ Preparation of national road and road transport sector policy including institutional, regulatory, and technical reforms, ▪ Evaluation, screening, and prioritising the existing road network to establish a programme for rehabilitation and improvement, ▪ Environmental impact assessment with monitoring and mitigation plan, ▪ Preparation of draft pre-qualification and bidding documents. 	Feasibility study Drafting of tender documents
World Bank 2000 – ongoing Kyrgyzstan	Urban Transport Project <ul style="list-style-type: none"> ▪ Field surveys and selection of priority roads for rehabilitation using HDM 4. ▪ Detail design and preparation of bidding documents. ▪ Procurement support including pre-bid meetings, bid evaluation, and award of contracts. 	Feasibility study Economic analysis Detailed design Preparation of bidding documents
World Bank 1996 – ongoing Kazakhstan	World Bank Highway Project <ul style="list-style-type: none"> ▪ Detailed design and environmental analysis of selected sections ▪ Economic analysis using HDM 3 to select 400km from 1800km of road ▪ Preparation of pre-qualification and tender documents ▪ Preparation of road safety action plan 	Economic analysis Preparation of tender documents Detailed design



2.2 Compass GmbH



Compass was incorporated in 1978 as an independent, private German company providing consultancy and engineering services in the field of traffic systems and logistics. The diversification of advisory services to Customs and other border-crossing administrations took place in 1992, following the urgent need for improvements of trans-border traffic clearance procedures in the Eastern European countries. Compass has undertaken numerous projects concerned with:

- modernisation of Customs and border crossing administrations
- customs computerization
- customs tariffs and goods valuation
- training systems development
- harmonisation of legislation
- border control systems
- anti-smuggling controls and investigation techniques with Customs Authorities and other Public Bodies involved in border crossing activities.

Compass carried out assistance projects as diverse as:

- institutional strengthening
- enhancement of maritime and land based transport logistics
- logistic networks
- organisation of multi-modal transport systems,
- planning of telecommunications and telematic networks

The Compass approach to projects is to act, wherever possible, as technical advisor and facilitator, assisting in identifying clear objectives and establishing respective technical system solutions for private clients and host administrations.

The services offered by Compass are:

- Modernization and strengthening of customs and border-crossing administrations
- design of cross-sector information networks border crossings linked to private enterprises and authorities (customs)
- Technical assistance to border guards, customs, veterinary, phytosanitary services at the border crossings to improve procedures
- identification of organisations set-up, facilities and infrastructure for ministries and authorities such as: Ministries of Transport, Customs authorities, Ministries of Interior, Border Police
- customs computerization including customs tariffs and goods valuation
- identification of infrastructure needs and related investments



- harmonisation of legislation and border control systems
- anti-smuggling controls and investigation techniques with customs authorities and other public bodies
- manpower development and training activities
- telematic networks, linking trade and transport enterprises with authorities
- development of operational procedures to streamline border crossings
- identification of deficiencies in the trade and transport systems

Compass therefore complements the technical assistance skills of Scott Wilson, especially in border and Customs IT technology.

Relevant experience is shown in Table 2 below:

Table 2: Compass GmbH Relevant Experience

Funding Agent Year Country	Project Description	Relevance
EC Tacis Feb 1999 – ongoing Russian Federation Belarus Ukraine Moldova	Border Crossing Supervision Unit <ul style="list-style-type: none"> ▪ Performance analysis and monitoring of all border crossing procedures ▪ planning and implementation of operational improvements to harmonize and enhance outdated and differing customs procedures ▪ administrative practices and traffic management, co-ordination and co-operation between the various national services operating at the border crossing posts, comprising customs, border guards, immigration, veterinary and phytosanitary services ▪ recommendations on suitable, standardized and modern equipment, particularly for the detection of illicit goods and persons ▪ definition of communication networks and control systems, technical equipment specifications and tender documentation ▪ recommendations on border crossing facilities for all border control services 	Monitoring of border crossing procedures Communication system design, and specifications Harmonisation of regional procedures Equipment recommendations



Funding Agent Year Country	Project Description	Relevance
<p>EC Phare Oct 1995 – April 1996 Romania</p>	<p>Solving of Border Crossing Bottlenecks at Calafat / Vidin</p> <ul style="list-style-type: none"> ▪ Improved traffic control ▪ Preparation of statistical systems ▪ Establishing a customs and border control information system based on ASYCUDA ▪ Management and control of ferry services ▪ Personnel policy for recruitment and training of customs staff ▪ Proposals for institutional improvements of local organizations and authorities 	<p>Border information system</p> <p>Human Resource Development</p> <p>Institutional analysis</p>
<p>EC Phare Nov 1993 – Oct 1995 Romania</p>	<p>Technical Assistance to the General Customs Administration</p> <ul style="list-style-type: none"> ▪ Management assistance for implementation of the new program control data ▪ Drafting guidelines for financial estimates ▪ Establishing a new audit system ▪ Proposals for implementation of risk strategies ▪ Preparation and implementation of a project quality management plan ▪ Establishing criteria for tender evaluation ▪ Preparation of manpower development plans ▪ Training of Customs staff 	<p>Training of Customs staff</p> <p>System design</p>
<p>EC Phare Oct 1994 – Aug 1995 Hungary</p>	<p>Technical Assistance and Training Program for Border Crossings of the Balkan Corridors</p> <p>Recommendations were delivered on:</p> <ul style="list-style-type: none"> ▪ Improvements of operational procedures at border crossings related to customs, border guards, veterinary and phytosanitary services ▪ Investments for physical upgrading of border posts ▪ Manpower development in customs and border post services ▪ Development and improvements of telecommunication networks ▪ Analysis of road traffic ▪ Weak point analysis at border crossings 	<p>Development of communication networks</p> <p>Analysis of border posts</p> <p>Proposals for improvements in border procedures</p> <p>Analysis of upgrading border posts activities</p>
<p>EC Phare Nov 1993 – July 1994 Bulgaria</p>	<p>Co-ordination of Phare Border crossing Programs</p> <ul style="list-style-type: none"> ▪ Proposals for institutional reorganization of Customs authorities ▪ Technical assistance for implementation of new operational procedures and logistics ▪ Establishment of an intergovernmental information system ▪ Proposal for personnel development policy, recruitment and training 	<p>Development of intergovernmental Information Systems</p> <p>Development of new border procedures</p>



Funding Agent Year Country	Project Description	Relevance
EC Phare Feb 1994 – May 1994 Bulgaria	Short Term Action Plan for Balkan Corridors Countries The Short Term Action Plan included proposals, submitted to the Governments of Bulgaria, Hungary and Romania Customs Administrations, for: <ul style="list-style-type: none"> ▪ Implementation of new Customs operational procedures ▪ Establishment of an inter-governmental information system ▪ Policy for recruitment and training of personnel ▪ Coordination of information systems between the Ministries of Transport and Ministries of Finance (Customs Administration) for railways and road transport ▪ Simplification of documentation 	New Customs operational procedure Recruitment and training Harmonisation of information systems Established an intergovernmental Information System

2.3 Kyrgyzdortransproject

KYRGYZDORTRANSPROJECT



Kyrgyzdortransproject (KDTP) is the leading consultancy company in the Kyrgyz Republic dealing with highway engineering, transport enterprises and airport construction for local airlines. It has approximately 128 staff, of whom some 93 are professional and technical personnel. They are currently working on ADB funded projects with Scott Wilson. KDTP is registered with the national “Common State Register” in accordance with established national procedures.

The main objectives of KDTP are to provide multidisciplinary engineering consulting services in roads and transportation, infrastructure, airport construction for local airlines, long-term forecasting and programming for the development of national road network and transportation facilities.

KDTP has provided engineering consulting services in Uzbekistan, Kazakhstan, Russia, and China, as well as rendering consulting services in roads to ministries of the former Soviet Union.

From 1993 to date KDTP has co-operated with worldwide international consulting companies, including Scott Wilson, under projects financed by ADB, IDB and EU-Tacis. As a result, KDTP has successfully completed several projects in close co-operation with foreign companies and organisations from the UK, Germany, Finland, Denmark, Turkey, Canada and the US.

The experience gained by KDTP in joint consultancy work with international companies has enabled it to win an international tender in 1996-1997 and act as the leading firm in consortium composed of themselves and ECIL of Pakistan, for the development of “Feasibility Study, Detailed Design and Tender Documents for Bishkek - Torgut Road”, financed by the Islamic Development Bank.



KDTP has successfully completed more than 2000 different projects. From the 1960s, nearly all national roads in Kyrgyzstan, bridges, overpasses and transport enterprises were newly constructed or reconstructed in compliance with projects prepared by KDTP.

Undertaking pre-feasibility and feasibility studies, design and construction supervision in connection with various assignments and in various individual special disciplines, KDTP has accumulated experience and knowledge of local climatic conditions and the impact of unfavourable factors such as:

- seismicity
- landslides and mountain wastes
- floods and avalanches
- low temperatures
- permafrost
- transverse depression and heaving of soils
- snow drifts
- high mountains

KDTP is committed to implementing quality assurance on all corporate activities and on projects undertaken on behalf of Clients. In 1994 the State License Centre under Gosstroï of Kyrgyz Republic has issued a license and later in April 1998 it was endorsed with License No. 6-1-000437.

Relevant experience in the last 5 years is shown in Table 3 below.

Table 3: KDTP Relevant Experience

Funding Agent Year Country	Project Description	Relevance
World Bank 2000 Kyrgyzstan	Urban Transport Project Field surveys, feasibility studies, detailed design, and preparation of bidding documents for road rehabilitation in Bishkek, Osh, and Jelal-abad in association with Scott Wilson	Feasibility Detailed design
ADB 1998 Kyrgyzstan	Second Bishkek-Osh Road Rehabilitation Project Including 2.5km Tunnel Reconstruction Survey works, data acquisition and detailed design were carried out.	Surveys Detailed design



Funding Agent Year Country	Project Description	Relevance
IDB 1997 Kyrgyzstan	Feasibility Study, Detailed Design and Tender Documents for Bishkek-Torgut Road Existing road with total length of 540km is deteriorated badly on most stretches and does not comply with road safety standards. The work carried out included set of field surveys, feasibility study, engineering design of high priority sections and cost estimation.	Surveys Feasibility Design
ADB 1996 Kyrgyzstan	Detailed Design for Bishkek – Osh Road Rehabilitation Project Detailed Designs for sections km 161 – 248, 325 - 362, 412 - 426 were prepared.	Detailed design
Government of Kyrgyzstan 1995 Kyrgyzstan	Reconstruction of Bishkek - Osh Road (km 309 - km 428) The existing road, situated along the canyon, was not in compliance with safety standards. It was designed for the improvement of horizontal curvature and gradients, providing slope protection measures, upgrading pavement to modern load standards, improvement of drainage facilities. Geological, geophysical, hydrological and materials studies, engineering design and cost estimation were carried out.	Surveys Design
Government of Kyrgyzstan 1995 Kyrgyzstan	Reconstruction of Kyzyl-Bel mountain pass on Bishkek – Torgut Road The existing road is located in a difficult area with a pass height of 2500m and covered by landslides. It was designed to relocate the alignment to pass around the landslide area with surveys, engineering design and cost estimates undertaken.	Surveys Design
Government of Kyrgyzstan 1994 Kyrgyzstan	Reconstruction of Bishkek - Torgut Road (531 km – 539 km) The existing two-lane road runs through the difficult mountainous terrain (climbing to Torgut pass at an elevation of 3752 m). There were insufficient road and carriageway widths, radii and gradients are sub-standard. The design was to improve geometrical parameters of the road, reconstruct drainage structures, provide asphalt-concrete pavement for modern loads. Studies, detailed engineering design and cost estimates were carried out.	Detailed design



Funding Agent Year Country	Project Description	Relevance
Government of Kyrgyzstan 1994 Kyrgyzstan	Reconstruction of Bishkek - Osh Road (161 km - 190 km) In 1992 the existing two-lane road was destroyed by 9 magnitude earthquake (landslides, destruction of subgrade, bridge, drainage structures). Detailed design of two-lane carriageway road detouring the landslide areas was carried out together with all studies and cost analysis.	Detailed design
Government of Kyrgyzstan 1994 Kyrgyzstan	Reconstruction of Barskaun Ak-Shiirak Road, Barskaun pass (km 45-51) The existing single-lane road is a low technical category located on snow-bounding area exposed to avalanches. Gradients are steep, small radii, 8 hairpin curves. Detailed design for two-lane carriageway road, realigned to the opposite slope with lesser snow cover, was prepared. All surveys and cost estimates were undertaken, together with Construction supervision.	Surveys Detailed design
Government of Kyrgyzstan 1994 Kyrgyzstan	Reconstruction of Bishkek – Osh Road (km 228-248) The existing two-lane road is located along the Chichkan river canyon, having steep gradients, small radii, inadequate road and carriageway widths. The existing road was upgraded to two-lane road with necessary improvements to geometrical parameters, and drainage structures. All surveys, designs and cost estimates were undertaken.	Detailed design Surveys
Government of Uzbekistan Feb- August 1999 Uzbekistan	Reconstruction of Andijan – Osh – Sary-Tash – Irkeshtan – Kashgar Road Mountainous road construction to improve the link between Uzbekistan and China.	Mountainous road



B3 PROJECT APPRECIATION

3.1 Project Objectives

The overall Project objective is:

“to improve the conditions for road transport on the most heavily trafficked section of the TRACECA route in Central Asia, concentrating on the road border crossing facilities and associated infrastructure”.

The specific objectives of the Project differ in relation to each of the project modules and their respective recipients.

The specific objectives of Module A are:

- to provide resources to State Customs Committees to improve both performance and controls at key border crossings on the TRACECA route in Central Asia
- to improve internal controls on the movement of international traffic and also to reduce the delays to border transits by the use of automated processing systems

The need for increased control measures to reduce smuggling and the movement of prohibited goods can only be achieved by having access to modern enforcement equipment to improve the quality of the checking activities. Commensurate with the improvements in enforcement is the requirement to improve internal controls on the movement of international traffic and also to reduce the delays to border transits by the use of automated processing systems. Such systems have already been developed in some of the TRACECA states. The project will provide a pilot system at selected key locations to demonstrate the advantages of such a system with a view to its eventual implementation throughout the region, with possible international linkages at a later stage.

The specific objective of Module B is:

- to assist the Government of Uzbekistan develop the Tashkent-Osh road in compliance with the EBRD’s strategy for the transport sector.

This involves progressing the current Pre-feasibility Study through to full feasibility standard level to obtain the necessary international funding. Assuming that such funding is then granted, the project will further progress implementation by the undertaking of detailed engineering design and tendering for the nominated road sections.

3.2 Project Environment

The opening up of Central Asia under the Soviet Tzelina programme was principally focussed on obtaining access to raw materials for the industrial heart-lands of Siberia and the



European parts of the USSR. The key features of this development strategy in relation to the later trading and transport environments in Central Asia were as follows:

- The trading movements were internal within the USSR and there was almost no direct import/export activity or regional trade, therefore there were no significant Customs function. The Chinese frontier had been closed to trade since the 1960s.
- The dominant transport mode was rail because of the need to move low value raw materials in bulk over long distances to rail connected factories for further processing.

The situation changed dramatically in 1991 with the collapse of the Soviet Union and the creation of the independent Central Asian Republics. This change required each country to establish its own Customs service almost overnight and to construct internal border posts between the Republics. This required a major investment in both human and physical resources.

With independence came a dramatic change in the nature of trade. There was a sudden demand for importation of consumer and higher technology goods from the EU and other developed markets, combined with a reduction in the reliance on trade with Russia. Much of this new import trade was brought in by road, either using the northern route through Russia or particularly on the southern route from Turkey and Iran using part of the TRACECA route. There was therefore a rapid increase in the use of the road network that had mainly been designed to perform an internal, rather than an international, function.

Unfortunately, since independence all the Republics have undergone a difficult transition period that has resulted in reduced GDP and economic problems, partially as a knock-on from the problems in Russia, which still remains a major trading partner. The result is that though conditions are now improving significantly with positive GDP that there has been a shortage of funding for investment in both the Customs and road environments.

In the context of Customs this has been reflected in the low use of IT both at central level and particularly at the borders and their regional offices. Some progress has been made especially in Kazakhstan and Uzbekistan. This lack of access to new technology is compounded by the inadequacies of the national communication systems. The result is that long delays have been incurred at border posts and inland clearance centres and there has been inadequate control over internal movements. This has inhibited trade, raised transport costs and resulted in duty "leakage".

This Project is expected to resolve some of these constraints, and thus facilitate trade, by providing access for Customs to new technologies, particularly at the border crossings, the point where IT utilisation is lowest. The Project will also establish the potential for a regional data transfer system between Customs that will enhance controls and generate additional revenue.

In the context of roads, this combination of increased traffic and lack of investment has resulted in a gradual deterioration in roads throughout the region. This adverse situation has been recognised by the World Bank, Asian Development Bank, EBRD, IDB, and the Kuwaiti and Saudi Development funds, and all are actively involved in road rehabilitation programmes. However, external assistance to some of these programmes is still required as indicated in the TOR.

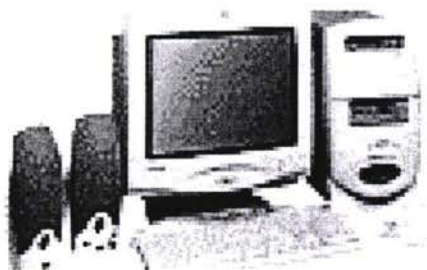
Uzbekistan is located in the centre of the Central Asian Road network and further deterioration of its roads has implications to all the other Republics in terms of trade. Module B of the Project is designed to improve the road network, particularly in relation to the important Fergana Valley corridor with its access to northern Tadjikistan, southern Kyrgyzstan and through to China via the Irkestan border crossing.

3.3 Comments on the Terms of Reference

The Consultant has carefully reviewed the Terms of Reference for the Project 'Central Asian Border Crossings (Ref no. SCR-E/110622/C/SV/WW)', and would like to comment on the following areas:

- IT
- Procurement – Module A
- Budget Allocation
- Team Composition – Module A
- Module B

3.3.1 IT



In relation to the proposed system design, the TOR does not appear to define the specific functionality of the proposed pilot system. References are made in relation to the TRACECA Trade Facilitation Computer Systems Report and its recommendations. However, these were principally concerned with the development of ACCS and were not related to border activities. The TOR makes it clear that the intention is not to develop an ACCS, as these are too complex and

expensive for this project, but to develop modules that could interface with such systems.

One issue where the Consultant has particular concerns is the use of local IT specialists. This assumes that the Customs in each country is prepared to accept externally prepared programmes that will interface directly with their own dedicated systems. It is understood that most of the existing developments have been undertaken in-house, with the exception of Kazakhstan, and that most Customs have their own dedicated communication systems. The proposed methodology may therefore represent a significant change of approach in relation to system security. The Consultant will require confirmation in each country that the use of local specialists for this role is acceptable.

Whilst the Consultant has IT relationships in each country, it is envisaged that the systems to be developed will not be bespoke, but will comprise of off-the-shelf packages currently in use internationally. The reasons for deciding not to use a bespoke system are as follows:

- Potentially up to 5 bespoke systems will need to be designed which will have both project financial and Customs administrations compatibility issues



- Off-the-shelf packages will have a proven track record in the required applications

Confirmation of the acceptability of this approach will be sought during the Inception Phase, with the Tacis Task Manager, Customs administrations and also within the first Consultative Committee meeting.

The proposed architecture suggested in TOR Section 4.1.1.9 proposes that “each automated border post should incorporate a standard design of LAN, which shall link the customs post, entrance and exit check points”. It is probable that the data in TOR Section 4.1.1.9 may have been submitted by Uzbekistan as only Alat has such entry and exist check points. This proposed architecture is not possible at any of the other 8 border crossings due to the layout of the facilities. All the others are based on a single control barrier with adjacent processing offices. The systems architecture and supply of IT equipment will therefore have to be adapted to the existing infrastructure.

3.3.2 Procurement – Module A

The Consultant is fully conversant with Tacis procurement procedures to be used in Module A. Given the potential scale of the purchasing programme, the international procurement methodology will be used. Experience on previous projects, especially those involving multi-country delivery, indicates significant lead times can be involved when using such procurement systems.

The Consultant will endeavour to undertake equipment specification at the earliest possible opportunity in order to compensate for the lengthy lead times. In respect of enforcement equipment this may be possible in Month 3 but the IT related purchasing requirement will not be determined until systems design is underway and therefore is unlikely before Month 6, thus allowing only six months before the programmed instalment that is scheduled to commence in Month 12.

There is a requirement for initial purchases of IT related equipment in order to undertake the system design in-country and to initiate on-site trials prior to that installation. This should form part of the overall procurement, as the equipment will be left with the recipient on completion. However, the Consultant requests consideration of identifying at an early date a small ‘project development package’ that can be purchased by direct agreement to ensure immediate delivery for the design tasks being undertaken prior to month 6. It is not expected that this package would exceed 20,000 Euro and is therefore within the limits for such a purchasing methodology to be used. Clarification of the need for direct purchasing of equipment and the establishment of the pilot will be sought during the Inception Phase, with the Tacis Task Manager, Tacis Procurement Department and also within the first Consultative Committee meeting.

Given the lengthy lead time from specification agreement to installation in relation to the IT equipment, it is essential that the necessary approval of the tender and contract documentation is processed expeditiously in Brussels to avoid potential implementation delays.

Conversely, the Consultant is concerned as to whether the procurement at 1.1 million Euro may be too high. Knowledge of the situation at the Kazakhstan / Kyrgyzstan crossing being



funded by ADB under the CBFA envisaged development of a “control points” rather than a major border crossing that would delay traffic. Both countries are in the same Customs Union (along with Russia, Belarus and Tadjikistan). It is therefore unlikely that the enforcement equipment, hardware and software, communications equipment and technical assistance would be as high as 400,000 Euro per post as suggested. It is accepted that some equipment may also be located at adjacent centres but the procurement requirements still appear high.

There is generally either an absence or shortage of enforcement equipment at all the selected border posts. The TOR indicates in Section 2.2 the “provision of basic enforcement equipment such as drug kits and infra-red control devices”. Experience at other borders indicates that the main requirements by Customs at border level have been for “rummaging” kits – equipment that enables the more effective examination of vehicles such as mirrors, probes, torches etc some of which are included in 4.1.1.10. It is not envisaged that x-ray equipment will be provided.

In providing equipment, care will need to be taken as to the potential supplier and its likely use. It was noted that equipment provided under a previous Tacis project is still unused – drug kits remain in the original wrappers and no instructions were provided in Russian, torches were not used as there was no access to batteries, etc. There is also concern that some enforcement equipment may not be used for a variety of reasons. An example of this is the lack of use of drug kits and low enforcement levels on what is a major drug corridor region.

Consideration may also need to be given to the provision of equipment to other agencies at the border. Delayed transits result from these other organisations, as well as Customs. Under other Tacis programmes, passport checking equipment has been provided to Border Guards and computers to veterinary and phytosanitary personnel to expedite checking of regulations by enabling them to develop computerised databases.

3.3.3 Budget Allocation

The Consultant is concerned at the current budget split in relation to Module A which provides a low systems specification element of only 0.4 million Euro over a two year period in relation to the potential complexity and technical content required to complete all the tasks indicated in the TOR and described in Section 4. Highly qualified IT personnel command premium rates both at international and local level. In addition systems development can be a time-consuming process requiring significant man-day input.



The limit of 75,000 Euro on writing software may underestimate the complexity of developing such systems, depending on the data field requirements required by Customs.

The liaison process, border inspections and meetings of IJCMLA and Consultative Committees will all involve extensive travel both of the Consultant’s team and local and Customs specialists (assuming project has to fund travel and per diems of Customs representatives for meetings and training in a single country as proposed in the TOR).



The TOR indicates that “the design, specification and training activities may later be varied up to 70% of the total budget depending on the needs and requirements in each state and always in common agreement between the Contractor, the beneficiary authorities and Tacis”. The Consultant believes that such a variance will probably be required. However, it may be difficult to obtain “common agreement” given that the TOR has nominated the procurement allocation to each country/border crossing.

The Consultant will provide clear indications of the recipient needs and possible changes in the budget allocation at the end of the Inception Period should this be necessary.

3.3.4 Team Composition – Module A

The Terms of Reference suggest that “a small expatriate team is preferable to maintain relational continuity with the beneficiaries”. The Consultant fully supports this strategy but has not adopted the suggestion that the IT expert should be the Team leader or that a serving EU Customs Officer should be included.

The reasons for the change to the suggested team composition is as follows:

- The Team Leader should be familiar with both the border and IT environment in the region to assist in addressing the balance between procedural and technical issues. It is considered that in the initial stages the institutional aspects in relation to development of the system will be more important than the technical aspects and therefore someone who is more familiar with the institutional environment should lead the team. The IT specialist will still remain the “principal expert” in terms of man-day input.
- Experience of previous projects has indicated that using serving EU Customs Officers has not been successful. This is because whilst they fully understand their own system and environment, they usually lack the ability to provide practical proposals to other Customs organisations working in a totally different environment subject to specific national legislation. The Consultant therefore considers it is more beneficial to use appropriate specialists who have a detailed knowledge of the Customs environment in Central Asia, as well as an understanding of practices in the EU and the implication to Customs of joining the WTO, WCO and Kyoto Conventions.

The Consultant considers it important that IT personnel have no commercial links to IT hardware or software suppliers or any of the ACCS providers. This enables the Consultant to adopt a neutral approach the issues of system development based solely on the needs of the beneficiaries, rather than directing them to a particular solution.

3.3.5 Module B

The timing for the delivery of reports given in section 4.2.1.9 of the TOR conflicts with that given in the project schedule in TOR section 4.2.4. Below is a revised project schedule for Module B based on the indicative timetable given in 4.2.4.



	<u>End Month</u>
Contract signing	0
<u>Phase 1</u>	
Mobilisation	0.5
Inception Report Submitted	1.5
Interim Progress Report submitted	4
Draft Feasibility Report submitted	7
Final Feasibility Report issued	9
<u>Phase 2</u>	
Draft Prequalification Documents submitted	10
Prequalification Documents issued	11
Prequalification applications returned	14
Prequalification Report submitted	15
Draft Design Report submitted	16
Final Design Report issued	18
Draft Tender Documents submitted	18
Final Tender Documents issued	19
Construction Tenders returned	20
Tender Evaluation Report submitted	21
Contract Award	23
Final Report	24

3.4 Assumptions

Following on from the above comments, the Consultant has made the following assumptions in this proposal:

- IT
- Module B

3.4.1 IT

The project is entitled Central Asian Border Crossings and indicates the placing of pilot modules at the borders. The Consultant therefore assumes the development of systems is intended to focus on border-related activities. Clearly, it will be important to define the proposed functionalities with Tacis and the recipient Customs during the Inception Visit and to confirm that all countries covered have the same functional requirements. However, this proposal has been based upon the requirement to develop a border transit system.

The TOR indicates that the Consultant is not required to provide the interfaces (4.1.1.8) and significant progress has been made in most countries in relation to the development of IT systems that collect and collate declaration data. It is unlikely that these systems are fully compatible with each other, as they have been developed using different methodologies and approaches. The Consultant therefore will be reliant on the Consultative Committees being able to resolve any potential compatibility issues.

The Consultant has based this proposal upon Customs in each country providing detailed information on their current IT systems and strategies. This is critical in identifying the current level of use of IT, addressing compatibility issues and to undertaking the IT Strategy Task (4.1.1.7).

3.4.2 Module B

In 4.2.3.2 the TOR requires that all equipment supplied by the Consultant should be handed over to Uzavtoyol on completion of the project. The Consultant understands this clause to refer to only to office equipment provided in connection with Module B, such as computers, etc. The Consultant will provide specialised survey equipment for the specialists in Phase 1 as required, but these will remain the property of the Consultant. It is recognised that some specialist equipment may be required for Phase 2 but this would be the subject of a separate budget as indicated above.

Phase 2 tasks will only commence upon acceptance of the recommendations of the feasibility report in Phase 1, and the additional funding required by the Consultant for Phase 2 activities. Phase 2 tasks are not part of the Consultant's current financial proposal.

3.5 Current Border Situation

The Consultant is familiar with and has visited and undertaken inspections at each of the nine border crossings in the five countries:

- | | | | |
|---|--------------|-----------------|--|
| ▪ | Kazakhstan | Korday | Almaty - Bishkek road crossing |
| ▪ | Kyrgyzstan | Akzhol | Bishkek – Alamy road –crossing |
| ▪ | Turkmenistan | Turkmenbashi | Facility in ferry terminal |
| ▪ | Turkmenistan | Farap | interfaces with Alat (Uzbekistan) |
| ▪ | Uzbekistan | Alat | interfaces with Farap (Turkmenistan) |
| ▪ | Uzbekistan | Farhoed-Bekabad | interfaces with Platinum (Tadjikistan) |
| ▪ | Tadjikistan | Platinum | interfaces with Farhod (Uzbekistan) |
| ▪ | Uzbekistan | Dustlic | interfaces with Dostuk (Kyrgyzstan) |
| ▪ | Kyrgyzstan | Dostuk | interfaces with Dustlic (Uzbekistan) |

Korday



The Korday border post consists of two elements – an administrative office located approximately 100 metres from the border control zone and a mobile office unit in the control zone. The Customs facilities are generally in poor condition and require investment.

Freight traffic is normally processed at the administrative office with the trucks parking on the roadside area opposite the office. The mobile office is essentially a check-point and is



mainly concerned with passenger checks and ensuring that the freight traffic has registered at the administrative office. In terms of enforcement, there is no control infrastructure – canopies, inspection pits – and therefore enforcement controls are reliant on physical checks with the minimal amounts of equipment that are available.

The telephone system is connected to the local system and is considered unreliable, though Customs have access to the police radio system. An additional problem is that often there is no power available late at night – power comes from Kyrgyzstan.

Korday is the Kazakh facility on the Almaty-Bishkek road being funded by the ADB. The ADB insisted on removal of intermediate check-points between Korday and Almaty and the intermediate Customs control point has now been closed. This places greater responsibility on Korday for its transit control function.

The delays at this border crossing are relatively small given that it is between two Customs Union members (with Russia, Belarus and Tadjikistan) and that most of the international trucks entering Kazakhstan tend to be units returning empty from Bishkek.

Akzhol



The Akzhol border crossing has been the subject of an investment programme with French aid funding in 1996. As a result, there is a modern purpose built office facility and enforcement infrastructure – overhead canopies, inspection pits and inspection platforms.

Most international traffic entering Kyrgyzstan checks in at Akzhol and is then conveyed to the TIR clearance facility, approximately 12 kms away, for entry processing. A similar procedure applies to export traffic, though volumes are small. Bilateral traffic usually does not require conveying and is either cleared at the border or allowed to proceed directly to the nominated point of discharge.

The border crossing is well equipped in terms of facilities and has sufficient enforcement equipment, though lacks drug detection kits. The communication system is based on radio communication both with Bishkek and the TIR terminal but this is not always reliable. Power supply is also a problem, especially in winter.

Under the original ADB proposals it was intended that the police post 200 metres away would be incorporated into the new border activity so as to limit the number of control stops.

Delays at the border are relatively short, as there is minimal processing activity undertaken at Akzhol due to the conveying system. The main cause of delays tends to be awaiting the formation of these convoys. Longer delays are often incurred in the final clearance process at the TIR facility.



Turkmenbashi

The Turkmenbashi border crossing is unique among the nine selected crossings in that it predominantly concerned with rail traffic. It is located at the ferry terminal handling traffic to and from Baku on the rail ferry. The through TRACECA traffic is almost all on rail.



The ferry also handles road traffic but this is almost all traffic between Azerbaijan and Russia that travels up the eastern side of the Caspian in order to avoid the problems with Chechnya / Dagestan etc. The TRACECA road traffic mainly enters Turkmenistan at the Iranian borders to the east. The main road traffic on the ferry is agricultural produce eastbound and building materials westbound.

Proposals were to develop a new Customs building further from the end of the ramps as its location resulted in congestion in relation to clearance of westbound traffic, eastbound traffic often being cleared whilst still on-board the ferry.

There is minimal access to enforcement equipment and therefore control is reliant on physical checking procedures. The telephone connection is not considered to be of sufficient reliability for IT connections, though power is not a problem as it is linked to the central port system.

The Consultant already has a resident team based in Turkmenbashi in connection with its ongoing EBRD project Institutional Development for Turkmenbashi Port.

Farap

Farap is the largest road border crossing in Turkmenistan and is located just to the north of the Amu-Darya River. The major problem at this border is the pontoon bridge across the river. This is a tolled crossing that is closed at night. The result is that the morning traffic arrives in 'bunches' resulting in long processing delays as all vehicles are arriving at the same time.



An additional problem was the processing delays at the interfacing border at Alat that resulted in traffic backing-up through Farap during the development of Alat, thus trucks could not get forward to a point where they could undertake export processing. This problem has largely been resolved due to the overall reduction in traffic levels and improvements in processing at Alat now it is in fully commissioned.

The post is equipped with some control equipment, some of which was provided under a previous Tacis project (drug kits). However, there is insufficient enforcement equipment and it is often not used to optimal effect. There is no telephone link and the post is therefore reliant on radio for the connection to Chardzhou. The power supply is considered to be reliable.

Alat



The impressive new Alat border post was completed in 1996 as part of the substantial investment programme being undertaken by Uzbekistan Customs. The facility consists of a large Border Control Zone compound with inward and outward processing lanes and a central processing / administration building.

As part of the investment, Customs have been provided with both enforcement equipment and computers. However, these are not considered to be sufficient to meet all their future requirements, especially when traffic levels increase.

The telephone connection to the regional centre at Buchara is adequate but is not considered to be of sufficient quality to provide a live IT link. Power supply is adequate with back-up generators having been provided.

This border crossing had been subject to significant delays in the past, particularly when the facility was under construction. The procedures in Uzbekistan tend to be more comprehensive than in some neighbouring countries and therefore processing times are usually longer. The combination of the new facilities, extra equipment and reduced traffic levels has resulted in a significant reduction in transit delays.

Farhoad-Bekabad

The Farhoad-Bekabad crossing is the main entry point from Uzbekistan to the Khodjent region of northern Tadjikistan and through to eastern Uzbekistan (Fergana Valley) and to Osh (Kyrgyzstan). The post consists of an office block located on an adjacent hillside with the processing taking place beneath a flyover.



The post has had to be repositioned due to concerns relating to vehicles destined for the adjacent crossing at Platinum having to wait on the road that formed part of a dam wall. Queuing was resulting in possible structural overloading.

This border post does not have a telephone connection, being reliant on radio links. Computers are present but with no connection to the regional headquarters. The power supply is understood to be reliable. There is no enforcement equipment available at this crossing.

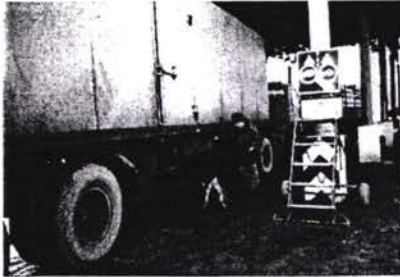
Platinum

This border crossing is the main entry point into the Khodjent region. In addition to transit traffic through to the Fergana Valley and Osh, it also processes domestic traffic from southern Tadjikistan when the mountain passes are closed. Thus, it has a multiplicity of processing functions.



The infrastructure is adequate, though in need of refurbishment. The facility has both radio and telephone connections, though it is doubtful whether these are of sufficient quality for IT needs. Power is considered to be adequate and reliable. There is no enforcement equipment provided.

Dustlic



Dustlic is the main border post for traffic between Uzbekistan and southern Kyrgyzstan (Osh). Uzbek Customs have recently completed the construction of new facilities, building having been suspended for a number of years. The development includes the provision of a warehouse to the rear of the new offices.

The offices have been fitted out and include computers. There are both adequate telephone connections and power, but both are subject to problems especially in windy conditions. There are radio links to the other smaller border crossings in the area. Limited enforcement equipment is provided, though not used.

Dostuk

This is the key crossing into southern Kyrgyzstan near Osh and handles not only international traffic but also domestic traffic from northern Kyrgyzstan that has to pass through sections of Uzbekistan. More importantly in strategic terms is the link through to the border crossing with China at Irkeshtan. This route is seen of importance not only to Kyrgyzstan and Uzbekistan but also as a potential through route from the Middle East and southern Europe as opposed to the longer northern route through Khorgus (Kazakhstan).



The infrastructure is of a temporary nature with 2 offices and a separate rest room. New facilities are urgently required. There is no telecommunications equipment and contact with Osh is via a radio link that is not highly reliable. There are no computers or enforcement equipment, despite this crossing having been identified as high risk in relation to the movement of drugs. The power supply is also considered to be poor.

Borders Summary

The above provides an initial evaluation of the current situation that will be up-dated as a result of the more detailed assessment visits at the start of the project. The key features of the current situation are as follows:

- Only Uzbekistan has undertaken major investment in its border facilities. Infrastructure may constrain the potential to introduce local IT networks
- Except in Uzbekistan, there are limited numbers of computers at the border posts but there are no on-line connections and they are usually not networked
- Communications and power are a problem at many of the posts



- There is insufficient enforcement equipment at most posts and, in some cases, where enforcement equipment is provided, it is not used.

The Terms of Reference indicated two border crossings on the corridor in the Fergana Valley (the route being addressed in Module B):

- Uzbekistan/Kyrgyzstan Dostlic/Dostuk
- Uzbekistan/Tadjikistan Farhoad-Bekabad/Platinum

It is noted that no provision has been made for the exit crossing from the Khojent Region into the Fergana Valley, presumably at Patar / Ravot. In order to make the corridor effective it may be necessary to consider inclusion of an extra crossing.

3.6 Current IT Situation

As indicated in the TOR, the overall objective is to facilitate trade by enhancing transits through the border with inland clearance, rather than undertaking such activities at the border. In the context of TRACECA, transit traffic is particularly important in many of the member states. The likely functionalities of such a border control system would be to register the entry and exit of vehicles and cargo in transit either across national territories or to/from nominated internal clearance points. If this is linked to the current internal clearance systems and other borders, then this will provide an elementary tracking system and consequently improve internal controls.



This system would enable Customs to be more pro-active in that for an import the shipment and its conveyance would be logged in at the border and the information transmitted to the proposed point of delivery such that it was expected, and vice versa in the case of exports. There are a number of options as to whether the cargo declarations are made in advance and transmitted to the border, similar to a pre-entry system, or whether the declaration is to be actually presented and entered at the border.

The amount of data to be entered will depend on a number of factors but could vary from full declaration details, as at present, or a simplified format such as the data normally present on a TIR Carnet, thus reducing keying-in times.

A key issue may be the ability to send such data automatically to the adjacent border post, since all the countries use identical declaration format. This would eliminate the current duplication of generation of declarations in each country in relation to transit traffic. This transmission could be either direct or via the central Customs in each country. Given the communication problems and time constraints, the former methodology appears more logical.

A potential difficulty could be a conflict of interest in Kazakhstan in that it is understood that the Accept contract may include full provision of IT systems at the border. The Consultant has recently visited the Khorgus border post and a full IT system has been installed and is in operation. It will be necessary to assess whether it meets the aspirations of this Tacis project and, if not, how such interfacing could be undertaken.



The overall level of computerisation within Customs in the Central Asian Republics is low. Uzbekistan is probably the most advanced, though significant investment has also been undertaken in Kazakhstan. Both Kyrgyzstan and Turkmenistan have lower use of IT in an operational context. All systems have been principally designed and are focussed on the provision of statistical information, mainly for dissemination to other Ministries - trade statistics, revenue collection, etc.

None of the Customs Authorities have yet installed an Automated Customs Clearance System (ACCS) with an import and export processing capability including declaration, inspection, examination and transit modules. Therefore, the automation so far has not had a direct impact in improving the performance or capability of operational officers to speed-up clearances or led to a reduction in the direct Customs-Trader interface.

The TOR indicates the contents and proposals of the TRACECA Trade Facilitation study that contained a Computer Systems Report. However, the basis of that report was the situation in 1996 and significant progress has been achieved in relation to computerisation within Customs in the Region since that date. As a consequence, this Project may need to be adjusted based on these subsequent changes and how they might affect the project objectives.

There have been attempts to develop such sophisticated ACCS, particularly in Uzbekistan and Kazakhstan, but neither of these programmes has yet to achieve international standards. Whilst these systems presently collect and file data on Customs Declarations, similar to that of the Russian system, they lack a comprehensive processing function.

3.6.1 Current IT Problems

A key problem for all of the Customs administrations has been IT staff retention. Whilst within Customs there is usually a basic understanding of how to use computers, there is a shortage of professional IT personnel with analysing and programming skills. This limits the development of in-house systems and causes major problems when programme developers leave. The Customs pay scales are often insufficient to attract or retain skilled IT personnel when compared to the private sector or international companies operating in the region.

The communication systems throughout the region remain poor by international standards, though there have been significant improvements in recent years. The major problem is communication with border posts. This is either due to mountainous terrain, particularly in Kyrgyzstan, and/or the remoteness of many the border facilities. Few of the border posts are close to a major conurbation and the more distant posts often lack electricity. Some investment in satellite links has been made at some of the main border posts, particularly in Kazakhstan and Uzbekistan, but communication with the second level of posts still remains difficult.

An additional problem is communication between the regional customs facilities and the Central Customs. This limits the interface between the regional and central customs organisation and delays the submission of information required for statistical purposes. With the growing demand for computerisation of Customs activities, these communication problems could inhibit the ability to develop the networks required for such systems on a



nationwide basis. Whilst significant progress has been achieved, the telephone systems are often not sufficiently robust for on-line networking purposes.

3.6.2 Kazakhstan

Kazakhstan has invested over \$20 million in development of Customs computerisation systems. The Ministry of State Revenue and the State Customs Committee engaged Accept Corporation in 1997 to develop the United Automated Information System (UAIS) on a Build Operate and Transfer basis (BOT). To finance the programme Accept were given exclusive rights to prepare all Customs Declarations and charge \$56 per entry as a method of funding the system.

Under the agreement Accept were to supply and install the following:

- 77 Local Area Networks (LAN)
- 77 Servers
- 1680 computer workstations
- 400 workstations for broker networks – DTI
- 108 satellite ground stations
- 62 radio bridges

There have been problems with this BOT scheme and the exclusivity was withdrawn in September 1999 and over 50 brokers are now authorised to prepare declarations electronically. Problems have also been incurred in respect of the development of the UAIS and its 21 sub-systems being developed by the Accept sub-contractor Server.

In respect of this project the following situation is considered relevant:

- A computerised system has been developed that involves the creation of a communication network in which declaration data is sent daily to the centre in Almaty via local and regional offices
- Accept have delivered a significant proportion of its hardware and some borders already have both computers and satellite communication systems
- Technical specialist have concerns as to whether the UAIS can be developed into a full processing system to international standard

Clearly the Consultant will need to examine current progress and assess whether the existing system meets the objectives of the proposed project and if not how could such a control system interface with the UAIS. In addition, it will be necessary to assess the contractual relationship between Customs and Accept and whether there is potential duplication.

3.6.3 Uzbekistan

From work currently being carried out in Uzbekistan, the Consultant is aware that the current computer system is designed and managed by Customs based on a network. The detail of this



network has not been disclosed but is understood to be using 286 and 486 PCs on software designed by Uzbek Customs.

The International Road Transport Union (IRU) have installed a server to transmit SafeTIR data at Central Customs in Tashkent, and a telephone line will be installed at the National Guaranteeing Association (AIRCUIZ) in Tashkent to transmit data for SafeTIR, for AIRCUIZ to send to IRU in Geneva. Customs have tried to devise software to transmit this data in Cute format but are having problems. They have requested an assistance visit from an IRU technician.

Computers have also been installed at borders but these are mainly used for statistical and MIS purposes. To date, it is understood that no processing or border control systems have been developed.

Uzbekistan, in particular, has indicated that it wishes to develop a border transit system that provides a tracking mechanism for international traffic transiting across the country of proceeding from the border to inland clearance points. This is to improve the internal control mechanisms.

3.6.4 Kyrgyzstan

Customs in Kyrgyzstan have over 100 PCs in operation. Though all have Windows 95, the application programmes are in DOS and run a statistical system using Clipper Edit as the application software. Computers at field offices are used for data entry declaration of imports and exports and at the end of the month these are downloaded to diskette and sent to headquarters for consolidation in the central database.

The statistical system was developed in 1993-4 but the software has not yet been modified to take account of all the changes in Customs procedures. There are concerns over the reliability of the hardware and communications is a particular problem. As in Kazakhstan there are doubts as to whether this can be developed into a full ACCS.

Kyrgyzstan considered the SOFIX system as part of a French assistance package but unfortunately this did not materialise, though some border facilities were constructed under that assistance programme. They are currently evaluating the Russian IT system, though as indicated this does not have a full ACCS functionality.

3.6.5 Turkmenistan

Turkmenistan also considered installation of the SOFIX system with French assistance but again this did not take place. From work currently being carried out in Turkmenistan, the Consultant is aware that Customs are seeking to establish computer links to all of their 16 border crossings and have some regional servers that record all information on a central server in Ashgabat. In total there are some 50 computers, but many are old 286's. The network system is based on limited modems using telephone links to the main centres. Many smaller Customs offices send data to Ashgabat by disk, once or twice a week, by car.



There have been discussions regarding a “Sybase” system, but this proved to be too expensive and the idea was dropped. Previous TRACECA projects have recommended a serious look at ASYCUDA, but this was viewed by Customs as being too unsophisticated.

3.7 Current Road Situation in Uzbekistan

Uzbekistan plans to upgrade the TRACECA roads on its territory and develop the transport sector in recognition of the land locked nature of the region and the need to establish efficient trade routes to international markets. The condition of the Uzbek road network is considered to be unsatisfactory. Whilst initially constructed to a high standard, due to inadequate maintenance caused mainly by fiscal constraints, the network has deteriorated and results in low average transit speeds, thus raising transport costs.



There is about 43,500 km of main public roads in Uzbekistan, all under the responsibility of Uzavtoyul, of which 96 percent are paved. About 22,000 km of these roads are classified as international and republican roads and are generally in categories I to III. The rest are regional (viloyat) and district roads, mostly in categories IV and V. There are also some 95,000 km of other roads including minor highways (35,450 km), agricultural roads, urban public roads, industrial roads and feeder roads.

In many cases the condition of the road is satisfactory and it is clear that some maintenance of heavily trafficked roads is taking place. There are exceptions however, but those roads observed by the Consultant to be seriously in need of maintenance generally carry very little traffic. Even some lightly used roads are in adequate good condition, perhaps because of the low traffic levels.



B4 METHODOLOGY

The Project Methodology will be discussed with reference to each of the Project Modules. The Consultant's standard methodology used for this type of technical assistance is to divide the project into a number of specific, sequenced tasks. This enables both the Recipients and the Task Manager to have a clear picture of progress achieved at any point within the 2-year project. It therefore provides project transparency.

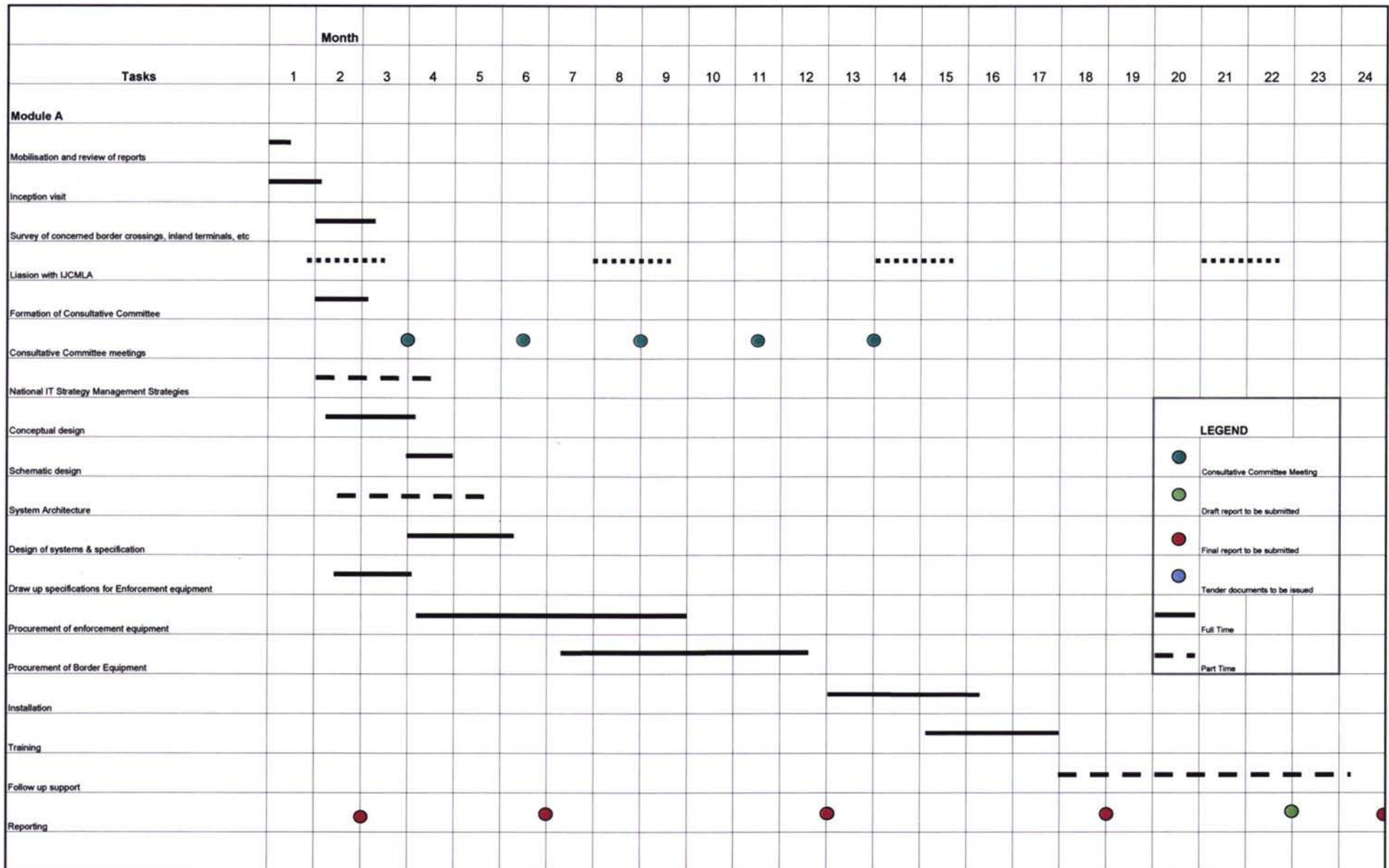
4.1 Module A

The tasks proposed within this methodology for Module A are:

- Mobilisation
- Review of Reports
- Inception Visit
- Border Surveys
- Liaison with IJCMLA
- Project Consultative Committee
- Conceptual Design
- IT Strategy
- Schematic Design
- System Architecture
- Equipment Selection
- Procurement
- Installation
- Follow-up Support
- Reporting

These tasks are shown graphically on the workplan for Module A in Figure 1 on the following page.

Figure 1: Moduel A Workplan





Task 1 Mobilisation

The Consultant will mobilise his specialist Project Team on signature of the contract with Tacis. They will already have been placed on stand-by when indications have been provided as to the award of the project. This will enable the Team Leader and his specialists to proceed to the Region within 14 days to re-establish initial contact with the State Customs Committees, Ministries of Transport and other relevant organisations in all five countries.

Task 2 Review of Previous Reports

The Project Team will review all previous reports that are relevant to this project. These are expected to include the following which were undertaken by members of the project team:

- TRACECA Trade Facilitation, Customs Procedures and Freight Forwarding Project
- TRACECA International Road Transport Transit Facilitation
- ADB Cross Border Framework Agreement
- ADB Proposals for Customs Reform Programme

All of these reports contain information regarding either Border Post requirements and/or use of IT within the Customs environment in Central Asia.

In addition, the Consultant has access to the following additional reports which have information relating to IT aspects and their usage:

- Tacis ERMIS Study of Computerisation in the CIS
- IMF Customs Reform Reports and Programmes for Kazakhstan and Kyrgyzstan

The Consultant will also review the advisory and training work sponsored by WTO and WCO. Kyrgyzstan is already a member of WTO and is undertaking post-accession work on its legislation. The other countries are all understood to be in the application stages. WCO is particularly relevant, as Uzbekistan is a member of the central committee. In addition, consideration may need to be given to the proposed application of the Kyoto Convention in all recipient states within the next few years. The Consultant will also undertake a search of other relevant reports provided by other IFIs active in the region ADB, USAID, UNDP, etc.

The Consultant will request access from national Customs Committees to any internal or external reports relating to their existing use of IT technology, proposed long, medium and short term strategies and identified constraints. The Consultant appreciates the sensitivity of such reports and will ensure their confidentiality.

The initial document review will be undertaken on contract signature prior to the Inception visit to ensure that the Team is familiar with both the previous work undertaken by Tacis and the current situation, particularly in relation to the nominated border crossings and scope of existing Customs IT. The rest of the review will be undertaken on-site during the Inception visit.



Task 3 Inception Visit

Contact will be re-established with the major freight forwarders, partially through the national Freight Forwarding Associations that the Consultant helped to establish under a previous Tacis project, licensed declarants and the Road Transport Associations with whom the Consultant is presently working. The objective is to establish a linkage between the Customs as the 'service provider' and the trade and transport sector who are the 'service user'. Initial interviews will be conducted during the Inception visits but this process will be maintained throughout the project.

Regular contact is already in operation with the EuroCustoms representative based in Almaty and this will continue with his successor under their new contract due to commence in 2001.

Task 4 Border Surveys

A survey will be undertaken of all the 9 nominated border posts and major inland clearance centres (up to a maximum of 2 per country). This will be performed by the Team Leader, who is a border operations specialist, and the Customs Expert.

The Survey will up-date the border information provided in the TRACECA Trade Facilitation project but will also specifically focus on availability of control equipment as well as on IT, communication and power usage/reliability. The Consultant has undertaken similar border surveys as part of the Tacis Border Crossings Programme.

The principle objectives of the survey will be as follows:

- To identify the enforcement equipment needs
- To assess the requirements necessary to establish an integrated transit control system

The Consultant recognises the extended lead times incurred using the Tacis procurement system (see Task 12). It is therefore important to identify the procurement needs and specifications at the earliest possible stage. However, it is recognised that the IT-related specification will not be available until the system and design specification work has been completed (latest by month 6). It is therefore proposed to divide the procurement into two packages:

- Enforcement equipment
- IT Equipment – Hardware, software, support equipment

This strategy will enable the procurement of urgently needed enforcement equipment to be provided at an earlier stage than would be possible with a combined package.

The scope of the enforcement equipment will be focussed on the Customs but should also consider other enforcement agencies, such as Border Guards in relation to immigration procedures and possibly even the Traffic Police. The reason for their possible inclusion is that the objective of the Module is to facilitate border transits to reduce transports costs and thus



encourage trade. It is therefore important that improvements in one area, Customs, are not negated by delays in the other processing activities.

The IT element of the survey will identify the presence of any computers and their current role. However, it will also be important to collect data on the external supplies that will effect development of potential border controls systems:

- Power supply - voltage, source, fluctuation levels, reliability etc.
- Telecommunications – landline/satellite, reliability, technical specification of lines etc.

The results of the survey will indicate the current situation and result in a preliminary identification of possible quantities of equipment and details of the expected specifications. The final specification and hardware/software requirements will only be finalised at a later stage after system design in Task 9.

Task 5 Liaison with IJCMLA

The Consultant will maintain contact with the Intergovernmental Joint Committee for the Implementation of the TRACECA Multi-Lateral Agreement (IJCMLA), both via the central office in Baku and the national representatives in the five countries. This is to ensure that they are aware of progress being achieved and can assist if necessary, particularly in respect of political issues.

In addition, the Consultant will send a Delegate to each of the four ICJMLA meetings taking place during the project to present and promote technical and administrative standards for Customs. The Consultant will contact the Secretariat in advance to identify the strategic or technical nature of the required presentation in order to ensure that the Delegate has the appropriate knowledge in respect of the proposed discussions.

In addition to the liaison with the IJCMLA, the Consultant will maintain regular contact with the ADB resident offices in Astana and Bishkek in relation to development of equipment and IT in relation to the Customs control posts at the border on the Almaty-Bishkek road. In view of the ADB's proposed Customs Reform Programme having some possible overlap, the Consultant recommends that the ADDB also be provided with briefings as appropriate in addition to the formal reports indicated in Task 15.

Task 6 Establishment and Participation in Project Consultative Committee

The Consultant will form a consultative committee of experts from each country to consider the compatibility issues relating development of IT systems. Whilst there will be political and strategic aspects, it is envisaged that this would be predominantly a technical committee and therefore the nominated delegate should either be the head of the IT Department or be knowledgeable in IT matters in relation to his own Customs organisation.

It is proposed that invitations will be issued to representatives of the IFIs and the transport and forwarding sectors to keep them advised of progress and to obtain their input. However, it is not anticipated that they will attend the more technical sessions.



The Consultant will act as a facilitator to ensure an exchange of views involving all parties and to promote a consensus on the technical issues, such as data formats, architecture, transit systems, etc.

It is intended that the Committee will meet a least 5 times, once in each country, as a minimum and these will be on a rotation basis in respect of venue. In addition, representatives will also be encouraged to meet on a bi-lateral basis in addition to the formal committee meetings. Whilst the Consultant will be unable to provide funding to support these additional meetings, contact can perhaps be maintained either through formal meetings or through conference telephone calls or use of internet web sites.

Task 7 Conceptual Design

The Consultants IT Specialists will develop and propose a draft conceptual design of a flexible regionally integrated modular border control system based on discussions with IT specialist in all five countries. These proposals will be presented at a consultative committee workshop during Month 3 with a view to agreeing the basis so as to allow system design to commence without delay. Clearly, the project timescale will be affected should there be any delays in conceptual agreement and therefore it is critical that the members of the committee have the necessary authority to either agree the conceptual design or can revert quickly following discussions with their respective Customs organisation.

The Consultant's IT experts are familiar with the contents of the 1996 TRACECA Project Computers Systems Report but, as indicated in Section 3.6, there have been significant changes since 1996 when that work was undertaken, especially in Kazakhstan and Uzbekistan. The conceptual design should therefore not be restricted by that report's recommendations but should reflect current needs bearing in mind the basis of those proposals.

The scope of the conceptual design should include but not be restricted to the following:

- Functionalities of the modules
- Hardware and software
- EDI interfaces
- Computer and national languages
- System security

The Consultant will define the advantages of developing the system in qualitative terms either in benefits or results or the implications of not proceeding with such a development. It may be possible to provide indicative IRR on the estimated capital expenditure in order to justify the Tacis support.

Task 8 IT Strategy

The Consultant's IT specialists will undertake a structured review of the overall use of computers within each Customs environment, as opposed to the border-only survey in Task



4. The results will be evaluated against the strategies produced by national Customs in Task 2, if they have been developed/produced. In association with each Customs Committee, the Consultant will agree the longer term goals of their IT development within their respective organisations and from this information draw up a draft IT strategy for each organisation to achieve those goals. Given the current differences in automation levels, it is not envisaged that the strategies will be identical but should be sufficiently compatible to allow for possible development of regional data exchange systems at a later date. The strategy should include an Action Plan that defines short, medium and long term targets and the positioning of the proposed project IT modules within that strategy.

It is not expected that the strategy would include any firm proposals with regard to Automated Customs Clearance systems (ACCS), other than in terms of functionality and module content. The Consultant intends to adopt a neutral stance in relation to both international and in-house development of ACCS, especially given the level of commitment to a specific system in Kazakhstan as indicated in Section 3.6. It is not the Consultant's role within this project to propose any specific ACCS or present the advantages or disadvantages of using a particular bespoke system.

Task 9 Schematic Design of Pilot Modules

The Consultant's IT specialists will provide schematic and detailed designs and specifications for common pilot modules at the nine nominated border posts. This will be based on the agreement of the conceptual design in Task 7 and will be progressed with the assistance of the Consultant's local IT specialists, assuming approval from the respective Customs organisation, and in collaboration with the national authorities concerned.

The Consultant proposes that an initial pilot be developed at one of the nominated borders using equipment obtained by the direct purchasing methodology. The advantages of this approach is that the schematic and detailed designs can be tested on-site in an operational environment to identify its performance parameters and to enable modifications to be undertaken prior to extending the system to the other seven locations. It can also be developed earlier without incurring the lead-time associated with the international tendering procedures necessary to enable the full pilot system to be implemented. As noted in section 3.3.2, a small 'project development package' is requested for purchase by direct agreement. Clarification of the need for the proposed direct purchasing of equipment and the establishment of the pilot will be sought during the Inception Phase, with the Tacis Task Manager, Tacis Procurement Department and also within the first Consultative Committee meeting.

The Consultant notes the recommendations of the Trade Facilitation Computer Systems Report indicated within the TOR. The description related specifically to the development of a national ACCS, rather than to a border-based transit control system as implied by Module A. It is not the intention of the Consultant to develop an ACCS. It is to propose a border transit system that is compatible with and could interface with an ACCS so as to provide a regionally-based data exchange capability. The Consultant has not made specific provisions for the development of these interfaces, as it is not possible to quantify the extent of resources required to undertake such work. This is because the details of the existing and proposed



central systems with which the border system would have to interface will not be known until completion of the earlier tasks.

The Consultant will indicate target data entry times per vehicle. The Consultant has knowledge of such processing times achieved at other CIS borders that have similar border procedures and at which computerised border systems have been installed.

A review will be undertaken of the other checks and operations undertaken within the border control zone in order to assess whether potential exists for data exchange between the various organisations to speed-up the overall transit times. The problems identified at other CIS borders have been that the potential tends to be limited due to the different data requirements of the various organisations and concerns by Customs over external access to their dedicated secure IT systems.

The Consultant will liaise with the IT personnel within each Customs organisation on the hardware and software to be supplied by the project for implementation of the pilot module. Whilst it is accepted that this will depend on their present hardware and commitment to software systems, the project should be encouraging standardisation wherever possible. As noted in section 3.3.1, it is envisaged that the systems to be developed will not be bespoke, but will comprise of off-the-shelf packages currently in use internationally.

Confirmation of the acceptability of this approach will be sought during the Inception Phase, with the Tacis Task Manager, Customs administrations and also within the first Consultative Committee meeting.

Task 10 System Architecture

The Consultant will propose the systems architecture both at local and national level.

The architecture at the local level relates to the positioning of units within the border control zone. Whilst the suggested system in the TOR is at the entry and exit points, this proposal will need to be reviewed, as indicated in Section 3.3.1. Initial indications are that it should be located at the document processing points, wherever they are located. The design of the border facilities and the location of these processing points vary significantly and it is expected that the architecture at each location may therefore differ. However, the principle of a server and networked workstations appears probable.

The architecture at national level is expected to be based on a border to regional headquarters data interchange, and from regional headquarters to Central Customs (or a central processing point). The Consultant will examine the logic of this strategy and how it can be implemented. In addition, consideration should be given as to whether the system should use a live on-line approach or a batch transfer system. This may depend on demand, cost and reliability of the communication system. For example, if satellite communication systems are required, batch transfer will be the only realistic option.

The Consultant will also consider the issue of inter-regional data transfers between the national Central Customs and/or between interfacing border posts. It is known that international communications between countries can be difficult and are occasionally subject



to suspension for payment reasons. This affects the reliability of the systems architecture and some mitigation options may need to be considered. The linkage between interfacing posts is particularly important to avoid entry duplication and to allow for the future possibility of joint processing methodologies to be considered.

Task 11 Equipment Selection

The equipment selection consists of two elements:

- IT equipment (hardware and software) and support equipment (communications, power etc.)
- Enforcement equipment

The IT-related equipment will have been defined in Task 9. This indicates that the equipment selection is unlikely to be confirmed until the end of Month 6 on completion of the system design and specification.

The enforcement equipment will be defined as a result of the border surveys in Task 4 and should be completed by Month 3. Whilst the TOR indicates the most likely equipment to be supplied, the equipment selection will be based on specific identified needs and be limited to supply to the nine nominated border facilities only. Based on previous studies, the anticipated requests for weigh-bridges and vehicle x-ray machines are unlikely to be supported due to cost and justification factors. The Consultant will also review the usage of equipment provided under previous programmes in determining new requirements.

The proposed equipment will be fully discussed and agreed with the recipients in each country.

Task 12 Procurement

It is proposed, subject to the Task Manager's agreement, to divide the procurement into three separate packages:

- Enforcement equipment
- IT Development
- Pilot IT equipment

This is based on the anticipated timings and needs of the different project elements. The enforcement and IT equipment are expected to involve different types of suppliers and whilst will both be sourced through international tender, may come from different sources, with enforcement equipment being supplied principally from the EU and IT equipment being supplied nationally by a local agent of an international supplier, due to maintenance guarantees, etc.

The Consultant is fully conversant with the current Tacis Procurement system and is presently supplying equipment to Customs in the Central Asian region. The international tendering methodology involves significant lead times and therefore it is essential to commence the process as soon as possible to ensure that the benefits of the supply can be available at the earliest opportunity. As indicated, the specification for the enforcement



equipment can be provided following Month 3, whereas the IT equipment specification is unlikely to be available before Month 6. This again suggests separating the equipment packages.

It is essential to have the appropriate equipment available in region for the system design and testing process. This should not be delayed until the award of the international tender. As noted in section 3.3.2, a small 'project development package' is requested for purchase by direct agreement. Clarification of the need for the proposed direct purchasing of equipment and the establishment of the pilot will be sought during the Inception Phase, with the Tacis Task Manager, Tacis Procurement Department and also within the first Consultative Committee meeting.

The standard international tendering procedures will be adopted as follows:

- Agreement of Specification
- Preparation of Tacis Tender Documentation
- Publication of Tender in EU Official Journal and national gazettes in each country
- Issue Tender Documentation to contractors
- Complete Tacis Tender Evaluation procedure
- Award Tender(s)
- Prepare Contract Documentation
- Oversee Supply
- Administer warranty period for equipment

The procedures will be undertaken in association with both the Task Manager and the Tacis Procurement Unit as on previous projects.

The Consultant's own in-house procurement capability is based on extensive experience of procurement in relation to technical assistance projects. The members of that unit are familiar with Tacis procedures, have undertaken Tacis procurements in the Central Asian region and have been providing procurement training in region to the Ministries of Transport.

The procurement of specific software for the project will be addressed in Task 9 and will take into account the results of Task 8. As noted in section 3.3.1, it is envisaged that the systems to be developed will not be bespoke, but will comprise of off-the-shelf packages currently in use internationally.

Confirmation of the acceptability of this approach will be sought during the Inception Phase, with the Tacis Task Manager, Customs administrations and also within the first Consultative Committee meeting.

Task 13 Installation, Commissioning and Training

The Consultant will oversee the installation of the equipment, commissioning and debugging of the software. This will be undertaken in association with the suppliers, local IT personnel



and the IT staff of the recipient Customs. Checks will be conducted to ensure that all the appropriate documentation, warranties and manuals are provided.

The Consultant will provide training to the beneficiary Customs IT personnel in the application of the system. It is anticipated that they will then act as the trainers to the operating personnel at the borders and regional offices. It is anticipated that some of this may consist of combined training at a single location in order to ensure a co-ordinated approach.

Proposals will be provided in relation to possible remuneration levels to achieve the staff retention levels necessary to support the system. It is recognised that retention of IT personnel is a major problem in some of the countries covered. Any proposals would have to be commensurate with the pay structures within that particular Customs organisation and reflect the specific skills of the personnel.

Proposals will also be provided regarding future on-going training and staffing requirements necessary to ensure the technical sustainability of the system.

Task 14 Follow-up Support

The Consultant will provide follow-on support for 6 months following acceptance of the equipment or final commissioning. This will be undertaken using the Consultant's local IT support team, though IT members of the international team will be available as required.

The Consultant will indicate the rights under the supplier warranties for both the enforcement and IT-related equipment to each Customs administration. In addition, processing indicators will have been established in Tasks 9 and 13. These will be revisited during the support period to ensure that they are being achieved and that the project is resulting in overall reductions in border transit times. An impact assessment will be included within the Final Report.

Task 15 Reports

The reports represent the project milestones and will be provided for Module A according to the provision of the TOR.

The Reports will be in standard Tacis reporting format with the additional information indicated above being contained in Appendixes. The Consultant has noted the reporting requirements as set out in the TOR and will comply unless the circulation is altered. The Consultant may discuss alternatives with the Task Manager based on existing projects that suggest that:

- The role of the Tacis CUs has changed in relation to regional programmes. As a result they may not require as many copies
- Some CUs have expressed a preference for less copies but a diskette (rather than a CD)
- The European Delegation has extended its role and probably should be included within the circulation
- A TRACECA Co-ordination Office may be opened in Tashkent during the project timeframe.



It is noted that the reporting requirements under Module B contain similar timings, though additional contents. The Consultant will discuss with the Task Manager the possibility of combining the reports in relation to the standard Tacis elements of the reports and issue the technical reports either separately or as additional Appendixes.

Copies of all reports will be in PDF–Acrobat Reader electronic format in order that they can be placed on the TRACECA website.

In addition, it is proposed to provide Briefing Notes to the Task Manager as appropriate. The Project Co-ordinator will be responsible for regular liaison between the Consultant and the Tacis Task Manager. The Team Leader and the Project Co-ordinator will establish contact with the Tacis Monitoring team and the local TRACECA monitors in each country. The Consultant appreciates the need to maintain good contact with the monitoring team to ensure that they are fully aware of the work being undertaken.

4.2 Module B

The Module B assignment is to be carried out in two Phases. Phase 1 will include data collection together with engineering, economic, environmental and feasibility studies to define the rehabilitation works needed, and presented in a Feasibility Report. The detailed engineering design and preparation of tender documents, together with an estimate of the unit costs for the various types of works identified along the selected road, will be completed in Phase 2. The commencement of Phase 2 is conditional on acceptance by the Client and the EBRD of the recommendations resulting from Phase 1.

Consulting services are specifically required to:

- Determine the rehabilitation works needed through the use of selected surveys to extend the useful life of the road for the most economic number of years, taking the existing traffic forecasts and loads into account.
- Prepare detailed engineering designs and tender documents for the rehabilitation and assist the Uzbek Government in the tendering procedures.

The tasks proposed within this methodology for Module B are:

Phase 1:

- Mobilisation
- Review of pre-feasibility report
- Inception visit
- Traffic data collection
- Road & bridge condition surveys
- Topographical surveys
- Geotechnical surveys



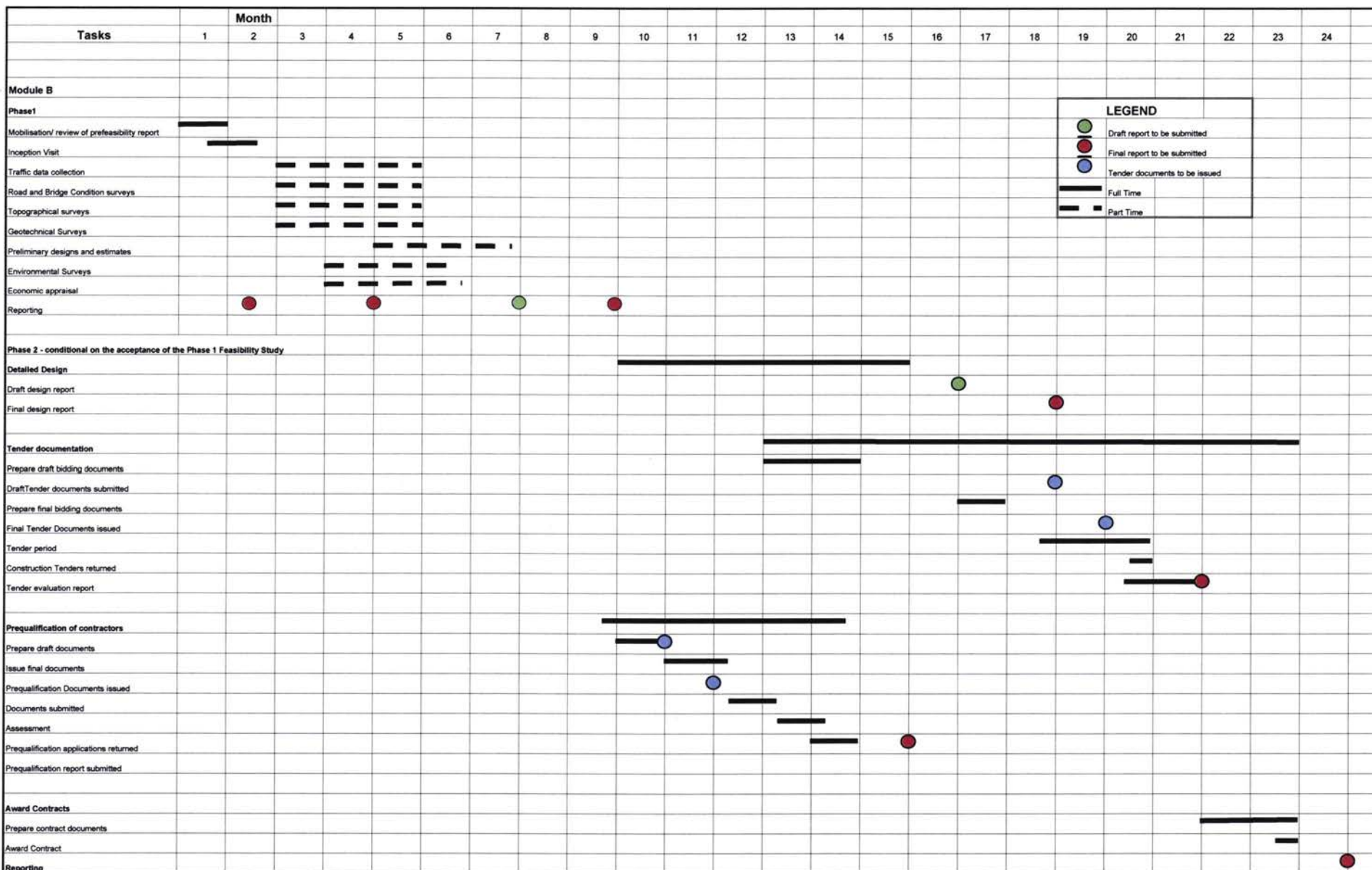
- Preliminary Designs & Estimates
- Environmental investigations
- Economic evaluations
- Reporting

Phase 2 (following acceptance of the recommendations of the Phase 1 feasibility report):

- Detailed engineering design
- Tender documents
- Contractor pre-qualification
- Tender procedures
- Reporting

These tasks are shown graphically on the workplan for Module A in Figure 2 on the following page.

Figure 2: Module B Workplan





4.2.1 Phase 1

Task 1 Mobilisation

The Consultant will mobilise his specialist Project Team on signature of the contract with Tacis. They will already have been placed on stand-by when indications have been provided as to the award of the project. This will enable the Team Leader and his specialists to proceed to the Region within 14 days to re-establish initial contact with the Ministry of Transport, Uzavtoyol and other relevant organisations.

Task 2 Review of pre-feasibility report

A study of the pre-feasibility report, review of the existing information, designs, documentation and current construction standards relating to the selected road will be undertaken at the start of the assignment.

Task 3 Inception visit

Contact will be formally established with the Ministry of Transport and Uzavtoyol following on from the Consultant's visit during the preparation of this proposal.

It is noted from the TOR that the existing data are outdated, the existing designs were made to FSU standards and existing information is partial and fragmented and must be supplemented by much fieldwork. The TOR also state that the data collection in Phase 1 of this module is considered to follow on from that carried out in the pre-feasibility study and it is not intended to repeat any work already undertaken or to change any basic premise. This proposal does not include for additional traffic surveys of any kind. If the Consultant considers that the information available is inadequate to complete economic designs for the rehabilitation works, recommendations will be made to the Client. Any recommendations for additional traffic surveys, including full and detailed particulars, will be presented with the initial findings and actual work plan in the Inception Report. It is noted that the equipment required for road surveys will be handed over to Uzavtoyol on completion of the assignment, as noted in Section 3.4.2.

Task 4 Traffic Data Collection

In the Consultant's view, inaccurate prediction of future traffic and therefore standard axle loads across the pavement design life represents a major project risk. For this reason the project team includes a senior Transport Economist with relevant regional experience who will review and assess the adequacy of all previous traffic data and information from the pre-feasibility study such as:

- Traffic composition and counts including daily variation and average daily traffic
- Traffic forecasts after completion of the works
- General projections of future traffic for the remaining economic life of the road
- Axle load surveys



- Origin-destination studies for the volume of freight and passenger movements
- Determination of maximum practical capacity of bridges in terms of traffic flow
- Existing and potential traffic generation factors in the area served by the road which would include:
 - population growth
 - changes in rural and urban population distribution
 - national and regional economic growth
 - development of industry, agriculture and tourism
 - effect of the road on social services, medical facilities and schools etc.

Should the existing data and information be found to be insufficient or out of date, additional surveys will be recommended and described in the Inception Report. To ensure the safety of the traffic survey teams and road users in the vicinity of the studies it will be important to enlist the support of the relevant authorities, including the Traffic Police, in the area. They will assist in controlling the traffic, explaining the reasons for the temporary disruption and ensuring that the traffic follows the instructions given, particularly in the case of axle load surveys. Traffic signs in accordance with Uzbek or international standards will be erected in the vicinity of the surveys to warn road users of approaching traffic hazards.

The traffic count surveys will be carried out on the selected road sections at a minimum of 2 locations for periods of up to three days at the same locations as the previous studies and using the same vehicle classifications. At certain locations, 24-hour counts will be carried out to identify long distance traffic movements and to develop expansion factors to apply to the survey data.

The existing information on axle loads will be verified by conducting measurements at a minimum of two locations within the study area. The most appropriate site would be selected from an assessment of the results from traffic counts and a review of traffic generating factors in the study area. Axle loads of both laden and un-laden light goods vehicles, medium goods vehicles, heavy goods vehicles and public transport vehicles would be measured. The surveys will be carried out over a period of seven days, including two sixteen hour periods to cover the two daily peak periods.

From the traffic studies an assessment of the different transportation scenarios in the future can be made to produce an economic design for the selected road rehabilitation.

Task 5 Road and Bridge Condition Surveys

At the commencement of the assignment the Team Leader and Pavement Specialist will programme the condition survey for the selected road, including bridges and drainage structures along the route. This work will be carried out under the direction of the Pavement Specialist by teams of local staff from KDTP and an Uzbekistan institute to be contracted with by the Consultant, as discussed in section 1.1.



Short seminars will be held prior to commencing work to ensure that each member fully understands the information to be collected, the format in which it is to be collected and their individual role within the team. Rotation of the teams working on the pavement and the structures will be considered to allow each team member to gain wider experience. Consideration must also be given to the prevailing weather conditions and therefore the timing of this exercise.

Standard road inventory/condition reporting forms, which can be presented in Uzbek and English, will be used to record relevant information. A typical form, which can easily be amended to suit particular circumstances, is attached as an example in Appendix A. For this component, information relating to the inventory of the road will be recorded such as:-

- Pavement type
asphalt / surface dressing / slurry seal / sand seal / concrete
- Condition
cracked / worn / bleeding / stripping / rutted / potholed / edge failure / joint failure / previous repair
- Geometry
width / gradient / alignment / shape / side drain shape and size
- Physical features
embankments / cuttings / verge / shoulder / villages / towns / junctions / rivers / lakes / quarry / borrow area
- Structures
bridge / culvert / wall
- Furniture
defective / missing traffic signs and safety barriers

Particular attention will be given to the condition of the existing drainage systems along the selected road to ensure that the pavement structure is properly drained. This will include the inspection of such installations as:

- Open ditch, concrete lined channel, covered channel, stone channel
- Edge channel, kerb, gully, grating
- Concrete / brick / metal / plastic pipes and culverts
- Manholes, catch-pits, silt traps covers and frames
- System outlet / discharge
- Requirement for new drainage

Defective or inadequate installations will be identified for repair, reconstruction or provision of new drainage in the detailed engineering design.

The Pavement Specialist will examine existing information available on the original design parameters, such as traffic and axle load surveys, pavement strength, road roughness tests and topographic conditions, together with the results of any materials investigations and other relevant data relating to the selected road. Where available, 'as built' drawings, construction records and any materials records will be collected and examined. A deflection survey will also be prepared and supervised along the whole road to assess the strength of the existing pavement. This will be augmented with trial pits and/or bore-holes, particularly wherever there is an obvious change in material or construction, to observe the type and thickness of



the pavement construction and assess the cause or causes of any failures that have occurred. Combined with the condition survey, this information will provide a clear picture of the residual strength of the existing road and an assessment of the rehabilitation works. Typical costs for various construction options can then be estimated for use in the economic analysis.

All existing bridges will be identified and located on the standard reporting forms during the road condition survey. The survey and assessment of the bridges will be greatly assisted by any existing design, construction, maintenance or strengthening details which may be available. The local Bridge Specialist will conduct a search for such information and drawings prior to the arrival of the international specialist. A brief appreciation of each bridge will then be available at the commencement of the assignment. Both specialists will visit each bridge site in turn to carry out a detailed inspection of each structure. Inventory and condition survey data will be recorded on pre-printed forms. The information recorded is likely to include:

- Bridge number, name, maintenance authority, road, kilometre, road classification, under or over bridge, length, width, type of construction, span lengths, running surface.

The inspection will cover the condition of the features of the structure such as:

- Invert – this may be of concrete or stone pitching and maintained in good condition, not all bridges have inverts.
- Aprons – the extension of the invert examined for signs of scour at the end.
- Foundations – check for any undercut, serious scour must be repaired immediately.
- Cutwater – the lower part of a pier in a multi-span bridge and suffer extremely high rate of wear from debris, grit, etc. in fast flowing water, may also be subject to scour.
- Piers / columns – check for rusting and/or cracks on the surface of concrete that indicates penetration of water to the reinforcement. Check the state of brickwork and stone masonry.
- Abutments / wingwalls – check for cracks, differentiating between shrinkage and movement.
- Embankments – check for cracking due to settlement and that the run on is smooth and well aligned to prevent impacting by vehicular traffic.
- Parapets – are they stable and safe, joints may perish in brick and stonework, may be damaged by vehicular impact, check steel for rusting.
- Bearings – must be free to move, look for splits and distortion in neoprene.
- Expansion joints – sealant can crack, joints can become distorted, and adhesion may be lost. Steel plates must be firmly fixed and not rattle.
- Main beams – is there any rusting of steel and does it need painting. Is rust marking appearance on surface of concrete. Check corrosion of steel end beams built into concrete casing and check web for distortion.
- Waterproofing and drainage – if the soffit is damp this may be seepage through the deck or condensation. Are the gullies in the deck and any drainage from the bearing area functioning.



- Concrete deck – check for cracks, differentiating between shrinkage and structural.

On the basis of this inspection, a schedule of minor repairs and maintenance works at each site will be prepared. The load carrying capacity and residual design life will be assessed. Where it is apparent that further strengthening or reconstruction is necessary the Consultant will include recommendations and preliminary costing in the Feasibility Report. A detailed site investigation, structural assessment, engineering design of remedial / new works with cost estimate will be undertaken during Phase 2 of the assignment should the recommendations of the Phase 1 feasibility report be accepted.

Task 6 Topographical Surveys

During this stage of the assignment, the condition surveys will be related to vehicle trip meter readings checked against information shown on the existing drawings and any other referenced points along the selected road. Representative surveys will be carried out of pavement widths, drainage structures, relevant roadside features and any special geometric characteristics for the purpose of identifying homogeneous sections. Any particular sections of the road considered to be in need of junction or alignment improvements will be identified. This will be sufficient for the preliminary designs and estimates and a basis for more accurate measurements of the pavement and associated drainage structures during the detailed design phase.

Task 7 Geotechnical Surveys

Consideration must be given to the prevailing weather conditions and therefore the timing of this exercise. During the road and bridge condition survey suitable locations along the selected road will be identified for excavating trial holes and drilling bore holes to determine the characteristics of the pavement layers and formation. Suspect areas in the near-side wheel path will receive particular attention. Core samples will show the thickness of each bound layer and the degree of bonding between those layers, the depth of cracking and various physical data relating to the materials. This will include the extent to which the binder has been stripped from the aggregate, the degree of compaction of the bound layers, the presence of detritus between layers suggesting a loss of bond at these interfaces, and the recovery of binder samples for the determination of residual properties. Trial pits will reveal further information, particularly in that if the excavation proceeds carefully one layer at a time, the undisturbed upper surface of each layer can be observed for indications of cracks, deformation and faulty workmanship. In-situ density measurements can be valuable in the case of unbound materials where relative differences may be identified between the wheel track and other areas. It is also possible to examine the contamination of the bottom layer of pavement by the sub-grade. In-situ CBR measurements of the sub-base, capping and sub-grade are also possible, and are to be preferred to laboratory results.

In seeking the cause of failure in an area of pavement the results from failed area will be compared with a control sample of a similar pavement subjected to the same traffic that has not failed. Comparisons generally include, the composition of each layer, the penetration and penetration indices of recovered binder, the degree of compaction, the thickness of each layer and the degree of cracking found. Where no great difference is found from these



investigations of the pavement itself, an obvious conclusion is that the cause lies outside of the pavement, usually in the sub-grade.

During the road and bridge condition survey, embankments and cuttings will be visually examined for signs of instability. Any suspect slopes will be identified for a detailed site investigation, stability analysis and design of remedial measures in Phase 2. In the event of a high slope being identified as potentially unstable and failure will affect the feasibility of the project this will be reported immediately to the Client. If required, a detailed investigation will be undertaken during the feasibility stage. This is not part of the Consultant's proposal and the additional time and resources necessary would need to be agreed with the Client beforehand.

Sources of materials for pavement works, shoulder and embankment works, if required and structural works will be located through a search of local knowledge of previous sources and through a search of geological or other mapping. All reported and possible sources of materials will be examined by site investigations. The Fergana refinery does not currently have the best reputation but it does have the technology and equipment to theoretically produce good quality bitumen. It is therefore considered a potential supplier, but external testing will be necessary by an independent laboratory to demonstrate compliance with international standards. The current quality of the bitumen will be reviewed during Phase 1 and any other sources will be investigated.

The actual location of materials for embankment, pavement layers and concrete for structures, will be determined by a systematic and comprehensive sampling and testing of materials from all potential sources. These areas will then be surveyed to accurately locate and validate the existence of sufficient quantities for construction purposes. Material sources will be selected which minimise adverse effects on the environment and involve in the shortest possible haul distances to reduce costs. Whether or not the materials testing results, the location, extent and estimated available quantities relating to each source, will be shown on the materials plans and tender drawings will be discussed with the Client during Phase 2.

A testing programme for the materials search will be compiled and agreed with the Client. Classification tests will be carried out on site with other testing conducted at an approved laboratory under the direction of the Pavement Specialist. Sources of bitumen for pavement construction will be identified. The testing programme is likely to include the following:

For sub-grade and embankment samples:

- In-situ moisture content
- In-situ density
- Sieve analysis
- Atterberg limits
- Moisture/density relationships
- CBR tests to determine the relationship between in-situ moisture and density conditions, and the sub-grade CBR strength.

For pavement materials sources:



- Sieve analysis
- Atterberg limits
- Moisture/density relationships
- CBR tests to determine CBR values at different levels of compaction
- Soil stabilisation tests, if considered necessary

For rock samples (for crushed stone base, surface dressing stone, bituminous mixtures and concrete aggregate):

- Los Angeles Abrasion
- Aggregate crushing value
- Sodium sulphate soundness
- Flakiness Index
- Bitumen affinity and absorption

The results of the materials investigation will be presented in a Materials Report to be included in the Feasibility Report. It will contain all test results and information on borrow areas and quarries such as location, accessibility, and properties of the materials and availability.

Task 8 Preliminary Designs and Estimates

During the course of the feasibility study, consideration will be given to the types of works required under the proposed works contracts to rehabilitate the selected road. Also, to the relief of any heavily trafficked sections of road by the introduction of a second carriageway, junction improvements and provision of climbing lane(s). The results of the surveys will be analysed to provide alternative rehabilitation strategies for consideration.

Based on the Consultant's experiences in Kazakhstan, Kyrgyzstan and Mongolia, pavement design will be proposed using comparative international and Russian methods. The official method of pavement design in the FSU is a modified theoretical approach based on the theory of elasticity of flexible pavements developed by a number of Soviet researchers under the leadership of Professor Ivanov. With the increase in heavy traffic, wide scale road test experiments were conducted in the 1970's on a number of roads over the entire USSR. These field tests led to the introduction of correction factors and a number of amended formulae and graphs. However, the basis of the flexible pavement theory remained unchanged.

The information collected on the condition of bridges, drainage systems and road furniture would be used to produce preliminary designs and details for remedial measures. Designs will be based on current Uzbek standards for consistency and continuity. Standard drawings and details provided by the Client will be utilised unless they are considered to be unsuitable or capable of improvement. The use of any alternative methods and practices that comply with current internationally accepted standards, particularly to ensure satisfactory performance of the constructed works under climatic conditions in Uzbekistan will also be commented on.



The Team Leader will assess the costs of the various options and prepare unit cost estimates for carrying out the works. The unit costs will be derived from a review of recent priced bids for similar works in Uzbekistan and from other projects in the region being carried out by the Consultant. The present world climate is not conducive to stable market conditions and actual prices obtained in the market may provide a better all-round indication of future bid prices than those derived from basic input pricing. Where prices are not available, unit rates will be calculated from basic cost inputs of plant, labour and materials in the unit rate. These costs will be used by the Transport Economist in the economic evaluations. From the alternative engineering solutions run through the model, preliminary designs will be formulated for a targeted and cost effective rehabilitation programme. The detailed cost estimates for the proposed schemes will include both local and foreign costs and their tax implications.

Task 9 Environmental Investigations

Although the environmental benefits of the rehabilitation of the selected road are expected to be high by improvement in traffic and pedestrian safety, the potential decrease in fuel consumption and the improved and vegetated embankment slopes, there will nonetheless be temporary negative impacts during construction. The aspects that may need to be addressed include:

- Hydrology and hydrogeology matters that would be covered by an assessment of the drainage, run-off and possibilities for associated erosion and pollution
- Geology and soils issues involving erosion resulting from run-off, together with other forms of erosion due to destabilisation of ground or soil conditions
- Air quality – potential receptors will be identified and levels of pollution will be predicted and compared to international standards. This may need to include dust emissions from quarry plant
- Valuable ecological and landscape resources will be identified
- Archaeological, cultural and historic features would be identified and consultations undertaken to identify other potential features
- Socio-economic impacts upon humans and impacts on the environment from the use of the road by humans will be assessed. This may include aspects such as the use of the road for collection of wood and water and for access to grazing areas

In general, the work sequence to be undertaken will be as follows:

- Detailed desk study and information gathering
- Field visits and field work to obtain additional information
- Evaluation of resources and receptors
- Prediction of impacts and their significance
- Proposals for detailed mitigation and enhancement measures, together with estimates of cost, to be finalised in the detailed design and preparation of tender documents

The study will be carried out in accordance with current Uzbek and EBRD guidelines taking into consideration any changes which may be made.



Task 10 Economic Evaluations

Based on a comparative analysis of previous studies and data from the pre-feasibility report, the Consultant will derive estimates of economic vehicle operating costs by the vehicle categories used in the traffic surveys using a model such as the World Bank's HDM. The Consultant is involved in the development of parts of this model and consequently the Consultant's experience in this regard will be of benefit in accurately modelling Uzbek conditions. HDM combines traffic forecasts, vehicle operating costs, pavement deterioration, construction and maintenance costs, environmental mitigation measures to determine the economic rates of return. It is noted that the Terms of Reference require whole life costing. The model will be run for the selected road based on the data collected during the surveys. The Consultant will:

- Collate field survey data in a suitable form for input into the pavement deterioration model including, for each homogeneous section:
 - the percentage area of cracking, ravelling, potholes, and patching
 - depths of rutting, bituminous layers and granular layers
 - CBR
 - mean international roughness index
 - deflection
- Run the pavement deterioration model to test the rate of progression of the various failure modes having due regard to the planned maintenance interventions
- Analyse the results of the traffic surveys and make design year traffic forecasts
- Analyse the gross vehicle weight in each category by reference to axle load data and project the number of equivalent standard axles for road sections
- Analyse vehicle operating costs parameters for each of the categories selected for traffic counts based on a study of all available economic data including the pre-feasibility study
- Analyse speed-flow and speed-roughness relationships and adjust the variable accordingly. It is possible that no clear relationship can be established between speed and traffic volume whilst a very clear relationship exists between speed and roughness. Passenger time savings will also be considered although this may not be a significant factor
- Collate construction and maintenance costs in a form suitable for input to the model
- Run the VOC model using the above input and a discount rate, for the 'with project' and 'without project' cases, for each rehabilitation option studied and for each homogeneous section. The resulting IRR, NPV and NPV/C will then be used to prioritise investments and develop possible contract procurement packages

Sensitivity analyses will be carried out to determine the robustness of the model to changes in base assumptions including traffic forecasts, VOC's, construction costs and delays in implementation. Switching values will also be evaluated as a guide to selecting the most appropriate investment package.



The Consultant will present the results of the economic analysis showing the ranking in the order of incremental NPV/C. If the sections above the budget cut-off point do not fully exhaust the budget, the Consultant will try and further maximise the overall NPV of the recommended investment package by seeing if it is feasible to substitute a more expensive option from lower in the list for a less expensive section higher in the list. The inputs and outputs will be fully described in a separate Annex to the Feasibility Report.

Based on the results of the economic appraisal, construction cost estimates, available EBRD financing and any additional considerations, the Consultant will recommend an implementation programme for the detailed design stage and a contract strategy for the procurement of works by international competitive bidding.

Task 11 Reporting

The reports represent the project milestones and will be provided for Module B according to the provision of the TOR.

The draft feasibility report will be submitted at the end of month 7 from commencement of the assignment and will include:

- Physical and economic background in Uzbekistan
- Summary of the results of the field surveys and geotechnical investigations
- Traffic forecasts
- Proposed design standards
- Rehabilitation proposals
- Cost estimates
- Detailed description of the economic design
- Recommendation on contract packaging and implementation programme

Comments from the Client and the EBRD will be taken into consideration and the final report issued on completion of Phase 1 at the end of month 9 from commencement of the assignment.

Copies of all reports will be in PDF–Acrobat Reader electronic format in order that they can be placed on the TRACECA website.

4.2.2 Phase 2

Phase 2 tasks will only commence upon acceptance of the recommendations of the Phase 1 feasibility report and the additional funding required by the Consultant for these activities. Phase 2 tasks are not part of the Consultant's current financial proposal.

Tasks 13, 14 and 15 are elaborated on in greater detail in Appendix C Procurement Procedures for Module B.



Task 12 Detailed Engineering Design

The Feasibility Study will identify sections of the Tashkent / Osh road for rehabilitation. From the mainly visual inspections and surveys carried out during Phase 1 the Consultant will undertake detailed topographic surveys of the existing road, accurately locating the centre line and cross sections together with bridges, culverts, side drainage and road furniture. Where necessary, additional field surveys and testing will be carried out to verify pavement strength and composition. However, the major part of this task will have been completed during the Feasibility stage in order to minimise or eliminate the need for supplementary investigations during the detailed design stage.

During Phase 1, a broad range of technical solutions will have been developed for the road rehabilitation and preliminary design proposals produced. These may consist of maintenance, through crack sealing and surface dressing to overlays or the complete reconstruction of the entire pavement structure. The starting point for the detailed design of the pavement will be the combination of the design traffic with the axle load assessments. This will produce design Equivalent Standard Axles for a number of possible pavement lives. Critical to all methods of design is establishing the strength from the underlying material which can be expected over the design life of the pavement. The sub-grade types and strength will have been determined from the geotechnical surveys.

Internationally, a wide range of different pavement design methods are in use. In the Consultant's experience, it is rare for any two to produce exactly the same design for a given combination of design Equivalent Standard Axles and underlying strength characteristics. The British TRL procedure will be adopted as a starting point and cross check the result with FSU and current European legal axle load to arrive at the most cost effective solution. TRL Report 833 contains an overlay design method based on deflection and performance data collected in the UK and is widely used outside the UK. Experience shows that it generally gives reasonable results in a variety of climatic conditions. The other advantage of this particular report is that it was initially developed for European conditions. The Consultant has found that these two methods give good correlation and would therefore propose to use the same for this assignment. Pavement design for overlay and reconstruction will be evaluated separately for the homogeneous sections determined from the results of roughness and deflection surveys during Phase 1. Alternative strategies will also be evaluated, including surface treatments.

With regards to re-cycling, it is a technique for rejuvenating pavements which have aged. It assumes that the original pavement was constructed to international specifications and the constituent materials are therefore of a suitable quality for re-use. In general, pavements in the FSU are highly variable in terms of bitumen quality, aggregate grading and quality control during construction. The Consultant's experience on other roads in the region supports this observation and it is not believed that it will be feasible to re-cycle the existing pavement materials for use in surface overlays.

Drainage of the road surface is a function of the cross-fall which sheds water to the roadside drainage channels. It is likely that the topographical survey will reveal that the standard cross section cannot be provided without substantial full depth asphalt reconstruction. The Consultant will therefore consider a lesser cost option for shape correction using cold planning to remove high spots with regulating asphalt to eliminate low spots. The drainage



works identified in Phase 1 will be developed into detailed designs for repairs and/or new works on the side road channels, cross road culverts, other drainage structures and out-falls. The remedial and new works will be scheduled and refer to standard details on the drawings describing the actual works to be executed. This will greatly reduce the time required for the preparation of designs, tender drawings and specifications. It is understood that designs and specifications for drainage and road furniture can be based on existing Uzbek standards for consistency and continuity. However, consideration will be given to the use of alternatives that comply with current internationally accepted practices, particularly to ensure satisfactory performance under local climatic conditions.

The Bridge Specialist will study the information collected during Phase 1 on the condition of existing structures and examine design and construction details provided by the recipient. If necessary, a more detailed inspection, measurement and possibly testing of the various components will be made. In the event that major structural repairs or reconstruction are considered necessary the design criteria for the structural analysis will be discussed and agreed with the Client, to ensure that the design and construction provisions are in line with accepted international practice. The working drawings, prepared during the detailed design of remedial works, will form part of the tender documentation. Under the overall direction of the Bridge Specialist, KDTP and an Uzbekistan institute to be contracted with by the Consultant, as discussed in section 1.1, will prepare the drawings and Bill of Quantities. The drawings will be prepared using Autocad or similar drafting software to A1 size. This will enable electronic distribution and reduction to A3, if required, for issue of the tender documentation. Whilst the format of the Bill of Quantities will be as simple as possible for pricing by bidders, the document will be itemised in sufficient detail, in accordance with the relevant different work items in the Specification and on the Drawings, to enable realistic comparisons of tender prices and a fair basis for the periodic valuation of the Works executed, for both Employer and Contractor. The Bridge Expert will undertake a final review of the working drawings and Bill of Quantities upon their completion.

To ensure that the required quality and technical standards of the works are achieved, the Specification will be based on an acceptable format with the current standards in force in Uzbekistan, namely GOST and SNIP. The Bridge Specialist will advise on additions or modifications to the Specification for those elements of the bridge-works not adequately covered by either the GOST or SNIP norms.

Task 13 Tender Documents

The proposed construction works for road rehabilitation, associated drainage and bridge works, are to be carried out under contracts awarded following International Competitive Bidding. The bidding documentation will be prepared in accordance with EBRD guidelines and the particular requirements of the Client. They will be based on the use of latest version of the FIDIC Conditions of Contract for Works of Civil Engineering Construction.

A large number of documents need to be prepared for obtaining the necessary approvals and for tendering purposes. However, the documentation is almost the same for each contract, particularly if standard details and specifications are employed.



It must be remembered that a substantial proportion of the tender documentation will subsequently be incorporated into the contract documentation and, as such, it is of vital importance that it is properly prepared. Poor preparation of documents, at this stage, is one of the main sources of claims under a contract. No matter how much care is given to the preparation of a design, it is unlikely to be properly executed if the contractor and the site supervision staff are not provided with a coherent set of documents to work from. The Consultant's considerable experience world wide in the preparation of all forms of contract documentation and on supervision of construction will ensure that the documentation is prepared to the highest standard. The bidding documents will be finalised based on the detailed engineering design and we will provide ongoing support to the Client to obtain the necessary approvals.

Task 14 Prequalification of Contractors

Companies interested in tendering for contracts will be asked to submit for assessment, details of their organisation, their experience, their management structure, their equipment and their financial resources. This is to ensure that only those with appropriate and adequate backgrounds and abilities are invited to submit tenders. It thus saves the Client time and money in the production of documents and assessment of tenders, and avoids patently unsuitable companies incurring the costs (which can be quite considerable) of preparing tenders. It can also avoid the potentially invidious situation in which the client is forced to reject the lowest tender on the grounds of incapacity or, even worse, appoints a contractor who subsequently proves to be incapable of carrying out the contract.

The Prequalification Document is the means by which aspiring contractors are informed of the nature of the project, the scope of the contract(s) involved, and the information which they are required to provide for assessment purposes. The precision with which assessments of pre-qualification submissions can be carried out is dependent on the quality of the information received from applicants. This in turn is dependent upon the clarity and comprehensiveness of the Prequalification Document, so it is important that care is taken over its preparation.

Once the prequalification assessment has been completed a succinct Prequalification Report will be prepared, setting out the overall findings of the assessment and making recommendations of applicants to be prequalified. When, and if, the recommendations are accepted by the Client, applicants would be notified.

Task 15 Tender Procedures

The general principles of the procurement process may be stated as ensuring that:

- the tender and contract documents are unambiguous and clearly set out the rights and obligations of the parties to the contract;
- the selection and appointment of the contractor is carried out in a fair and impartial manner that will withstand subsequent scrutiny;
- the contractor has the appropriate technical knowledge, experience, and resources to undertake the works;
- the contractor has adequate financial resources to undertake the works;



- the contractor is eligible in accordance with the rules of the client and/or the funding agency;
- the contractor has a good understanding of the works to be undertaken and any special features of the contract; and
- the cost to the client/funding agency will be reasonable for the works envisaged.

Management of the Tender Process will normally include:

- the issue of invitations to tender to prequalified applicants;
- the organisation of a pre-bid meeting and, if appropriate, a site visit;
- the receipt and responding to bidders questions;
- the issue of bid period notices and Bid Addenda;
- the receipt and opening of Bids;
- the assessment of Bids;
- reporting on bid assessment and recommending award;
- negotiations, when appropriate;
- award of Contract; and
- preparation of Contract Documentation.

The Consultant's considerable experience world-wide in these aspects of the work will ensure that these procedures are performed to the highest professional standards.

Task 16 Reporting

At the end of Phase 2 the Consultant will submit a Final Report summarising the work completed during this phase of the assignment. It will include details on the design criteria used for the road pavement, drainage and structural rehabilitation together with cost estimates identifying currency and taxation components. Comparisons of local and international standards will be provided and the reasons for adopting particular standards for the various design elements clearly stated. Information on all pavement investigations, traffic and axle load surveys will be include together with calculations relating to future traffic growth, vehicle class, pavement evaluation and pavement design, with clear recommendations and justifications for the chosen design. The report will be submitted by the due date and in the languages and numbers stated in the Terms of Reference.



Copies of all reports will be in PDF–Acrobat Reader electronic format in order that they can be placed on the TRACECA website.

4.3 Outputs

The outputs of the project are designed to ensure that the specific objectives of the project are achieved by the production of the designated deliverables. These are as follows:

Module A

- Up-dated border reports on the nine border facilities and identification of their enforcement equipment needs
- Specification, tendering and supply of enforcement equipment
- Establishment of a Consultative Committee
- Conceptual and schematic design of an automated border control system
- Specification, tendering and supply of necessary hardware, software and support equipment to install such a system at the selected locations
- Training and support to ensure sustainability of the system
- Project reports and briefing notes

Module B – Phase 1

- Provision of traffic data and undertaking of technical surveys on the Tashkent-Osh road
- Preliminary designs and cost estimates
- Outline environmental assessment of proposed road development
- Economic evaluations with production of projected IRR
- Feasibility Report in format and quality suitable for funding assessment by IFIs

Module B – Phase 2 (subject to the acceptance of the recommendations of the Phase 1 feasibility report)

- Detailed engineering designs
- Specification and tendering for rehabilitation of the agreed sections of the Tashkent-Osh road.
- Project Reports and Briefing Notes
- Liaison with Tacis Task Management and Procurement Unit, ADB and EBRD



4.4 Inputs

The inputs to the project are indicated in Section B5 and are summarised as follows:

Module A

- international specialists with specific border crossing, Customs, IT and procurement skills
- local personnel working with the Consultant and with the recipient Customs organisations
- Border inspections
- Development of border crossing IT control systems
- IT equipment - hardware and software procurement - and communications support equipment
- Procurement documentation and contracts
- Post delivery equipment and system support
- Training programmes

Module B – Phase 1

- international road specialists with specific road design, bridge, forecasting, environmental, road economic and procurement skills
- local personnel working with the Consultant
- Technical, economic and environmental assessments
- Feasibility Study

Module B – Phase 2 (subject to the acceptance of the recommendations of the Phase 1 feasibility report)

- Detail designs subject to the acceptance of the recommendations of the feasibility report
- Procurement documentation and contracts

General

- project co-ordination and logistics
- international flights within EU, to and from Central Asia and within Central Asia
- regional road travel
- backstopping specialists with specialist skills in all aspects of border activities, IT, road design and development, environmental and procurement to support the core teams as required



- Liaison meetings with Tacis, ADB, EBRD, the IJCMLA, the Consultative Committee, EU Delegations, Tacis CUs and Monitoring Units and the TRACECA co-ordination unit and local representatives

B5 PROJECT ORGANISATION AND STAFFING

The project organisation and staffing schedules are discussed in relation to each of the Project Modules. Summary lists of staff and full CVs for each team member are included in Annex C of this proposal.

The Project Organogram (Figure 3) and Project Staffing Programme (Figure 4) are provided at the end of section 5.5.

For a project of this nature it is essential to establish a core project co-ordination team and team of specialists for each Module that comprises expert staff with the appropriate skills and experience in the various technical disciplines with regional experience. Due to the different issues to be addressed within each Module, particular emphasis has also been placed on the selection of personnel with experience in more than one aspect of the project work elements.

5.1 Core Project Co-ordination Team

The Core Project Co-ordination Team will consist of the Project Director and Project Co-ordinator. They will both be based at the Consultant's Head Office in Basingstoke, UK. The role of the Project Co-ordination Team will be to maintain overall control of the project to ensure that the tasks are all undertaken in accordance with the Consultant's international reputation for quality. The Project Co-ordinator will be responsible for liaison with the Task Manager in Brussels and the logistics of the field teams, as well as central office administration.



Project Manager Adrian Tite

Adrian Tite is a Regional Director of Scott Wilson in charge of International Development. He has extensive world-wide experience of large-scale, multi-disciplinary public and private sector projects in the transport and infrastructure sectors. For the last 16 years he has been responsible for directing projects involving:



- policy
- business planning
- economics
- technical services
- institutional development
- organisational and human resource development
- legal and regulatory reform
- trade facilitation, freight forwarding and customs
- commercialisation and privatisation
- procurement



Adrian is currently the Project Director of the TRACECA International Road Transport Transit Facilitation and ADB Customs Reform Projects, as well as the on-going road projects in Kazakhstan, Kyrgyzstan and Tadjikistan. He was the Project Manger for the TRACECA Trade Facilitation and Legal and Regulatory Framework Projects and the Tacis Border Crossing Study Phase 2 and 2a projects. He travels extensively in Central Asia and is therefore familiar with both the Customs and road environment in all of the recipient countries, and is responsible for Tacis procurement procedures on current EC projects.



Project-Co-ordinator

Mark Maunsell-Thomas

Mark Maunsell-Thomas is an experienced project administrator responsible for project co-ordination, logistics management and the co-ordination of training courses in the UK and overseas. He is currently the Logistics and Training Administrator for the TRACECA International Road Transport Transit Facilitation project, being responsible for workshop facilitation in the 11 country TRACECA region, liaison with the international and local training teams ensuring logistical support is provided and providing administrative backup for the project.



In addition to his project co-ordination role, he is a qualified economist and has worked in Central Asia on the TRACECA International Road Transport Transit Facilitation project and the World Bank Kyrgyzstan Urban Transport project, so is familiar with the environment and logistical constraints.

5.2 Project Team - Module A

For Module A, the Consultant proposes a senior expert for the key position of Team Leader with extensive experience in Customs and border crossings in the region, supported by 3 international team members in the roles of IT Specialist, with experience of Customs IT systems in the CIS, a Customs Specialist, with experience of both IT and enforcement systems, and a Tacis Procurement Specialist. Local IT support staff will be contracted in each of the 5 countries. The key experts will be supported by backstopping support specialists as required.



Team Leader Anthony Bayley

Anthony Bayley has over 30 years experience in international transportation - air, marine, rail and road - both as an operational manager in the private sector and for the last 16 years as a Transport and Logistics Consultant. He has worked for many of the international funding agencies including the EU, EBRD, World Bank and ADB.





He has been involved in development of trade facilitation and Customs in the CIS for the last 4 years. He was the Team Leader for the TRACECA Trade Facilitation and Customs Procedures project and has undertaken evaluations at all the nominated border crossings and is familiar with border procedures in Central Asia. Under the CBC programme he was responsible for definition of the border equipment requirements and in the current TRACECA International Road Transport Transit Facilitation project he is working with Customs on the procurement and installation of IT equipment in support of SafeTIR. He was responsible for the development of the Cross Border Framework Agreement for the ADB, which this project is supporting, and is currently designing a Customs Reform Programme covering Central Asia for the ADB, including IT and border development.

He is currently working on projects with Customs in Central Asia. He will be responsible for the management of the Module, as well as undertaking the border inspections and addressing the institutional and procedural aspects in relation IT.



IT Specialist Mike Schwarzer

Mike Schwarzer has almost 30 years experience of the IT industry, of which the last 14 years have been concerned with development of IT solutions for the transport environment that are designed to enhance and control trade and transport. He has worked on Tacis projects with Scott Wilson in the CIS for the last 3 years and is familiar with the systems used by many CIS Customs, as well as the existing IT border control methodologies. He is currently working on development of IT systems with Customs on an existing TRACECA project. He has been responsible for development and design of community-type systems involving Customs control, DTI, use of EDI and is familiar with international Customs software.



He will be responsible for all the IT aspects from development of the IT strategy, system design, systems architecture and implementation of the system at the borders. He will also be responsible for liaison with Customs and supervision of the local IT specialists.



Customs Specialist Valdis Kursietis

Valdis Kursietis has 25 years experience of Customs – 17 years with the Customs in the United Kingdom followed by 4 years with Latvian Customs. He is therefore familiar with both the EU Customs approach and that used in the CIS as well as in the Baltic States. In the last 4 years he has been a Consultant of Phare projects providing assistance to Customs in respect of management, legislation and IT.

He has experience of both enforcement needs and IT, having worked with the ASYCUDA system. He will work with the Team Leader to define the enforcement equipment and assist the IT specialist when required.



Procurement Specialist Geoff Redwood



Geoff Redwood has extensive experience of contract law, contract documents and hands on procurement in both the public and private sectors. As Head of Procurement within the procurement agency arm of Scott Wilson he has been Project Manager on a number of major procurement projects undertaken by the Company in recent years.

He is currently leading Scott Wilson's procurement team dealing with the supply of computer equipment for Custom's offices and training centre equipment, including ADR equipment, for 11 countries for TRACECA and Tacis. He has in-depth experience in the preparation of procurement procedures, tender documents, tender evaluation, contract terms and conditions and insurance.

In addition to hands-on procurement, he has prepared and delivered training material in procurement and related topics both in the UK and overseas. He will be responsible for all aspects of procurement following equipment specification. This includes the supervision of all procurement using the Tacis Procurement System.

5.3 Project Team - Module B

For Module B the Consultant proposes a senior expert for the key position of Team Leader / Highway Engineer, with extensive experience in road design and development projects in the region, supported by five international team members in the roles of Transport Economist, Pavement/Materials Specialist, Bridge Specialist, Environmental Specialist and Contracts Expert. The bulk of the field surveys, detailed engineering design and preparation of tender drawings are expected to be carried out by professional staff from KDTP and an Uzbekistan institute to be contracted with by the Consultant, as discussed in section 1.1. Local staff inputs will be conducted under the Consultant's supervision. The bidding documents and the cost estimates will be prepared by the Team Leader, with support as necessary from the Contracts Expert, local associates and backstopping support specialists as required.



Team Leader Achille Calzetti

Achille Calzetti is a Principal Engineer for highways projects with Scott Wilson. He has 39 years of highway related experience of which the last 28 years have been in senior positions. His extensive experience covers a wide range of highway related services, namely site investigation, preliminary studies, feasibility studies, design and design reviews and tender documentation. He is particularly experienced in co-ordinating multidisciplinary and multi national teams, managing a design office and liaising with clients. This makes him particularly well suited to this project as this experience comprehensively covers the needs of the project.





He is presently the Team Leader for the detailed design of urban maintenance and rehabilitation, pavements and drainage measures for three cities in Kyrgyzstan. He was Deputy Team Leader/Senior Highway Engineer for a road rehabilitation project in Uzbekistan in 1997 for the evaluation and screening of 3,600 km of roads and identification of 2,900 km for rehabilitation, including assessment of the technical and economic feasibility of the proposed rehabilitation work. He is therefore familiar with the projected route between Tashkent and Osh. He drove the length of this road during the preparation of this proposal.

He will be responsible for the management of Module B in production of the Feasibility Study and will also have specific responsibility for the road design aspects.



Transport Economist Martin Oaten

Martin Oaten has considerable experience in economic appraisal of infrastructure development projects worldwide, utilising standard cost benefit appraisal methodologies demanded by the international donor community. He is familiar with project appraisal and monitoring techniques, as well as transport sector project appraisal in Eastern Europe and the countries of the Former Soviet Union.

He was recently Project Manager on an EBRD funded Road Sector Finance Study in Uzbekistan. The project included undertaking an assessment of the road sector in the country including recommendations for improvements as well as identifying potential funding sources. Much of the analysis centred main Tashkent - Osh Road. He was also the Transport Economist for the Tacis Border Crossing Study Phases 2 and 2a projects and the Tacis Bug River Bridge Proposed Second Crossing project. He is therefore familiar with requirements at CIS border posts, having visited the 15 sites included in these projects.

He will be responsible for providing all the economic evaluations in the Feasibility Study.



Pavement Engineer Bent Larsen

Bent Larsen has worked as a pavement engineer with Scott Wilson in Kazakhstan and is currently employed on the World Bank Kyrgyzstan Urban Transport project. He has a thorough theoretical and practical background for all aspects of pavement evaluation, pavement design, economic evaluation and pavement management. He has done scientific research on mathematical models on fatigue and plastic and elastic deformation characteristics problems in connection with laboratory and in-situ tests on asphalt and unbound pavement materials and full scale pavement testing.

He has experience of marketing and implementation of various hardware and software pavement evaluation and pavement management systems. Self-development computerized systems have been based on pavement condition monitoring and pavement management monitoring. He is familiar with analyses of all types of pavement condition monitoring has broad experience in pavement evaluation of all kind of road and airfield

He will be responsible for all pavement aspects and will undertake many of the surveys.



Environmental Specialist Ruth Golombok

Ruth Golombok has 8 years experience of carrying out Environmental Assessments on road and infrastructure projects. She is fully conversant with the demands placed up them by the various funding agencies, especially Tacis and EBRD. She has conducted Environmental and social studies ranging from development of strategies, impact assessments, audits and reporting, pollution prediction, monitoring and evaluation, particularly in relation to infrastructure and transportation projects.

She is familiar with the environmental situation and regulations in Uzbekistan having worked on environmental impact assessments in Samarkand in 1995 and for the EBRD in 1999.

She will be responsible for all environmental investigations in connection with the Feasibility Study.



Bridge Specialist Peter Webb

Peter Webb has some 25 years experience in the management of design projects and their implementation and the preparation of tender and construction documentation for bridgeworks projects both in the UK and overseas in various countries and is conversant with the requirements for virtually all forms of bridge construction.

He is currently the team leader for the Tacis Bug River Bridge Proposed Second Crossing project in Ukraine providing expert and technical advice for the design, preparation of contract documents and for construction of new bridges. He is familiar with bridge design standard used in the CIS and has provided wide ranging technical assistance and training in all aspects of bridges and related fields. His experience also includes responsibilities for design, inspection, rehabilitation and assessment of many diverse new or existing structures.

He will be responsible for the surveying of the bridges and reporting on their condition and identifying the rehabilitation requirements.



Contracts Expert David Judge

David Judge has gained extensive experience over several years in procurement, comprising the preparation of tender documentation and the assessment of tenders to determine the most economic package to fulfil Client requirements. This involves attention to detail to ensure that the tender documents set out fully and clearly the services or goods to be supplied together with all critical conditions, and careful review of





tenders submitted to determine compliance with the requirements of the tender documents, identify any qualifications, assess technical aspects and make recommendations for award of contract to the tenderer who submits the optimum overall bid.

He is currently working on the World Bank Kyrgyzstan Urban Transport project and was the Procurement Expert for both the Tacis Border Crossing Study Phases 2 and 2a projects, the Tacis Bug River Bridge Proposed Second Crossing project and the Asian Development Bank Road Rehabilitation Project in Uzbekistan. He is therefore familiar with procurement projects in the region.




He will be responsible for all contractual advice in connection with the development of the Feasibility Study but his main role will be in Phase 2. He will also assist in any contractual matters in connection with the procurement being undertaken in Module A.

5.4 Local Personnel

The Consultant is currently working in all five countries and have links with both IT and road specialists. In addition, the Consultant has local staff based in all the recipient country's capital cities working from well-established project offices.

With regard to Module A, the Consultant has had discussions with local IT specialists in each country, in the proposal preparation phase, but does not wish at this stage to make contractual arrangements with particular organisations or specialists until completion of the discussions with the Recipients. This is because Customs either have preferred suppliers or would wish to approve both individuals and companies who are working on dedicated Customs IT systems for security reasons. The Consultant will provide the names of the organisations and specialists during the approval process.

With regards to Module B, the local specialists will be supplied by Kyrgyzdortransproject, all of whom have either worked or are working on joint projects with the Consultant. These consist of the following specialists:

-  Gennady A Tonkih – Senior Highway Design Engineer
-  Jusup Murataliev – Topography specialist
-  Gennady F Kuznetsov – Bridge Engineer
-  Vasily V Kokinos – Chief Roads Project Engineer
-  Vasily Nicholayevich Golubev

5.5 Backstopping

Scott Wilson has a team of backstopping specialists to be able to respond to the project team's needs at short notice to provide specialist advice and resolve technical issues. These include specialists in the following disciplines for Module A:



- Customs
- Customs IT systems
- Immigration
- Veterinary
- Phytosanitary

For Module B the following disciplines will be covered in the backstopping team:

- Geomorphology – to cover any mountainous areas of the road.

Figure 3: Project Organogram

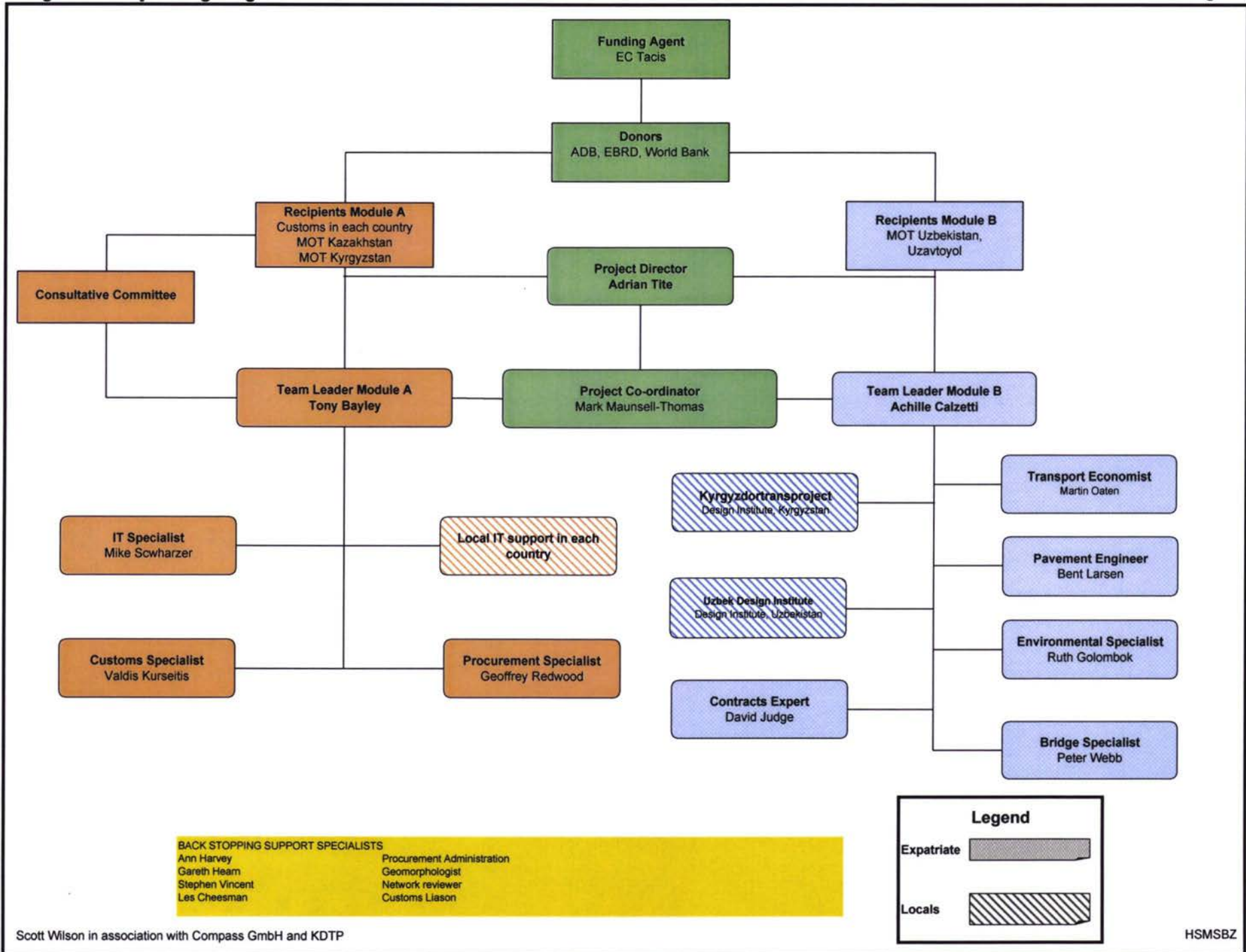
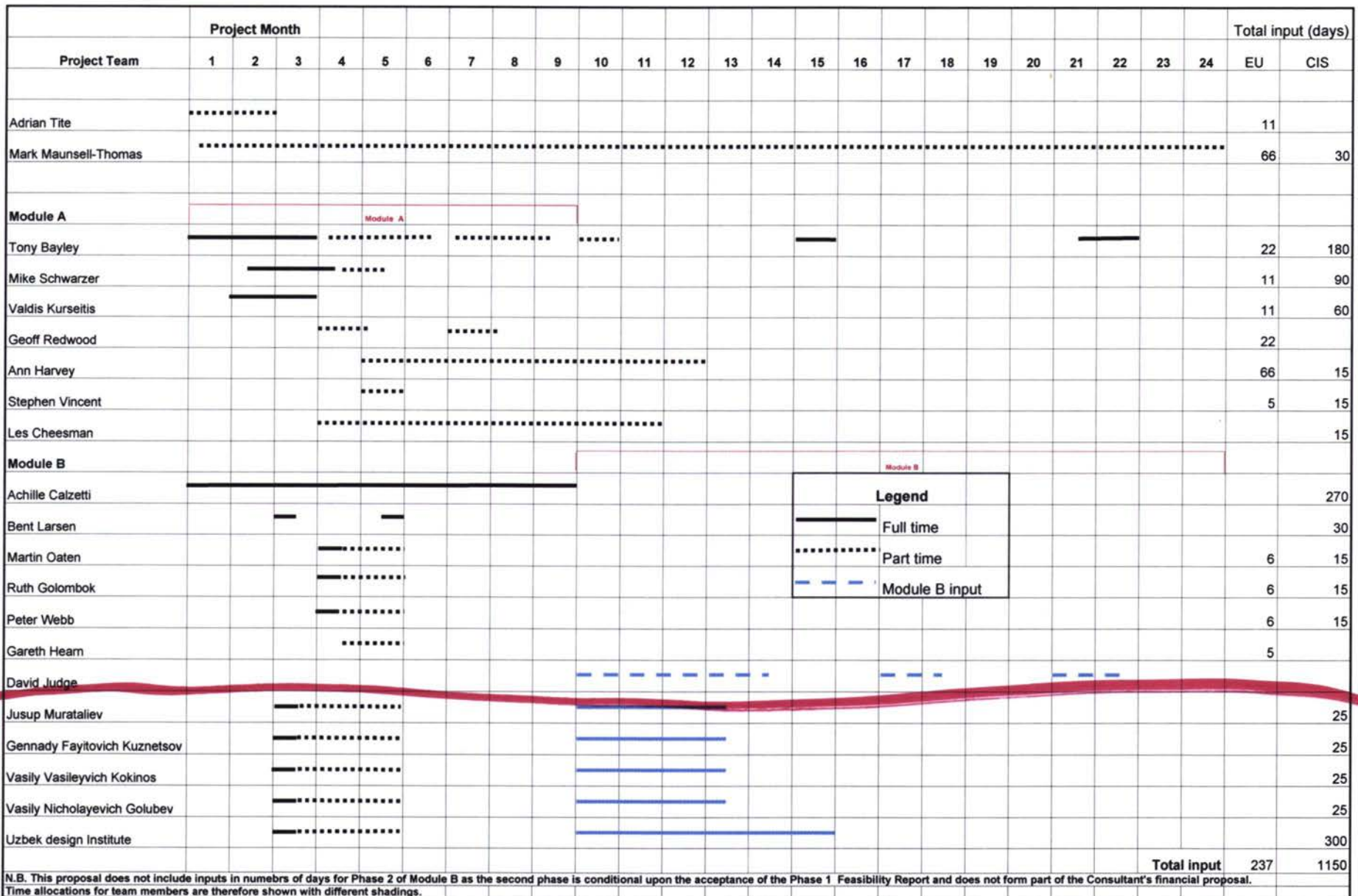


Figure 4: Project Staffing Programme





Annex

C

LIST OF STAFF





C1. SUMMARY LIST OF KEY EXPERTS

A complete list of all the candidates actively involved with the project has been included as Table 4. Curriculum Vitae have been included with letters of exclusivity and availability for each candidate. Copies of the degrees/diplomas have been included for each candidate where appropriate.

Employer letters confirming the candidates experience have been included where appropriate.

C2. SUMMARY LIST OF NON-KEY EXPERTS

A complete list of backstopping support experts and specialists has been included as Table 5 below. Curriculum Vitae for these candidates have also been included.

C3. SUMMARY LIST OF LOCAL STAFF

A complete list of the local staff has been included in Table 6 below. Curriculum Vitae for these team members along with letters of availability and exclusivity have also been included.

TABLE 4: SUMMARY LIST OF KEY EXPERTS

TENDERER: SCOTT WILSON.

PROJECT REFERENCE: SCR-E/110622/C/SV/WW

KEY STAFF: CORE PROJECT CO-ORDINATION TEAM

Name of Expert	Present Employer and Position	Years of Experience	Age	Nationality	Educational Background	Specialist Areas of Knowledge	Experience in the Beneficiary States	Languages and Degree of Fluency (VG, G, W)
Adrian TITE	Scott Wilson Director and Head of Institutional Development Services	33	55	British	Brighton University BSc Civil Engineering Imperial College, London University MSc in advanced technology Member of the Institute of Management Services Fellow of the Institute of Civil Engineers	<ul style="list-style-type: none"> ▪ Trade facilitation ▪ Freight forwarding ▪ Customs ▪ Human resource development ▪ Policy, planning and economic appraisal ▪ Restructuring and Reform of Ministries of Transport ▪ Institutional Development of transport sector, particularly road and road transportation ▪ Procurement Services, Equipment and Construction under International Agency Funding ▪ Training in-country, workshops and study tours ▪ Working on projects funded by Tacis, Phare, World Bank, DFIF, Finnida, Danida ▪ Extensive experience of working in FSU countries and other countries in transition 	<p>Kazakhstan 1994–ongoing</p> <p>Kyrgyzstan 2000–ongoing</p> <p>Turkmenistan 2000–ongoing</p> <p>Uzbekistan 1996 -ongoing</p> <p>Tadjikistan – 1997 -ongoing</p>	<p>English – VG</p> <p>French - W</p>
Mark MAUNSELL-THOMAS	Scott Wilson Project Coordinator	2	24	British	Leeds University BA Hons Spanish, Economics and Development Studies	<ul style="list-style-type: none"> ▪ Logistics management for 11 country project in TRACECA region ▪ Experience in the use of HDM 4 in Kyrgyzstan for the World Bank Urban Transport Project ▪ Economic appraisal experience ▪ Study tour manager 	<p>Kyrgyzstan</p> <p>Kazakstan</p> <p>Turkmenistan 2000</p>	<p>English - VG</p> <p>Spanish - VG</p> <p>French - W</p>

PROJECT REFERENCE: SCR-E/110622/C/SV/WW

KEY STAFF: MODULE A

Name of Key Expert	Present Employer and Position	Years of Experience	Age	Nationality	Educational Background	Specialist Areas of Knowledge	Experience in the Beneficiary States	Languages and Degree of Fluency (VG, G, W)
Anthony BAYLEY	Scott Wilson Consultant	37	54	British	A Levels	<ul style="list-style-type: none"> ▪ Fully up to date with Customs in all the beneficiary countries ▪ Experienced border crossing expert ▪ Familiar with border crossing procedures in CIS ▪ Logistics expert ▪ Legal and regulatory changes to enhance trade ▪ Customs procedures, terminal design ▪ Familiar with customs' technical requirements in CIS 	Kyrgyzstan 1997-current Kazakhstan 1997-ongoing Tadjikistan 1997-ongoing Turkmenistan 1997-ongoing Uzbekistan 1997-ongoing	English - VG French - G Russian - W
Mike SCHWARZER	Scott Wilson Consultant	25	51	British	Huddersfield University BSc Electronics, 1972	<ul style="list-style-type: none"> ▪ IT solutions for the transport industry ▪ Familiar with existing Customs IT situation in CIS ▪ Responsible for the specification and acquisition of the necessary computer and communication equipment via EC tender regimes. 	Kyrgyzstan 2000 -ongoing Kazakhstan 2000 -ongoing	English – VG German – G



Name of Key Expert	Present Employer and Position	Years of Experience	Age	Nationality	Educational Background	Specialist Areas of Knowledge	Experience in the Beneficiary States	Languages and Degree of Fluency (VG, G, W)
Geoff REDWOOD	Scott Wilson Company Secretary/ Procurement Specialist	16	49	British	Ordinary & Higher National Diploma in Business Studies Institute of Chartered Secretaries Member of the Institute of Purchasing & Supply	<ul style="list-style-type: none"> ▪ Expert in Contract law, contract documents ▪ Procurement specialist ▪ Familiar with Tacis rules ▪ Experienced in procuring equipment for the TRACECA countries 	Kazakhstan Sept-Oct 2000	English – VG
Valdis KURSĪETIS	Compass GmbH Consultant	24	46	British/ Latvian	Diploma in Senior Management and Leadership	<ul style="list-style-type: none"> ▪ Trade facilitation expert ▪ Experienced ex-Customs officer ▪ Expertise in Customs software packages (ASYCUDA) ▪ Experienced trainer 		English - VG Latvian – VG German – G



PROJECT REFERENCE: SCR-E/110622/C/SV/WW

KEY STAFF: PROJECT TEAM MODULE B

Name of Expert	Present Employer and Position	Years of Experience	Age	Nationality	Educational Background	Specialist Areas of Knowledge	Experience in the Beneficiary States	Languages and Degree of Fluency (VG, G, W)
Achille CALZETTI	Scott Wilson Senior Highway Design Engineer	36	62	Italian	Athens National Technical University MSc in Civil Engineering Fellow of the Institution of Civil Engineers	<ul style="list-style-type: none"> Road design Feasibility Management of the production of tender documents 	Uzbekistan 1997-8 Kyrgyzstan 2000-2001	English - VG Italian - VG Greek - VG French - VG
Bent LARSEN	Scott Wilson Consultant	27	48	Danish	Technical University of Denmark MSc in Civil Engineering PhD in Pavement Engineering	<ul style="list-style-type: none"> Pavement and materials behaviour and properties Familiar with all types of survey techniques including working with the falling weight deflectometer since 1975 and Pavement Management systems since 1980. Worked closely with team members on economic appraisal techniques 	Kazakhstan 1997-current Kyrgyzstan 1999-2000	Danish - VG English - VG French - VG German - VG Russian - W
Martin OATEN	Scott Wilson Principal Economist	12	32	British	Exeter University BA Hons Economics and Geography	<ul style="list-style-type: none"> Transport economist experienced in all types of transportation economic appraisals Participated in EBRD Project preparation report on Uzbekistan Road Development Project Familiar with Tashkent - Osh road Experienced in Tacis guidelines 	Kazakhstan 1997-8 Turkmenistan 1995	English - VG French - W German - W



Name of Expert	Present Employer and Position	Years of Experience	Age	Nationality	Educational Background	Specialist Areas of Knowledge	Experience in the Beneficiary States	Languages and Degree of Fluency (VG, G, W)
Ruth GOLOMBOK	Scott Wilson Principal Environmental Specialist	10	40	British	Cambridge University PhD	<ul style="list-style-type: none"> ▪ Environmental Impact Assessments for transport related infrastructure and transportation projects ▪ Pollution prediction, monitoring and evaluation ▪ Familiar with Tacis requirements 	Uzbekistan 1998	English – VG French – G
Peter WEBB	Scott Wilson Bridge Engineer	35	56	British	Brighton College of Technology Diploma in Civil and Structural Engineering	<ul style="list-style-type: none"> ▪ 25 years experience of design projects and preparing tender documentation for bridge works ▪ Experienced in the inspection of existing bridges ▪ Training in bridgeworks and related fields 		English – VG
David JUDGE	Scott Wilson Contracts expert	32	55	British	Kingston College of Advanced Technology Diploma in Civil Engineering	<ul style="list-style-type: none"> ▪ Extensive experience of procurement of contractors ▪ Tender management specialist ▪ FIDIC Contract specialist ▪ Familiar with Tacis guidelines 	Uzbekistan 1997 Kyrgyzstan 2000	English – VG French – W



TABLE 5: SUMMARY LIST OF LOCAL STAFF

TENDERER: SCOTT WILSON

PROJECT REFERENCE: SCR-E/110622/C/SV/WW

C2. NON-KEY STAFF

Name of Expert	Present Position	Years of Experience	Age	Nationality	Educational Background	Specialist Areas of Knowledge	Experience in the Beneficiary States	Languages and Degree of Fluency (VG, G, W)
Les CHEESMAN	Scott Wilson Consultant	40	59	British	N. London Polytechnic City and Guilds in Plastics Technology Diploma, 1962. National and International CPC, by examination in 1982. Henley Management College, RSA Management Assessment Award 1991	<ul style="list-style-type: none"> ▪ Experienced working with customs in the beneficiary countries and fully conversant with their current situation. ▪ Agreed procurement package for installation for SAFETIR as part of EC Tacis TRACECA International Road Transport Transit Facilitation project ▪ Team Leader for the EC Tacis TRACECA International Road Transport Transit Facilitation project ▪ Previously co-ordinator for the European Commission Tacis TRACECA programs ▪ Project Manager for the EC Tacis TRACECA Trade Facilitation, Customs Procedures and Freight Forwarding 	Kazakhstan Kyrgyzstan Uzbekistan Turkmenistan 1996 – ongoing Tadjikistan – 1994 - ongoing	English –VG Russian – W



Name of Expert	Present Position	Years of Experience	Age	Nationality	Educational Background	Specialist Areas of Knowledge	Experience in the Beneficiary States	Languages and Degree of Fluency (VG, G, W)
Gareth HEARN	Scott Wilson Environmental Specialist/ Geomorphologist	13	42	British	Kingston Polytechnic BSc Hons London School of Economic and Political Science PhD Geomorphology Chartered Geologist and Environmental Geomorphologist	<ul style="list-style-type: none"> ▪ Experienced Geomorphologist in road construction and rehabilitation. ▪ Familiar with all types of Geotechnic surveys for road rehabilitation and construction ▪ Familiar with the requirements of road rehabilitation in mountainous areas. ▪ Extensive training experience 	Tadjikistan 1998	English-VG French – G Italian – G Nepali – G
Ann HARVEY	Scott Wilson Procurement Assistant/ Project Administrator	2	48	British	BTEC National Certificate in Business and Finance	<ul style="list-style-type: none"> ▪ Experienced in procurement administration for international funding agents including EC Tacis and DFID. ▪ Previously procured IT equipment for customs in 11 countries of the TRACECA region 		English - VG
Stephen VINCENT	Scott Wilson Head of Information Systems	23	45	British	Cambridge University BA Hons Engineering London University MSc Member of British Computing Society	<ul style="list-style-type: none"> ▪ Management Information Systems ▪ Planning Systems ▪ System Development ▪ Training Workshops and Videos ▪ Business Process Reengineering in Government Authorities 		English-VG

TABLE 6: SUMMARY LIST OF LOCAL STAFF

TENDERER: SCOTT WILSON

PROJECT REFERENCE: SCR-E/110622/C/SV/WW

C2 NON-KEY STAFF; LOCAL STAFF

Name of Expert	Present Employer and Position	Years of Experience	Age	Nationality	Educational Background	Specialist Areas of Knowledge	Experience in the Beneficiary States	Languages and Degree of Fluency (VG, G, W)
Gennady A TONKIH	Kyrgyzdortransproject Senior Highway Design Engineer	28	60	Kyrgyz	Polytechnics Institute Frunze 1965	<ul style="list-style-type: none"> ▪ Design of pavements and drainage ▪ Specifications ▪ Environmental awareness ▪ Experienced with feasibility studies 	Kyrgyzstan Kazakstan	Russian - VG
Jusup MURATALIEV	Krygyzdortransproject Topography specialist	22	47	Kyrgyz	Polytechnic College Bishkek, 1978 Kyrgyz State University Bishkek, 1986	<ul style="list-style-type: none"> ▪ Chief of Survey Team ▪ Experience preparing topographical assessments for feasibility studies 	Kyrgyzstan Kazakstan	Russian – VG Kyrgyz – VG
Gennady F KUZNETSOV	Kyrgyzdortransproject Bridge Engineer	30	60	Kyrgyz	Polytechnics Institute Frunze, 1965	<ul style="list-style-type: none"> ▪ Study of bridges and overpasses ▪ Preparation of bridge reports ▪ Preparation of detailed projects and executive drawings on bridges ▪ Compiling of technical specifications 	Kyrgyzstan	Russian – VG



Name of Expert	Present Employer and Position	Years of Experience	Age	Nationality	Educational Background	Specialist Areas of Knowledge	Experience in the Beneficiary States	Languages and Degree of Fluency (VG, G, W)
Vasily V KOKINOS	Kyrgyzsdortranproject Chief Roads Project Engineer	29	52	Kyrgyz	Technical Road Automobile College Frunze 1967	<ul style="list-style-type: none"> ▪ Geometric research of roads ▪ Survey of pavement condition ▪ Preparation of detailed designs and executive drawings for the chosen road sections ▪ Research of drainage, water diversion and culverts ▪ Preparation of detailed reports on pipes, drainage, and water system 	Kyrgyzstan	Russian – VG
Vasily N GOLUBEV	Kyrgyzdortransproject Soils and Materials Engineer	20	49	Kyrgyz	Polytechnics Institute Frunze, 1974	<ul style="list-style-type: none"> ▪ Head of survey team: engineering and geological studies of soils and geophysics. ▪ Experienced preparing results for feasibility studies ▪ Familiar with International funding agency requirements 	Kyrgyzstan	Russian - VG

Proposed position in the programme:

PROJECT DIRECTOR

- 1. **Family name:** TITE
- 2. **First names:** Adrian Percy
- 3. **Date of Birth:** 1945
- 4. **Nationality:** British
- 5. **Civil status:** Married

6. **Education:**

Institution	Imperial College - London University
Date:	1970 - 1971
Degree obtained	MSc -Technology

Institution	University of Brighton
Date:	1963 - 1967
Degree obtained	BSc - Civil Engineering

7. **Language skills:**

Language	Reading	Speaking	Writing
English	5	5	5
French	1	1	1

8. **Membership of professional bodies:** Member Institute of Management Services

European Engineer (Eur Ing)

Fellow Institution of Civil Engineers

9. **Other Skills:** Computer Literate
Trainer

10. **Present position:** Director

11. **Years with firm:** 27

12. Key Qualifications:

Adrian Tite has extensive world-wide experience of large scale multi-disciplinary public and private sector projects in the surface transport and infrastructure sectors.

For the last 16 years he has been responsible for directing projects involving policy, planning, economics, technical services; institutional, organisational and human resource development; legal and regulatory reform; trade facilitation, freight forwarding, customs; and commercialisation and privatisation of transport and maintenance operations.

Over the last 6 years he has worked extensively in FSU and Central Europe countries, including directing:

- **TRACECA International Road Transport Transit Facilitation Project**
- **Takis Border Crossings Phases II and IIa in Russia, Belarus, Moldova and Ukraine**
- **Takis Bug River Bridge and Approach Roads in Ukraine**
- **TRACECA Trade Facilitation, Customs Procedures and Freight Forwarding Project**
- **TRACECA Legal and Regulatory Framework Project.**
- **Phare Albanian Road Code and Road Safety**
- EBRD Project Implementation Unit training in Georgia, Bosnia and Kazakhstan
- World Bank Urban Highway Improvements in Kyrgyzstan
- World Bank Akchatau-Karaganda Highway Development in Kazakhstan
- Islamic Development Bank Shagon-Zigar Highway in Tajikistan
- Islamic Development Bank Murga Pass Highway in Tajikistan

For the last three years he has been directing Takis funded projects, which have involved technical assistance for bridge and road infrastructure, including feasibility studies, design, tender documentation, tendering, tender evaluation, training and equipment procurement.

Project experience encompasses consultancy and technical assistance work for institutional reform, IT systems and project investment including feasibility studies, engineering, procurement, training, project management and implementation. Experience of particular relevance to this project includes:

Module A:

- Improvement of Customs procedures and scheduling of equipment requirements at 13 border crossings between Finland and Central European Countries and the FSU.
- Specification and procurement of computer equipment for Customs in 11 countries of the TRACECA region including organising the installation of SAFETIR software

Module B

- Feasibility study, design, tender documents and tender evaluation for Karaganda – Akchatau highway in Kazakhstan
- Feasibility study, engineering design, tender documents and construction supervision of Murgab – Kulma Pass and Shagon – Zigar, both in Tadjikistan.

13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Armenia	1998 – 1999
Azerbaijan	1999
Georgia	1997 - 2000
Kazakstan	1994 – ongoing
Kyrgyzstan	2000 – ongoing
Poland	1997 – 1999
Russia	1999
Turkmenistan	2000 – ongoing
Ukraine	1998 - ongoing
Uzbekistan	1996

Experience of Specific Countries with Transition Economies:

Country	Date:
Angola	1996
China	2000
Mozambique	1996 - 1999
Tanzania	1979 - 1999
Vietnam	1996 - 1998

14. Recent Professional Experience Record:

Date:	<i>1984 – to date</i>
Location	UK and International Assignments
Company	Scott Wilson
Position	Director
Description	<p>2000 – ongoing</p> <p>Directing consultancy and technical assistance to EBRD in the production of a training CD Rom for training Project Implementation Units, which includes:</p> <ul style="list-style-type: none"> • project management • procurement processes and standards • tender evaluation techniques • Incoterms • financial management • contract documentation <p>Pilot training workshops for PIUs were held in Georgia, Bosnia and Kazakstan</p>

	<p>2000 – ongoing Directing consultancy and technical assistance for:</p> <ul style="list-style-type: none"> • engineering design, tender documentation, tender evaluation and supervision of contractors upgrading 240km. of road Akchatau–Karaganda highway • training of trainers for contractor training in procurement, construction management and contract administration for managers and other key staff • road safety study covering funding, accident data systems, safe planning and design, traffic legislation, traffic police and law enforcement, and road safety education • production of technical site manual and construction management manual <p>1999- ongoing Directing consultancy and technical assistance for the Shagon - Zigar Road. This included:</p> <ul style="list-style-type: none"> • Preparation of feasibility study and preliminary design of 34km • Geomorphological, environmental, and hydrological surveys • Economic appraisal to justify alternative route chosen <p>1998 - ongoing Directing consultancy and technical assistance for the Murgab – Kulma pass in Tadjikistan. This included:</p> <ul style="list-style-type: none"> • Feasibility study • Economic appraisal • Detail design, and preparation of tender documents for a 32 km high level pass on the Chinese border.
	<p>1999 - ongoing Director for the EC Takis International Road Transport Transit Facilitation Project, covering 11 FSU countries, including Ukraine. Project includes:</p> <ul style="list-style-type: none"> • assistance in setting up and equipping training centres for road transport professionals to deliver courses in CPC, ADR, DGSA and Customs • running 22 training courses in the TRACECA region and workshops and study tour in UK for potential training centre managers • development of TIR authorizing associations and legislation • procurement of computing equipment and training for IRU SafeTIR system with total value of Euro 0.5m <p>1999 - 2000 Directing technical assistance under World Bank finance, for the construction supervision and administration of testing laboratories for the Cotton Sector in Uzbekistan.</p>

1998 – ongoing

Directing and auditing technical assistance under EBRD finance for the Project Implementing Unit in the Port of Turkmenbashi, dealing with:

- procurement and monitoring of consultancy contracts for engineering work and construction supervision, institutional development and financial/accounting systems
- procurement of contractors for infrastructure improvements and rehabilitation of cranes and equipment
- formulation of operating agreement with Caspian Shipping Line
- assistance with establishment of special loan and operating accounts and monitoring the administration of the accounts
- advising on private sector investment

1998 – 1999

Directing production of policy documents and running workshops for the Mozambique Ministry of Transport on concessioning as a means to help facilitate private sector participation in transport operations. Following policy adoption, model concession agreement and guidelines were produced.

1998 – ongoing

Director for 2 years training programme in China funded by the European Commission in preparation of China's accession to the World Trade Organisation. The project covers international public sector procurement practice including policies, procedures, monitoring and audit. The training package of seminars, workshops and study tours is being provided for government officials at central and provincial level, officials from state enterprises and bidding agencies, totalling 600 persons

1998 – ongoing

Director for technical assistance to the Zambian National Roads Board to strengthen the institutional capacity to plan and supervise the national road investment and maintenance programme, including procurement of construction contracts; whilst assisting with ongoing institutional reform and providing training.

1998 – ongoing

Director for development and training of operating staff for the Highway and Bridge Management systems in the Mozambique National Highway Authority, (ANE) which had been installed under a previous Scott Wilson contract. Providing expert assistance to ANE for preparation of the World Bank (\$500m) ROADS3 Road Rehabilitation Programme.

1998 – 1999

Director for technical assistance under World Bank finance to Armenian Ministry of Economy to help develop a National housing policy.

1997 – 2000

Director for **EC Takis Border Crossings Phases II &IIa** for 16 road and rail border crossings between FSU and Central Europe. The work included:

- study for improvement to operating methods and procedures, to infrastructure and traffic flow improvement
- workshops for all recipients and stakeholders were run to gain consensus and acceptance of the proposed changes.
- engineering design, tender documentation and procurement assistance for infrastructure works
- production of terms of reference for technical assistance for border control and customs and project supervision unit
- evaluation of tenders for infrastructure construction and project supervision unit
- scheduling of equipment procurement requirements

1997

Director for study and workshops under World Bank finance of:

- deregulation of the transport sector in Georgia, including a review of all legislation and recommendations for changes
- privatisation of Georgian Shipping Company, including recommendations for restructuring and for international accounting systems

1996 - 1997

Director of World Bank financed study and workshops for the Angola Ministry of Transport for:

- commercialising the maritime enterprises, including three shipping lines and the ports;
- restructuring the Ministry of Transport and modifying legislation to deal with a market economy
- training needs assessment and design of a training programme for the Ministry personnel dealing with planning and regulating the shipping and ports sectors

1996 - 2000

Directing technical assistance and consultancy assignment to assist the Mozambique Government:

- to commercialise the coastal shipping and ports of Mozambique and facilitate private sector investment by providing specialist advice on legislative and regulatory framework, traffic forecasting, concessionaire agreements and planning practices
- reorganisation, job descriptions and capacity building for the Ministry of Transport
- introduction of data gathering, statistical analysis and reporting systems for monitoring export and import freight traffic
- reform of road vehicle licensing and inspection procedures and tariff structures, including reorganisation of implementing agencies
- study for establishing co-operatives to run mini-bus services
- training needs assessment and design of training programmes for Ministry Staff
- seminars and workshops on concession agreements, reorganisation and financing.
- organising training programmes and study tours

1996 - 1998

Director for technical assistance and training consultancy to the Vietnam Ministry of Construction Consultants on introduction of modern international management and operation practices, involving:

- designing and implementing training programmes in Vietnam and UK for 300 junior, middle and senior managers for project management, management techniques, quality control, procurement, business planning, human resource development and MIS
- production and implementation of an information technology strategy
- procurement of training equipment, vehicles and computers.

1996 - 1997

Director of **Phare project for National Road Code** development and road safety education in Albania with particular emphasise on harmonisation with EU legislation and European practice services, including design and implementation of Study Tour for vehicle licensing, inspection and testing, road safety policy and enforcement.

1996 – 1999

Director of Tanga Port technical assistance for institutional improvement and commercialisation of Tanga Port activities. Assignment included:

- organisation restructuring
- management development in operations and financial control
- establishing a Port Users Committees
- liaison with freight forwarders, and customs
- advising on tariff structures, personnel and marketing
- training needs analysis
- engineering design and tender documentation for infrastructure and equipment rehabilitation
- procurement and tender evaluations
- supervision of infrastructure improvements and equipment rehabilitation

1996 - 1997

Director for a series of EDF funded studies and training in support of the Road Maintenance initiative for sub-sahara Africa covering:

- institutional development and funding mechanisms for road maintenance
- axle load control
- road safety
- training and development of local road contractors and consultants, of plant and vehicle hire organisations
- training of Government staff in the systems and processes for the changed maintenance procurement

1996 - 1998

Director for the **EC Tacis TRACECA Legal and Regulatory Framework**, including:

- review of existing transport legislation and regulation
- drafting of transport legislation and regulatory codes covering inter government agreements, general transport law, land, sea, and inter-modal transport, customs and freight forwarding procedures
- help facilitate establishment of transport associations
- regional seminars and national workshops to facilitate an understanding of the changes.

1996 – 1998

Director for the **EC Tacis TRACECA Trade Facilitation, Customs Procedures and Freight Forwarding** project covering:

- implementation of transport and trade documents and management information systems
- support for improvement of customs control
- assistance with development of the freight forwarding industry
- establishment of transport associations
- design and implementation of programme of seminars, workshops and study tours

1998

Director for Tacis funded project to study the system, transport logistics, and economics of exporting cotton from Uzbekistan including the practicality of containerisation.

1994 – ongoing

Director for the upgrading of 850km of rural access roads in Zambesi province of Mozambique, including services for:

- establishment and training of labour based construction gangs
- identification and training of potential contractors covering all aspects of running a contractor business, including estimating and tendering
- social impact assessment of the work and design of sustainable solutions for community involvement

1994 – 1996

Director for **EC Tacis project providing technical assistance to Government of Kazakhstan** for the reform of rail, road, maritime, aviation transport law and regulatory system as a means to facilitate international trade. The work included:

- reviewing customs, documentation, freight forwarding and insurance
- identifying steps to be taken and means of implementing changes and strengthening institutions
- running training workshops, seminars and study tours
- development of training courses in country to cover all aspects.

1993

Directing Tacis funded project for St. Petersburg Port Authority, providing **training for senior management in changes of management and operations needed to adapt to a market driven economy**. Seminars and workshops on concession agreements, reorganisation and financing.

1991-1998

Responsible for developing and directing **annual training courses** in UK and “in-country” on road maintenance and management for junior, middle and senior management.

1991 – 1993

Project monitoring for Norad of construction and consultancy for 50,000 dwt Oil Terminal Jetty at Beira including identification of organisation structure, training requirements and method of procurement.

1991 – 1993

Directing feasibility and environmental study and engineering design for new petroleum import terminal and distribution depot at Tanga, for 50,000 dwt product tankers for Tanzania under World Bank finance.

Procurement and supervision of construction of phase 2 of container terminal, inland depots, rail terminal, and customs facilities for expansion of the Port of Dar es Salaam to increase annual capacity for inter-regional traffic to 150,000 TEU’s including planning and engineering of petroleum bulk storage and transfer facilities between marine terminal, rail and road distribution modes in Tanzania for private investor.

1991 - 1992

Directing studies for Croatian client on investment programme and transportation planning for major coal transportation scheme including rail and pipeline option for transfer to new export terminal.

1991 - ongoing

Responsible for developing and directing annual training courses in the UK and "in-country" on road maintenance and management for junior, middle and senior management.

1989 - 1990

Study for private investor to set-up a road haulage company for national and transit freight, including planning of depots, organisation structure and financing plan.

1989 - 1992

Directing manpower development, training review and project evaluation for TAZARA railway authority under Norad funding, including identifying means of improving the management and implementation of technical assistance for developing training needs analysis and implementation strategy.

1985 - 1990

Directing multi-disciplinary team providing consultancy and technical assistance to Tanzania Harbours Authority on:

- regulatory reform
- traffic forecasting
- container management structure and organisation; manpower planning and development, operation and control procedures
- customs procedures and documentation
- communication systems
- rehabilitation of general cargo handling equipment and provision of spare parts
- workshop organisation and equipment requirements
- civil engineering maintenance organisation, procedures and equipment.
- study tour of UK freight depots and terminals.

1985

Directing study for Tanzania Telecommunications Corporation on divestiture of service units involved with vehicle maintenance, document printing and building construction maintenance; and providing a plan for privatising the service units.

1985

Review of a forecasting import/export requirement of petroleum products, crude oil for Tanzania and planning of pipeline and marine terminal facilities, including SBM and inter-modal transfer operation.



	<p>1985 – 1990 Directing consultancy project for engineering and procurement of equipment and engineering works for upgrading a marine oil terminal to international standards for Tanzania Harbours Authority under Norad finance. Provision of technical assistance for design of organisational structure, management, operation and safety procedures, training and study tours.</p> <p>1984 - 1989 Directing specification, procurement documentation, tender assessment and supervision of manufacture, installation and commissioning of container handling equipment of Dar es Salaam, including training of operators and maintenance staff, under World Bank, Finnida and Danida finance.</p> <p>1984 – 1989 Responsible for directing the conversion of freight storage site to a customs bonded inland Container Depot and design of a new depot to handle break bulk and container traffic in Dar es Salaam including customs facilities and advice on operations and systems for interfacing with freight forwarders, under World Bank finance.</p>
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Date:	1973 – 1984
Location	UK and International
Company	Bertlin and Partners (Now part of Scott Wilson)
Position	Project Engineer
Description	<p>Feasibility Study for the establishment of customs bonded inland container depots for Uganda Railways Corporation and making recommendations for improvements to regional transport corridors to facilitate imports and export of coffee.</p> <p>Regional transportation study in Eastern Africa to establish development plans for improvements to the corridors and to the seaports to facilitate improvements to handling and movement of freight, particularly through the ports.</p> <p>Planning, design, construction and equipment procurement for infrastructure work under various international development projects.</p>

Date:	1971 – 1973
Location	UK
Company	Bullen and Partners
Position	Bridge Engineer
Description	Engineering design of highway and rail bridges, highway and general infrastructure works. Assessment of steel bridge strengthening requirements under Merrison rules.

Date:	1967 – 1970
Location	UK
Company	Andrews Kent & Stone
Position	Structural Engineer
Description	Engineering design of public, commercial buildings and bridges

Date:	1967
Location	UK
Company	J Laing
Position	Construction Engineer
Description	Working on infrastructure construction projects.

15. Others:

Publications and Presentations:

“Regional Harmonisation in Trade and Transport”
1996 - Tashkent Conference on Financing and Investing in the Transport Infrastructure of the CIS

“Legal and Regulatory Reform in Kazak Transport Sector”
1995 - Almaty Traceca Conference

“Traffic Legal and Regulatory Framework Reform”
1995 - Vienna Traceca Conference

“Development of Dar es Salaam Port to handle more efficiently a changing pattern of traffic”
Osaka, 1990, PIANC 27th Congress

“Maintenance of Ports Overseas - East Africa”
1986 ICE Conference on Maintenance of Maritime and Offshore Structure

“Conversion of Bassin Louise Entrance Structure into a Lock”
1985 8th International Harbour Congress - Antwerp

“Construction and Installation of Precast Concrete Caissons and Lock Gates at Existing Bassin Louise Entrance”
1985 ASCE 1083 Convention - Philadelphia



Conference Organisation:

1998 - Member of International Road Federation Organising committee for First International Silk Road Rehabilitation Conference, Ashgabad

Scott Wilson Kirkpatrick & Co Ltd
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Basingstoke,
Hampshire
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England

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Fax +44 (0)1256 460582
www.scottwilson.com



European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/MO

Date 6th February 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned Adrian Percy Tite, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed

A handwritten signature in black ink, appearing to read 'A. Tite', written over a horizontal line.

Date 6th February 2001

Part of the worldwide Scott Wilson consultancy group

Registered in London: No. 880328 Registered Office: Scott House, Basing View, Basingstoke, Hampshire RG21 4JG, England

UK Offices: Abingdon, Basildon, Basingstoke, Birmingham, Chesterfield, Crewe, Edinburgh, Glasgow, Inverness, Leeds, London, Manchester, Morley, Nottingham, Peterborough, Plymouth, Swindon, Telford and over 30 offices worldwide



Certificate No. FS 825



Institute of
Management
Services

This is to Certify that

ADRIAN P TITE

has been elected to membership
of the Institute of Management Services

With the grade of AFFILIATE

Date 14 February 1991

Director & General Secretary



THE INSTITUTION OF CIVIL ENGINEERS

Established 1818

Incorporated by Royal Charter 1828

This is to certify that

ADRIAN PERCY TITE

was on 31st JANUARY 1989 transferred to the class of

FELLOW

of

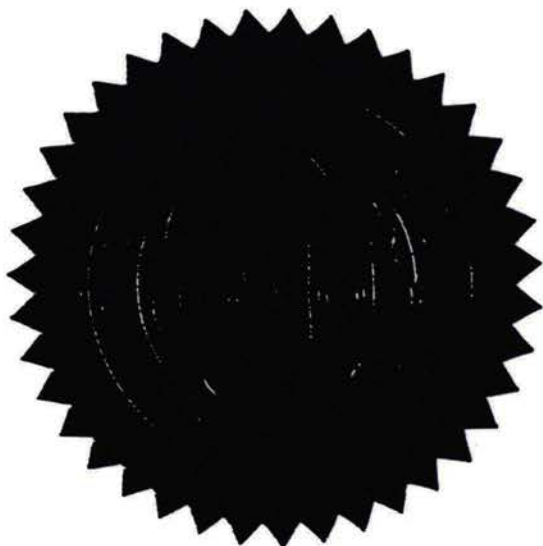
THE INSTITUTION OF CIVIL ENGINEERS

A Society established for the general advancement of Mechanical Science and more particularly for promoting the acquisition of that species of knowledge which constitutes the profession of a Civil Engineer, being the art of directing the great sources of power in Nature for the use and convenience of Man.

WITNESS our hands and Seal at

Westminster, this 1st day of

FEBRUARY 1989



Adrian Percy Tite

..... President

J. S. [Signature]

..... Secretary

UNIVERSITY OF LONDON



Adrian Percy Tite

of

Imperial College of Science & Technology

having completed an approved course of study in

Concrete Structures and Technology

as an Internal Student in the Faculty of *Engineering*

and passed the prescribed examinations has this

day been admitted by the Senate to the degree of

MASTER OF SCIENCE

3 August 1971

Robert



Imperial College of Science and Technology
LONDON

The Governing Body of the Imperial College of Science and Technology
has conferred on

ADRIAN PERCY TITE

the **DIPLOMA OF MEMBERSHIP** of
the **IMPERIAL COLLEGE** in

Civil Engineering: Concrete Structures and Technology

Scaled by authority of the Governing Body :



Date of award 30 July 1971

Penney. Rector

P. E. Mee Registrar



COUNCIL FOR NATIONAL ACADEMIC AWARDS

Adrian Percy Tite

has been awarded the degree of

BACHELOR OF SCIENCE

with Second Class Honours (2nd Division) having completed a course in

CIVIL ENGINEERING

comprising study at **BRIGHTON COLLEGE OF TECHNOLOGY**

and industrial training with

RUDDOCK & MEIGHAN LTD.

AND

JOHN LAING CONSTRUCTION LTD.

1st July 1967

James C. Parkinson

PRINCIPAL

Brighton College of Technology

Kings Horton

Chairman

F. C. Hamlett

Registrar and Secretary

COUNCIL FOR NATIONAL ACADEMIC AWARDS
24 Park Crescent London W1

EUROPEAN FEDERATION
OF NATIONAL ENGINEERING ASSOCIATIONS
FEANI

The President of FEANI confers on
Adrian Tite

the title of EUROPEAN ENGINEER EUR ING

Paris, 22 August 1958

The President of FEANI



Registration number 0081703

The Secretary General





Proposed position in the programme:

**PROJECT CO-ORDINATOR/
ECONOMIST**

- 1. **Family Name:** MAUNSELL-THOMAS
- 2. **First Names:** Mark Alexander
- 3. **Date of Birth:** 15 February 1977
- 4. **Nationality:** British
- 5. **Civil Status:** Single
- 6. **Education**

Institution	Leeds University
Date: from - to	9/95 – 6/99
Degree obtained	BA Hons Spanish, Economics and Development Studies

7. **Language Skills:**

Language	Reading	Speaking	Writing
English	5	5	5
Spanish	4	4	4
French	2	1	1

8. **Membership of Professional Bodies:**

- 9. **Other Skills:** Computer Literacy
Microsoft Word, Excel, Power Point, Project
- 10. **Present Position:** Graduate
- 11. **Years with Firm:** 2 years

12. Key Qualifications:

Since joining the firm Mark has worked in a wide variety of environments for the Institutional Development division, building on his experience of working in developing country markets and his economics background. He has recent experience of economic appraisals as part of feasibility studies for road maintenance management and rehabilitation schemes. He is also responsible for project co-ordination, logistics management and the co-ordination of training courses in the UK and overseas, working closely with the Department's training teams.

He has also been the Logistics and Training Administrator for the **EC Tacis TRACECA International Road Transport Transit Facilitation project**, being run in the 11 countries of the TRACECA region of the Former Soviet Union. His responsibilities include workshop facilitation for 22 training courses being held for transport professionals, liaising with the training team, ensuring all logistical support necessary and providing administrative backup for the project

Current training courses being co-ordinated by Mark include:

- Pilot workshops, funded by EBRD, to transfer Project Management skills and EBRD's Procurement guidelines to Project Implementation Units in the Central Europe and CIS
- Two groups of eight delegates from China on competitive bidding and procurement training in the UK to assist their accession to the World Trade Organisation. Both were multi-country visits to Italy, France, Belgium and the UK.
- Two groups of 6 Indian highway engineers for training on highway maintenance and materials
- Three groups of 6 transport planners from Nizhny Novgorod, Russia, for training in strategic transport planning, financing infrastructure development, Environmental issues in transport planning, and specific logistics challenges.

His responsibilities for Scott Wilson include assisting in the development of a new marketing approach for the Group's world-wide training capability.

Prior to joining Scott Wilson he completed a BA Degree course which focused on the socio-economic and environmental problems faced by developing countries. As a part of this course he spent six months working in Chile where he was co-ordinating the management of various accounts including inter-company loans. He also managed the daily income, co-ordinating its investment to maximise the returns, but also to allow access for the monthly tax date

13. Specific Central and Eastern European and NIS Experience:

Country	Date
Azerbaijan	2000
Kazakstan	2000
Kyrgyzstan	2000
Moldova	2000
Mongolia	2000
Turkmenistan	2000
Ukraine	2000

14. Recent Professional Experience Record:

Date:	<i>June 1999 – to date</i>
Location	UK
Company	Scott Wilson Kirkpatrick & Co Ltd
Position	Graduate
Description	<p>Based within the Institutional Development Department his role is developing his capacity in project management and logistics management. He has also been responsible for the managing of a number of training courses both in the CIS and in the UK. His responsibilities also include assisting in the development of a new marketing approach for the Group's world-wide training capability.</p> <p>EC Tacis: TRACECA International Road Transport Transit Facilitation (1999 – ongoing) Training Co-ordinator The objectives of which are to assist in the promotion of international trade by road transportation, to provide trained transport operators capable of developing the road transport sector and to promote international trade and transport agreements in the 11 countries of the TRACECA region. The project will create permanent road transport training centres, provide in-country training in CPC, ADR and SafeTIR, provide technical assistance to enable the 11 states to sign and adhere to the TIR and ADR conventions, and procure equipment for implementation of the SafeTIR system throughout the region.</p> <p>Training administrator for courses in Co-ordination of pre-course activities for workshops to be run in the 11 countries of the TRACECA region. Responsibilities included liaison with local staff, assisting in the preparation of workshop training modules for delivery in country, financial management of the seminars, logistic management for each training course, assisted in the sustainability of the training centres by advising in future activities and financial management. It is also expected that mark will return to a number of the countries over the Summer 2001 to review their progress with adopting the recommended technical, administrative and financial procedures.</p> <p>World Bank: Retraining of Road Sector Professionals, Vietnam (2001 ongoing) UK Co-ordinator Mark has been involved in a number of different ways on this project. He has been co-ordinating the team of international experts, their inputs in country, and their preparation of enough training material to complete three four week courses and one eight week course. His management skills have also been required for the development of the curriculum for the training of the 30 Vietnamese trainers and 7 Vietnamese highways staff. He is due to be organising the training visit for a group of 10 Supervisors later this year here in the UK.</p>

World Bank: Urban Transport Project, Kyrgyzstan (2000 ongoing)**Transport Economist**

Mark drew up of the economics component of the feasibility study reviewing the options for rehabilitation for road maintenance of 150km of urban roads in Bishkek, Osh and Jelal-Abad. He worked closely with the pavement engineers, gathered vehicle operating costs, and ran HDM 4 to demonstrate the options that should be rehabilitated.

EBRD Project Induction Workshop Material (1999-2001)**UK Co-ordinator**

Co-ordination of pre-course activities for workshops to be run in 3 as yet unspecified countries of the FSU region. Liaison with local staff, in the identification of training venues, and facilities, preparation of participant pre-course evaluation questionnaires, and assisting in the preparation of workshop training modules for delivery in country. It is expected Mark will travel to the region during the training period to assist in the administration of the of the training and course evaluation.

EU China Public Procurement Pilot Project (1999 – ongoing)**Project Co-ordinator**

International project co-ordinator for the EU-China Public Procurement Pilot Project, the elements of which include providing training to Government officials in procurement procedures as China introduces competitive bidding.

Responsibilities include the organisation and logistics management for two groups of 8 delegates visiting the UK on month long Study Tours to enhance their understanding of competitive procurement techniques through studying practical examples.

The role includes managing delegate travel from China on a tour of 1 month through 4 European countries, arranging all logistical requirements from visas and visits to such as BSI, the Treasury, Nottingham University etc, and ensuring social events and free time are also catered for.

Assisting the international Training Manager to write contractor reports on the tours, financial accounting for project tour budgets, and client billing.

Date: from – to	<i>September 1997 to May 1998</i>
Location	Chile
Company	Chiletabacos
Position	Internship
Description	Responsible for the management of inter-company loans and account reconciliation. He also worked in the Treasury, laying aside overnight balances in expectation of the monthly tax date.

15. Others

Workshops and Seminars Attended:

Date	Duration	Title
November 3 rd 1999	1 day	Opening conference for the Oxford Centre of Sustainable Development Seminar Participant
November 9 th 1999	1 day	“Scott Wilson Business Development Internal Marketing Day,” delivered presentation on the role of the international department and where the future business lay. Follow up work involved compiling a SWOT analysis of Economics within the department. Presenter
November 10 th 1999	Evening	“The Tractor Factor: Ploughing a road out of poverty. Increasing the contribution of tractors to agricultural and rural infrastructure development” Seminar Participant
December 15 th 1999	1 day	“Green Engineering and Environmental Issues.” Investigating Civil Engineers’ responsibility for environmental planning at all stages of the project cycle. Seminar Participant
January 19 th 2000	1 day	“Financial Management,” Overview of business finance, profit and loss accounts, Balance sheets, key accounting ratios, cash flow statements etc. Seminar Participant

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European Commission
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Belgium

Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/MMT

Date 8th February 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Mark Alexander Maufsell-Thomas, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed

A handwritten signature in black ink, appearing to read 'Mark Maufsell-Thomas', written over a horizontal line.

Date

8/2/01





The University of Leeds

DEGREE OF BACHELOR OF ARTS

It is hereby certified that

Mark Alexander Maunsell-Thomas

was admitted to the degree of Bachelor of Arts

with Honours Class II Division i

in Spanish Language and Literature Major with Economics Minor

in June 1999

Alan Wilson

VICE-CHANCELLOR

John Robinson

REGISTRAR



Proposed position in the programme:

TEAM LEADER - MODULE A

1. **Family name:** BAYLEY
2. **First names:** Anthony Nigel
3. **Date of Birth:** 15 March 1945
4. **Nationality:** British
5. **Civil status:** Married
6. **Education:**

Institution	Oundle School
Date:	1956 - 1963
Qualification obtained	Advanced Level General Certificate of Education

7. **Language skills:**

Language	Reading	Speaking	Writing
English	5	5	5
French	3	3	2
Russian	1	1	1

8. **Membership of professional bodies:**
 - Member Institute of Logistics
 - Member Market Research Society
 - PPL 1 (Civil Aviation Authority)
9. **Other skills:** Computer literate
10. **Present position:** Associate Consultant
11. **Years with firm:** 15

12. Key qualifications:

Over 30 years experience in international transportation - air, marine, rail and road - both as an operational manager in the private sector and for the last 16 years as a Transport and Logistics Consultant. Projects have extended through Europe, the CIS, Africa, the Far East and have involved multi-modal logistics, freight forwarding, port operations, air cargo, trade facilitation, institutional and corporate reform in the freight industry, regulatory changes to enhance trade, warehousing and terminal design, customs procedures, pricing structures, and movement of hazardous cargo. He has worked for many of the international funding agencies including the EU, EBRD, World Bank and ADB.

He has been involved in development of trade facilitation and Customs in the CIS for the last 4 years. He was the Team Leader for the TRACECA Trade Facilitation and Customs Procedures project and has undertaken evaluations at all the nominated border crossings and is familiar with border procedures in Central Asia. Under the CBC programme he was responsible for definition of the border equipment requirements and in the TRACECA Road Transit project he is working with Customs on the procurement and installation of IT equipment in support of SafeTIR. He was responsible for the development of the Cross Border Framework Agreement for the ADB, which this project is supporting, and is currently designing a Customs Reform Programme covering Central Asia for the ADB, including IT and border development.

13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Kazakstan	1997 - present
Kyrgyzstan	1997 - present
Russia	1995 - present
Tadjikistan	1997 - present
Turkmenistan	1997 - present
Uzbekistan	1997 - present

14. Professional Experience Record:

Date:	<i>1982 - present</i>
Location	Worldwide, mainly CIS
Company	Independent, mainly Scott Wilson
Position	Associate Consultant
Description	<p>Trade Facilitation Specialist to develop a regional programme for development of a Customs Reform Programme covering Central Asia and Xinjiang Region of China. This required evaluation of existing constraints and programmed IFI support. Proposals were made for a programme of policy advice, technical assistance and targeted development loans leading towards sequenced reform for agreement at a Ministerial Conference. Proposals include development of IT systems and border infrastructure and procedures. (ADB)</p> <p>Logistics and Customs specialist on project to improve the traffic flows on TENs Corridors No II and IX. A Feasibility Study was undertaken on the development of new border facilities at Brest, which is the main road entry point from the EU/CEEC to Belarus, Russia and through to Kazakstan. This included concept design and costing of a new freight terminal. In addition a Feasibility Study was completed for a Multi-Modal Freight</p>

Terminal in Minsk. Later Team Leader to provide Feasibility Studies for redevelopment of 4 selected rail border crossings in Ukraine and Moldova (EU).

Team Leader for project to develop the TIR system throughout the southern republics of the CIS and Mongolia by implementation of the Convention. This requires changes to national legislation, the development of international transport associations and their development into Guaranteeing Associations in the countries not within the system. In complying countries, the SAFETIR computer systems is being developed and extended to the main offices of exchange through a 0.5 Million Euro procurement programme (EU).

Team Leader for technical assistance programme for the development of the border crossings between the EU-CEEC and NIS. The project required the production of documentation to the EU Commission to enable them to activate ECU34 million of border improvement funding. This involved identification of the specific needs of the 18 borders, production of individual feasibility studies covering infrastructure development, equipment and training on new procedures. Following approval project tender files and Memorandums of Agreement were developed with State Customs. Project included providing design modifications to the layout of passenger and freight terminals in line with best international practice (EU).

Transport Consultant for project to identify the border constraints for trade and road transportation between Kazakstan and Kyrgyzstan in preparation for a major road rehabilitation programme. Recommended solutions and an Action Plan were developed to provide compatible policy and regulations either side of the border to expedite transit. A Cross-Border Framework Agreement was produced to both Governments to sign as a condition of the Loan Agreement (ADB).

Team Leader for EC TACIS Trade Facilities, Customs Procedures, and Freight Forwarding project in the CIS countries (TRACECA) for project to harmonise transport and trade documentation, improve customs procedures and facilities, introduce new management information systems, and develop a multi-modal freight forwarding industry. Project was site based with extensive travel inspecting ports, road and rail terminals and 78 border crossing throughout the Caucasus and Central Asia, including all the nominated crossings.(EU)

Trade Facilitation Expert for EC TACIS Legal and Regulatory Framework Project in the CIS countries (TRACECA), including Kazakstan, with specific responsibility for advising on freight forwarding, Customs codexes, and warehouse and depot regulations and recommending changes to existing legislation to enhance trade. (EU)

Transport Specialist for project to evaluate the policies and strategies of the TRACECA programme covering the southern republics of the CIS on behalf of the European Commission. This required an appraisal of the multi-modal transport programme, its policy objectives and evaluation of selected individual projects in order to provide recommendations on

possible re-orientation and improvements in the project cycle. This was in order to make the TRACECA programme more effective in meeting the needs of both the Commission and the recipient countries (EU)

Team Leader for project to provide Strategic Transport Plans for the Nizhny Novgorod Region. The Plan is designed to cover both passenger and freight transport by road, rail and internal waterways and to further develop EU corridor No 2 through to the Urals. This involved research on the trade and transport throughout the area to establish planning priorities for the removal of constraints and development of freight transport by all modes. All planning documents provided and facilitated initial consultation process (EU).

Team Leader for major project to restructure the Russian Internal Waterways and River Sea Shipping to permit access by EU shipping. Initial work involved strategic planning of the river ports and commercial aspects of river-sea shipping operations and research in traffic profiles. This was followed by development of Business Plans at three of the main ports to restructure management, improve the operations and port logistics and to introduce new accounting methodologies.(EU)

Port Operations Specialist for project at Russian ports of Taganrog and Azov in the Sea of Azov. The work involved the provision of specific operational plans to improve the performance of the port by improved layouts, operational planning and the use of dedicated berths for specific cargoes, such as containers. Operational layouts were provided and agreed at both ports and improvements in trade facilitation were agreed with Customs. Research was undertaken on flows of specialised traffics to identify future demand in those sectors (EU)

Team Leader for feasibility study to restructure and privatise the state-owned Georgian Shipping Company. This required an appraisal of the fleet composition, valuation, determination of sale policy, administrative structure and investigation of potential privatisation options. A programme was recommended to the Ministry of Transport commencing with the formation of a joint stock company with a fleet rationalisation strategy. (World Bank)

Team Leader for technical assistance project to help the Government of Uzbekistan to re-route their exports of cotton through the Georgian ports. This required a detailed review of the European cotton market and international buying systems, monitoring of the logistics and recommending improvements in port and warehousing facilities (EU).

Marketing Strategy and Trade Facilitation Expert for project to re-develop the Port of Aktau in Kazakstan on the Caspian Sea. Responsible for identification of potential traffic flows and the development of a Port Marketing Strategy to attract additional cargo through the port and ensure rapid transit by simplification of trade and port procedures. (EBRD)

Port Logistics/Trade Facilitation Expert for project to re-develop the Port of Novorossysk on the Black Sea from a naval to a major commercial port. Responsible for evaluation and development of the port/inland transport

	<p>interface (road/rail), development of marketing, simplification of documentation and procedures and the re-planning of the layout of the Eastern Dock. Extensive negotiations were held with port Customs to facilitate movements to reduce storage dwell times (EU)</p> <p>Air Cargo Consultant to the Yerevan Airport Authority in Armenia for appointment of management company for their cargo operations. Developed the tendering process, documentation and contracts and negotiated appointment of contractor. This was followed by full concept design of the new terminal and cargo aprons. Analysis was made of existing freight activities and processes for both passenger and heavy freighter aircraft, including ground handling, documentation systems and hazardous cargo handling procedures. Full design package submitted to design and build contractors. (EBRD).</p>
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Date:	1980 - 1982
Location	UK and Europe
Company	MM Distribution Consultants
Position	Senior Consultant
Description	<p>Transport Consultant appointed to assist major Dutch forwarding group in restructuring their UK operations due to unsatisfactory results. This covered port and liner agency work, their international trucking services and their air cargo division. This involved appraisal of their financial and operational performance and recommendations on specialisation and new management.</p> <p>Marine Consultant for project to restructure the management of second largest shipping company in Italy which operated passenger, general cargo, tanker and bulk fleet. Recommendation made on splitting of board and operating functions with profit centre management. Also involved in a diversification study.</p> <p>Transport Consultant appointed to examine the European services division of large Dutch shipping and forwarding company covering port agency, surface and air forwarding and river transport. Recommendations were made on networking in order to provide an integrated service organisation. Later involved in purchase of international trucking company.</p>



CURRICULUM VITAE:

Anthony BAYLEY

Date:	<i>1963 - 1982</i>
Location	UK and Europe
Company	Ellerman Lines
Position	Development Manager NW Europe
Description	<p>Development Manager responsible for development of RoRo passenger/freight services in NW Europe, multi-modal forwarding (including air cargo and air charter), and international road haulage operations.</p> <p>General Manager Cargo handling division responsible for RoRo terminals and conventional stevedoring operations in UK and Scandinavia. This included advising on terminal layout of both the freight and passenger areas.</p> <p>Trade Manager responsible for liner services to Scandinavia, Mediterranean and North America. This included weekly services to Lisbon and Oporto.</p> <p>General Manager Road Haulage division responsible for UK and International Services.</p>

European Commission
Tacis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

SCR-E/110622/C/SV/WW

HSMSBZ

5 February 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Tony Bayley - Statement of Professional Experience

As a self-employed contractor I can certify that the attached CV correctly reflects the experience gained by me both on contracts for Scott Wilson Kirkpatrick and Co Ltd and also with other clients and agencies.

In addition I certify the work undertaken before the establishment of Napier Consultants was undertaken as an employee of the specified companies and the CV accurately reflects the experience gained during that period.

Signed:



Tony Bayley

European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

SCR-E/110622/C/SV/WW

HSMSB/AB/001

25th January 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Anthony Bayley, confirm my availability for assignment on the above project exclusively for the Consortium led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed



Date 26 January 01

Proposed Position in the programme: CUSTOMS IT SPECIALIST

1. **Family Name** SCHWARZER
2. **First Names** Michael George
3. **Date of Birth** 11 May 1949
4. **Nationality** British
5. **Civil Status** Married
6. **Education**

Institution	Wigan Technical College
Dates	1967-1969
Degrees/Diplomas	Ordinary National Diploma, Electrical/Mechanical Engineering
Institution	Huddersfield Polytechnic
Dates	1969 – 1972
Degrees/Diplomas	BSc Electronics

7. **Language skills (Mark 1 to 5 for competence)**

Language	Reading	Speaking	Writing
English	5	5	5
German	2	3	2

8. **Membership of Professional bodies**
9. **Other skills** Computer Literate
EDI Experience
Overseas Work Experience
10. **Present Position** EDI Specialist
11. **Years with Firm** 4 years
12. **Key Qualifications**

Mike Schwarzer has almost 30 years experience of the IT industry, of which the last 14 years have been concerned with development of IT solutions for the transport environment that are designed to enhance and control trade and transport. He has worked on Takis projects with Scott Wilson in the CIS for the last 3 years and is familiar with the systems used by many CIS Customs, as well as the existing IT border control methodologies. He is currently working on development of IT systems with Customs on an existing TRACECA project. He has been responsible for development and design of community-type systems involving Customs control, DTI, use of EDI and is familiar with international Customs software.

**13. Specific experience in Central and Eastern European and NIS countries**

Country	Date: From	To
Russia	01/93	11/2000
Ukraine	11/99	11/2000
Moldova	11/99	11/2000

14. Professional Experience Record:

Date	1998 – 2000
Location	Switzerland, TRACECA Republics of the CIS, including Kazakstan, Kyrgyzstan and Uzbekistan
Company	Scott Wilson Kirkpatrick
Position	IT and EDI Team Leader
Description	<p>TACIS Project:</p> <p>International Road Transport Transit Facilitation, TRACECA Project</p> <p>Technical Expert/Team Leader responsible for the technical liaison between beneficiaries – Country Customs and Road Transport Organisation and the IRU (International TIR) in Geneva to facilitate additional techniques utilising Computer Technology and EDI communications to speed up the flow of SafeTIR discharge data. SafeTIR utilises standard WP30 formatted data strings</p> <p>Responsible for the specification and acquisition of the necessary computer and communication equipment via EC tender regimes.</p> <p>Installation, set up and operation of these improvements is expected by mid 2001.</p>

Date	1998 –2000
Location	Moscow and Nizhny Novgorod, Russia
Company	Scott Wilson Kirkpatrick
Position	IT and EDI Specialist
Description	<p>TACIS Project:</p> <p>Internal Russian Waterways and River-Sea Transport Project, ref. TNRUS 9603</p> <p>Technical expert responsible for the technical evaluation, system specification, selection and procurement of a Port Management system for the Port of Nizhny Novgorod and its associated Logistics Centre. The system has been installed and is in test phase at present</p>



Date	1998 – 2000
Location	Nizhny Novgorod, Russia
Company	Scott Wilson Kirkpatrick
Position	IT and EDI Team Leader
Description	<p>TACIS Project:</p> <p>Nizhny Novgorod Regional Transport Development, re TNRUS 9804</p> <p>Technical expert/Team Leader responsible for the technical evaluation, design, specification and selection of an IT system for the Nizhny Novgorod Transport community, linking and exchanging data between the transport department of the regional government and the major transport operators of Road, Rail and waterways including the Nizhny Novgorod Port.</p> <p>The project involves a Multimodal Information system to provide data collection on all modes and types of cargo movements within the Nizhny Novgorod region to allow overall development of transport within the region.</p> <p>Data from the system, in addition to statistical purposes, will be automatically provided and transmitted to a newly developed Freight Traffic forecasting Model.</p> <p>The 5 interlinked systems are currently being installed with a live start date early 2001.</p>

Date	1998 –1998
Location	Jeddah & Riyadh, Saudi Arabia
Company	Maritime Cargo Processing, UK
Position	IT and EDI specialist
Description	<p>MCP Internal Project:</p> <p>Sales/Technical visit, funded by Government officials to ascertain if the widely used Felixstowe Port Community system (FCP80) could be adapted for use throughout Saudi Arabia.</p> <p>Discussions and technical presentations to Jeddah Port and related community partners as well as Government Officials in Riyadh.</p>

Date	1986 to date
Location	UK Wigan
Company	Ideal Internet Services Limited
Position	Director
Description	<p>Responsible for the development and implementation of the UNITRACK total concept computer system. This system consists of modular software packages for the control of containers, vehicles, general and bulk cargoes, including integrated EDI facilities in ports and terminals, Inland Clearance Depots, M&R depots and for owned container fleets.</p> <p>EDI facilities in the Shipping and Distribution arena are predominantly UN/EDIFACT style messaging originally using a plethora of communications means, now almost entirely via the Internet medium:</p> <p>UN/EDIFACT Message Formats include:</p> <ul style="list-style-type: none"> Customs Cargo report – CUSCAR Ingates and Outgates – CODECO Discharge and Loading – COARRI Dangerous Goods notification – IFDGN Customs declaration – CUSDEC Customs response – CUSRES Container pre-arrival notification – COPARN <p>Knowledge of EDI methodologies for Direct Trader Input (DTI), Inventory Control, Imports, Exports, Dangerous Goods.</p> <p>Full understanding of the benefits for the Port Community including: Port Operators, Stevedoring Organisations, Clearing Agents, Local, Regional and Country Customs, Shipping/Liner Agencies, Clearing Agents, Road and Rail companies</p> <p>The UNITRACK systems operate on INTEL and Microsoft industry standard hardware and software platforms. The functions are fully integrated and utilise on-line processing techniques. Provides for planning, managing and tracking containers, general cargo and vehicles with a port or depot environment.</p> <p>Responsible for selling and installation of the system in the United Kingdom to Sea Containers and Sealink ferries for their UK ports as well as other operational ports. In addition systems are installed for P&O Australia in their terminal operations world wide. Assisted in the system analysis and installation at major road transport organisations in the UK, Belgium, Holland, Malaysia and Singapore. Undertaken investigation for installations of systems in CIS countries</p>

**CURRICULUM VITAE:****Mike G SCHWARZER**

	<p>System Development: Responsible for the development of specialist computer based solutions for the transport industry. Initial work for Sea Containers to manage their storage, maintenance and repair depot activities. This was later extended to include their operational, management and financial requirements.</p> <p>Responsible for leading the development team in developing new software packages for other ports and shipping companies, along with integration into community port EDI systems.</p>
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Date	1985 to 1986
Location	UK Manchester
Company	Information Technology Limited
Position	Area Sales Manager
Description	<p>As Area Sales Manager responsible for the marketing and sales development of the MOMENTUM range of mini computers to new and existing Users.</p> <p>This was accomplished using a number of software houses who had solutions targeted within specific market sectors.</p>

Date	1981 to 1985
Location	UK Stockport
Company	Computer Automation Limited
Position	Senior Support Consultant/Senior Sales Executive
Description	<p>Senior Support Consultant responsible for technical pre and post sales activities with the companies major accounts in northern England and Scotland.</p> <p>Responsible for servicing accounts in the North West of England and Wales, particularly the large insurance companies.</p>

**CURRICULUM VITAE:****Mike G SCHWARZER**

Date	1978 to 1981
Location	UK
Company	International Computers Limited
Position	Principle Engineer Grade 1 – Marketing Division
Description	<p>Based out of ICL's Stevenage offices as a Principal Engineer Grade 1 in their Marketing Division. Responsibility for all technical aspects of the ME29 system, providing the prime interface into the design team to ensure that the system design reflected the companies engineering strategy.</p> <p>Prior to products launch, responsible for setting up all aspects of the maintenance service, world wide, and in 1980 provided total technical responsibility for promoting the ME29 system in Canada, USA and Mexico utilising local staff.</p>

Date	1976 to 1978
Location	UK/USA/Caribbean
Company	International Computers Limited
Position	Engineer/Engineering Manager
Description	<p>Responsible to ICL's International Division for the North American market special variant of the 2903/4 system. This involved UK build and assembly and full responsibility for the launch of the first system in Trinidad.</p> <p>Acted as Engineering Manager in Trinidad for 6 months whilst local staff returned to the UK for extensive technical training.</p> <p>Involved in launch of remaining 'special' 2903/4 system in North America.</p>

Date	1973 to 1976
Location	World wide
Company	International Computers Limited
Position	Engineer Grade 1 – International Support
Description	<p>Based out of ICL's Customer Engineering Division Manchester Offices as a System Support Engineer Grade 1 responsible for providing technical support on their 1900 and 2903/4 range of systems in the UK and overseas.</p> <p>This role required extensive and very short notice travel throughout the world.</p>



CURRICULUM VITAE:

Mike G SCHWARZER

Date	1972 to 1973
Location	UK Winsford, Cheshire
Company	International Computers Limited
Position	Factory Test Engineer
Description	<p>Originally employed as a test engineer with promotion to engineer with responsibility for OEM equipment at ICL Winsford factory.</p> <p>Responsibilities included producing the necessary equipment testing procedures and training additional technical staff.</p>



Proposed position in the programme

PROCUREMENT SPECIALIST

- 1. **Family name:** REDWOOD
- 2. **First names:** Geoffrey Michael
- 3. **Date of Birth:** 30 September 1951
- 4. **Nationality:** British
- 5. **Civil status:** Single
- 6. **Education:**

Institution	Guildford College of Technology
Date:	Sept 1969 to Oct 1973
Diploma obtained	Ordinary & Higher National Diploma in Business Studies Institute of Chartered Secretaries

Institution	Basingstoke College of Technology
Date:	Sept 1990 to June 1994 - Part Time
Qualification obtained	Institute of Purchasing & Supply

7. **Language skills:**

Language	Reading	Speaking	Writing
English	5	5	5

- 8. **Membership of professional bodies:** Member of the Chartered Institute of Purchasing & Supply (MCIPS)
Fellow of the Institute of Chartered Secretaries & Administrators (FCIS)
- 9. **Other Skills:** Computer literate

Member of the Association of Consulting Engineers
Legal and Liability Group
- 10. **Present position:** Company Secretary/Head of Procurement
- 11. **Years with firm:** 16

12. Key qualifications:

Geoff Redwood has extensive experience of contract law, contract documents and hands on procurement in both the public and private sectors. As Head of Procurement within the procurement agency arm of Scott Wilson he has been Project Manager on a number of major procurement projects undertaken by the Company in recent years.

He is currently an Advisor and member of the procurement team dealing with the supply of computer equipment for custom's offices and training centre equipment, including ADR equipment, for 11 countries for TRACECA and Takis.

He has in-depth experience in the preparation of procurement procedures, tender documents, tender evaluation, contract terms and conditions and insurance.

In addition to hands on procurement he has prepared and delivered training material in procurement and related topics both in the UK and overseas. His Company Secretarial background has given him a good working, as well as theoretical, knowledge of mercantile law and, in particular, contract law and his experience of working overseas ensures that where appropriate issues are viewed from an international perspective.

Geoff was a member of the team of experts working on the EC funded China Public Procurement project and in this capacity was involved in the delivery of in-country training courses on public procurement to Chinese officials and participated in an international workshop in Beijing on the now enacted Chinese Bidding Law, an important piece of procurement legislation critical to China's entry into the World Trade Organisation.

Geoff has been responsible for drafting procedures and guidance on many contractual related issues within the Scott Wilson group, including standard forms of contract and collateral warranties.

13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Bosnia	2000
Georgia	2000
Kazakstan	2000
Turkey	2000

Experience of Specific Countries with Transition Economies:

Country	Date:
China	1999 – 2000
Egypt	1978 – 1983
Mozambique	1996
Uganda	1983 – 1984

14. Professional Experience Record :

Date	1984 - to date
Location	Basingstoke, England
Company	Scott Wilson Kirkpatrick & Co Ltd
Position	Company Secretary/Head of Procurement
Description	<p><u>Procurement</u> Advisor and member of the procurement team dealing with the supply of computer equipment for custom's offices and training centre equipment, including ADR equipment, for 11 countries for TRACECA and Takis as part of the International Transport Transit Facilitation Project. He managed the entire process from the drawing up of specifications to the evaluation of the submitted proposals. Responsible for the procurement function within company including the management of all DFID funded procurement contracts. Project Manager for bi-lateral and multi-lateral aid funded procurement projects in Jordan (£3 million), Ethiopia (£1.5 million), Mozambique (£2 million), Philippines (£500,000), India (£300,000), China (£130,000), Vietnam (£100,000), Nepal (£150,000) and Egypt (£400,000), Ghana (£50,000). The above projects have required the procurement, by national and international tender, of a wide range of equipment and services including computers and related hardware and software, office equipment, vehicles and spares, laboratory equipment, specialist survey equipment, tools and workshop supplies, water well drilling equipment and industrial plant monitoring instruments. These projects have given Geoff Redwood wide ranging hands-on experience of all aspects of the procurement cycle which, coupled with experience of living and working in developing economies, ensures that the problems associated with sourcing, ordering, logistics etc are fully understood and addressed in the strategy adopted for each project.</p> <p><u>Training</u> Preparation and delivery of training material covering public sector procurement practice and procedures, tender document preparation, dispute resolution, Incoterms, Documentary Credits, specifications and prequalification. Delivery of training courses and workshops in China,</p>

	<p>Georgia, Bosnia and Kazakstan on EC and EBRD funded projects.</p> <p><u>Consultancy</u> Advising a major international contractor on their procurement strategies and structures and the development of policy initiatives in relation to procurement and quality assurance.</p> <p><u>Other Duties</u> As Company Secretary, responsibilities include corporate legal affairs, statutory compliance and insurance.</p>
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Date	1983 - 1984
Location	Kampala, Uganda
Company	LH Manderstam & Partners
Position	Resident Project Accountant
Description	Responsible for financial aspects of national survey of ginneries including financial and general investigations of ginnery owners. Preparation of reports on ginneries, together with recommendations for factory rehabilitation and loans, for submission to Uganda Commercial Bank and World Bank under a US\$70 million IDA agricultural rehabilitation credit.

Date	1978 - 1983
Location	Alexandria, Egypt
Company	LH Manderstam & Partners
Position	Resident Administration Manager and Project Accountant
Description	<p>Responsibilities included management accounting for the project, budget preparation, variance analysis, annual accounts and reconciliations. Coordinating purchase control, imports, storage and distribution of equipment from Europe, USA and Asia (US\$50 million approx.) as well as local Egyptian materials and services. Tender committees for international and local procurement contracts. Insurance and claims.</p> <p>Administration of travel, housing, welfare for consultants and foreign personnel both in Alexandria and for the fourteen factory sites spread throughout Egypt. Routine office administration for the combined client/consultant's head office in Alexandria. Production of monthly, quarterly, and annual project reports to Government and World Bank.</p>



CURRICULUM VITAE:

Geoffrey M REDWOOD

Date	<i>1975 - 1978</i>
Location	Epsom, England
Company	WS Atkins/Atkins Computing
Position	Administration Manager
Description	Responsibilities included the provision of all utilities and services to the company including the procurement function and telecom arrangements for both speech and data. Office accommodation; set up new company offices (re-siting of Head Office plus three new regional offices). Supply and maintain approximately 250 computer terminals for both client and company use. Develop and maintain general administrative and clerical procedures.

Date	<i>1973 - 1975</i>
Location	Farnham, England
Company	Nelco Ltd
Position	Assistant to Financial Director
Description	Duties included assistance with financial and monthly management accounts. Routine accounting associated with Nominal, Purchase and Sales ledgers. Overhead budgets. Cost of sales analysis. Fixed Assets register. Company insurances. (Also wages and salaries during holidays or absence of wages office supervisor.

Scott Wilson Kirkpatrick & Co Ltd
Scott House,
Basing View,
Basingstoke,
Hampshire
RG21 4JG
England

Telephone +44 (0)1256 461161
Fax +44 (0)1256 460582
www.scottwilson.com



European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/GR

Date 30th January 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Geoff Redwood, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

A large, handwritten signature in black ink, appearing to read 'G Redwood', written over a horizontal line.

Signed

6.2.01
Date





The Institute of Chartered Secretaries and Administrators

This Certifies that

GEOFFREY MICHAEL REDWOOD

was admitted ASSOCIATE of The Institute of Chartered Secretaries and Administrators
on the fifteenth day of April nineteen hundred and eighty.

Given at London subject to the provisions of the Royal Charter of the Institute.



..... President.

..... Vice-President.

..... Secretary.

Membership number 73062

THE
CHARTERED INSTITUTE OF
PURCHASING & SUPPLY



This is to Certify that

Geoffrey M Redwood

has been admitted as a

Member of the Institute

given under our hands and seal

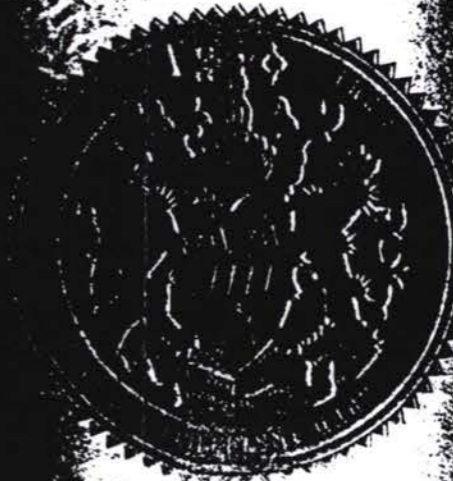
This 10th day of June 19 94

President N. J. Eator

Director General Peterson

Member of Council KR Godwin

941123



Proposed position in the programme:
CUSTOMS EXPERT

1. **Family name:** Kursietis
2. **First names:** Valdis Janis
3. **Date of birth:** 11th November 1955
4. **Nationality:** British/Latvian (dual nationality)
5. **Civil status:** Married
6. **Education:**

Institution	Danish School of Public Administration
Date:	1994
Diploma obtained	Diploma in Senior Management and Leadership.

Institution	Crown Agents
Date:	1996
Degree obtained	Training course on Project Management and PRINCE methodology

7. **Language skills:**

Language	Reading	Speaking	Writing
Latvian	5	5	5
English	5	5	5
German	4	3	3

8. **Membership of professional bodies:** Charter Member of Riga "Ridzene" Rotary Club
Secretary General of Latvian Portage Association
Founder member of Latvian Transatlantic Organisation
9. **Other skills:** Latvian/English translation skills – translated the Latvian Customs Code and the current Customs Law into English

Computer literate – MS Word, Visio, Excel, Access
10. **Present position:** Independent Customs Consultant
11. **Years within the firm:** Self employed for the last 2 years

12. Key qualifications:

Valdis Kursietis has extensive experience as a serving customs officer and since then working with private companies advising them on customs procedures. He is familiar with current customs software packages and the computerisation of customs procedures. He has been involved in the assessment of the User Requirement, assessment of conceptual design, preparation, modification, completion of standards and format for the implementation of the UNCTAD ASYCUDA ++ Customs Processing and Accounting System. He is also familiar with the situation in FSU countries and the hurdles that now need to be overcome.

13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Latvia	1992 – 2000

14. Professional Experience Record:

Date:	<i>January 1999 – to date</i>
Location	Riga, Latvia
Company	
Position	Independent Customs consultant
Description	<p>Customs consultancy, registered with PHARE/TACIS Central Consultancy Register: LAT - 22060</p> <p>Private consultancy on Customs and business management – consultancy to private companies on Customs procedures and advice on problems relating to individual cases. Presentation to trade representatives of training seminars relating to Customs Valuation.</p> <p>Official projects include work as short-term legal expert on the PHARE Customs Legislation Alignment project in Latvia.</p>

Date:	<i>January 1997 – January 1998</i>
Location	Riga, Latvia
Company	BBC BALTIC CONSULTANTS, Riga Office
Position	Managing Partner
Description	<p>Customs and business consultancy firm, registered with PHARE/TACIS Central Consultancy Register:</p> <p>Private consultancy on Customs and Business Management.</p> <p>Consultancy Tasks performed including the Phare Modernisation of Latvian Customs Administration Project, concerned with:</p> <ul style="list-style-type: none"> • Adoption of Customs new legislation and procedures – review of existing legislation and procedures and harmonisation with EU requirements • Modernisation of Customs Administration – review of current procedures and proposals for appropriate amendments

	<ul style="list-style-type: none"> • Training activities – analysis and review of training needs and proposals for meeting them • Computerisation of Customs operations – drafting of the User Requirement, assessment of conceptual design, preparation, modification, completion of standards and format for the implementation of the UNCTAD ASYCUDA ++ Customs Processing and Accounting System • Quality assurance of the User Requirement to the standards and formay required by the Latvian ASYCUDA Co-ordination Unit <p>Also worked on Eurocustoms and Crown Agents Projects – Assistant to the Crown Agents TIMS Implementation Team and the Eurocustoms Border Crossing Project Team</p> <p>Prepared English language translations, of Latvian Customs Legislation for harmonisation with EU Customs legislation.</p>
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Date:	1994 – 1996
Location	Riga, Latvia
Company	Latvian State Revenue Service
Position	1. Advisor to the Director General (1994-1996), State Revenue Service and 2. Project Manager (1996)
Description	1. responsible for advising the SRS Director General on customs matters, including policy, legislation, operational and personnel matters, liaison with EU PHARE Representatives, WCO, Eurocustoms, IMF, World Bank 2. Project Manager for the Revenue Accounting System Modernisation Project - responsible for compiling the project brief, co-ordination of the work of foreign short-term experts and local working groups, reporting to the Project Director and Project Board, liaison with the Customs Administration Modernisation Programme Management Unit in reviewing the current revenue accounting system and drafting proposed changes to the system by the introduction of computerisation.

Date:	<i>1992 - 1994</i>
Location	Riga, Latvia
Company	Latvian Customs Department
Position	1. Customs Inspector, Riga Maritime Passenger Port (10/92-8/93) 2. Director General, Latvian Customs (08/93-09/94)
Description	1. responsible for examination and clearance of passengers baggage, import/export cargoes, assessment of duty charges 2. responsible for the overall running of the Latvian Customs Administration, including formulation of policy, review of Customs legislation and drafting of proposed amendments to the legislation, cross-disciplinary co-operation with the Taxation Service, Financial Police and Borderguards, implementation of University level training courses for Customs Officers, representation of the Customs Dept. in international meetings

Date:	<i>1977 - 1992</i>
Location	Chatham, UK
Company	H.M Customs and Excise (U.K.)
Position	<ul style="list-style-type: none"> • Officer, Medway Customs Division (1977-1979) • Officer Dartford, Chatham Excise Districts, Medway Oils District, Officer-in-charge, Medway Administration District (1979-1990) • Officer, Thamesport Container Base (1990-1992)
Description	<ol style="list-style-type: none"> 1. Documentary control of import declarations, scrutiny selection for examination, examination and clearance 2. responsible for inland control of import/export companies; involving security and verification of traders accounts and records; responsible for administration services for the District, incl. supervision of annual leave records, stationary, buildings 3. scrutiny of import and export declarations, selection for examination, physical examination of cargoes, clearance

Date:	<i>1975 - 1977</i>
Location	London, UK
Company	H.M. Customs and Excise (U.K.)
Position	Administration Officer, Customs HQ
Description	Responsible for preparing reckonable pay histories for retiring officers

15. Others:

Lectures:

- G24 Conference, Brussels/Belgium, September 1993
Report on the assimilation of the Latvian Customs Service into the State Revenue Service, proposed changes and modernisation including ASYCUDA systems appraisals for integration purposes
- Danish – Latvian Business Businessmen’s Association Copenhagen/ Denmark, November 1993
Lecture on the current situation in Latvian Customs and the prospects for change
- American – Latvian Association, Milwaukee/USA, July 1994
Lecture on the current and proposed development of Latvian Customs and the State Revenue Service
- Ministry of Finance, Riga/Latvia, November 1996
Public Hearing on the new SRS computerised customs revenue accounting system

European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

Central Asian Border Crossings, SCH-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Valdis Janis, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed



Date

09.02.2001

European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

SCR-E/110622/C/SV/WW

CENTRAL ASIAN BORDER CROSSINGS - SCR-E/110622/C/SV/WW,

Certification of Professional Experience and Expertise indicated in Curriculum Vitae

I hereby confirm that that my Curriculum Vitae gives full and correct accounts of my professional experience and expertise

Yours faithfully



Kursietis, Valdis Janis

Riga, 14. February, 2001.

Place, Date



**Danish School of
Public Administration**

Diploma

This is to certify that

Valdis J. Kursietis

*has successfully participated in a
Management Seminar for Education and
Training of Top Civil Servants*

Part One May 4 - 20, 1994

Theoretical Aspects with focus on:

- Introduction to Danish society and institutions
- Introduction to Danish market economy
- Introduction to the European Union (the European Community)
 - Leadership training
 - Team building and co-operation
 - Communication and negotiation
- Cultural aspects in organizations, development and management
 - Strategic analysis and implementation

Part Two August 31 - September 16, 1994

Practical Aspects with focus on:

- The organizational structure in Danish public administration
 - Decision-making in central and local government
 - Co-operation between the private sector (enterprises) and the public sector
 - Relations between politicians and civil servants
- Ten working days with visits to public institutions and private enterprises.

Bornholm, September 16, 1994

Head of Center John Helsing

Professor Peter Kruckow



Crown Agents

This is to certify that

Valdis J Kursietis

has successfully completed a course of training in

PROJECT MANAGEMENT

HELD IN

RIGA, LATVIA

BETWEEN

28 OCTOBER AND 1 NOVEMBER 1996

The Training Involved the Study of the Following Principal Topics:

*Project Concept and Definition
Planning for Quality, Time and Cost
Logic Diagrams and Network Analysis
Control of Project Implementation
Change Control
Project Completion and Evaluation
the PRINCE Project Management Method*

.....
**Executive Director
Institutional Development Group
Crown Agents**

Proposed position in the programme:
TEAM LEADER MODULE B

1. **Family Name:** CALZETTI
2. **First Names:** Achille
3. **Date of Birth:** 3 June 1938
4. **Nationality:** Italian
5. **Civil Status:** Married
6. **Education:**

Institution	Athens Technical University (Engineering)
Date:	1957 – 1962
Degree obtained	Master degree civil engineering (rural spec.)

7. **Language Skills:**

Language	Reading	Speaking	Writing
English	5	5	5
Italian	5	5	5
Greek	5	5	5
French	5	5	5

8. **Membership of Professional Bodies:** Fellow of the Institution of Civil Engineers, UK
Member of the Technical Graduates Chamber of Greece
9. **Other Skills:**
10. **Present Position:** Civil Engineer
11. **Years with Firm:** 36 years

12. Key Qualifications:

Achille Calzetti has been with Scott Wilson Kirkpatrick since 1965 and is a currently a Principal Engineer for highways projects. He has 39 years of highway related experience of which the last 28 years have been in senior positions. His extensive experience covers a wide range of highway related services, namely site investigation, preliminary studies, feasibility studies, design and design reviews and tender documentation. He is particularly experienced in coordinating multidisciplinary and multi national teams, managing a design office and liaising with clients. This makes him particularly well suited to this project as this experience comprehensively covers the needs of the project.

He is presently the Team Leader for the detailed design of urban maintenance and rehabilitation, pavements and drainage measures for three cities in Kyrgyzstan. He was recently Team Leader on a road rehabilitation project in Uganda and Deputy Team Leader/Senior Highway Engineer for a road rehabilitation project in Uzbekistan in 1997 for the evaluation and screening of 3,600km of roads and identification of 2,900km for rehabilitation, including assessment of the technical and economic feasibility of the proposed rehabilitation work. Prior to this he worked in 1996 as Deputy Project Manager/Senior Highway Engineer for a road rehabilitation project on the 240km Phnom Penh to Ho Chi Minh City Highway in Cambodia and Vietnam.

13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Kyrgyzstan	2000 – on going
Albania	1994 – 1996
Uzbekistan	1997

14. Recent Professional Experience Record:

Date:	2000 – 2001
Location	Kyrgyzstan
Company	Scott Wilson
Position	Team Leader
Description	Feasibility study, prioritisation and selection of a suitable number of roads for given budgets to the three largest cities of Kyrgyzstan, Bishkek, Osh and Jalal Abad, detailed design of roads for the (three) respective contracts. Preparation of drawings and tender documentation including cost estimates for one FIDIC and two smaller contracts. Contractors prequalification for the FIDIC contract and pos-qualification for the other two. Evaluation of the three Tenders and reporting including recommendations. All roads are asphalt paved. The contracts are World Bank funded.



Date:	<i>1998-2000</i>
Location	Uganda
Company	Scott Wilson
Position	Team Leader
Description	Feasibility and environmental study review of 117km of roads for Katunguru-Kasese-Fort Portal, Kasese-Kilembe and Equator Roads. Preparation of design reports, engineering drawings and tender documentation for Ministry of Works/World Bank funded contracts

Date:	<i>1998-99</i>
Location	Lesotho
Company	Scott Wilson
Position	Team Leader
Description	Vehicle Axle Load Studies including legislation, weighbridge site selection, purchase of equipment, commissioning and training for the Ministry of Works. (EU funding)

Date:	<i>1997</i>
Location	Uzbekistan
Company	Scott Wilson
Position	Deputy Team Leader/Senior Highway Engineer
Description	Evaluation, screening and prioritisation of 5000km of existing road links for rehabilitation; technical and economic feasibility of proposed rehabilitation work, and the preparation of draft prequalification and outline bid documents suitable for implementation.

Date:	<i>1996</i>
Location	Vietnam and Cambodia
Company	Scott Wilson
Position	Deputy Project Manager/Senior Highway Engineer
Description	Rehabilitation project for 160km highway linking Ho Chi Minh City (Vietnam) and Phnom Penh (Cambodia). In charge of Vietnam office with overall responsibility for engineering survey, detailed design, cost estimates and contract documentation.

Date:	<i>1993 – 1996</i>
Location	Greece
Company	Scott Wilson
Position	Resident Representative
Description	<p>Albania - Study for a new Albanian Road Code. Responsible for setting up office, forming team, reviewing the Italian road code currently used in Albania and making recommendations for change.</p> <p>Sudan - Project Manager for feasibility study of 400km roads between Nahoud and El Fasher in Sudan. Responsibilities included mobilisation, route reconnaissance and selection and determination of design standards.</p> <p>Greece - Project Manager in charge of management team for a major Red Cross hospital development in Athens. Reviewed the design, prepared tender documents and assisted in tender evaluation.</p> <p>Responsible for the preparation and submission of proposals for project management, transportation and feasibility studies in Greece, Albania and Macedonia.</p>

Date:	<i>1991 – 1992</i>
Location	Uganda
Company	Scott Wilson
Position	Team Leader
Description	<p>Responsible for 120km Mubende-Fort Portal Road Feasibility Study assessing the improvements to a major trunk road, taking account of international traffic and planned upgrading of a competing railway line. Significant savings were achieved through optimisation of the alignment and mass-haul, revisions to drainage and pavement design.</p>

Date: from - to	<i>1989 – 1990</i>
Location	Sri Lanka
Company	Scott Wilson
Position	Technical Adviser / Team Leader
Description	<p>Technical Adviser / Team Leader to the Roads Development Authority on the feasibility study for rehabilitation and improvement of 500km urban, semi-urban and rural roads. Responsible for co-ordinating and reviewing the work of local consultants, updating of project feasibility and preparation of detailed design and bidding documents.</p>

Date:	<i>1985 – 1989</i>
Location	Uganda, Malawi
Company	Scott Wilson
Position	Project Manager
Description	<p>Uganda – Team Leader for the review of a feasibility study, the design and preparation of tender documents for the infrastructure of a 1500ha cattle ranch.</p> <p>Team Leader / Project Manager for the implementation of the 220km Mityana to Fort Portal road including checking and reviewing existing design, writing specifications, bills of quantities and tender documents, assisting the Government with the contract negotiations and advising on international barter agreement terms.</p> <p>Malawi - SRE for the final stages of a road construction project, (Luwawa–Champoyo), including final measurement, certificates and contractor claims assessment.</p> <p>Senior Highway Engineer in charge of teams for the preliminary design, setting out and final design, including several bridges, of two road sections, 45km and 105km long, including tender documentation.</p>

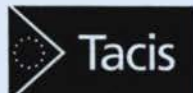
Date:	<i>1972 – 1988</i>
Location	Greece, Ghana, Benin
Company	Scott Wilson
Position	Project Manager and Highway Design Engineer
Description	<p>Greece/Libya: Project Manager, in charge of the SWK branch office in Athens, responsible for road design works in the Middle East. With a number of 15 employees in the office and around 35 in the field, mostly in Libya, carried out preliminary design of 410km and final design of 102km of highways in Saudi Arabia, route location and design/ preparation of tender documents of 2,500km roads in Libya, including 50km of urban dual carriageways with grade separated interchanges, street lighting etc. Organised and directed SWK topographic survey team for the Libyan desert roads. Responsible for the design of two township plans including infrastructure and two airfields in Libya.</p> <p>Ghana - Project Manager on several urban and rural road rehabilitation projects including feasibility reports, preliminary and final engineering.</p> <p>Greece: Liaison with the Aristotle University of Thessaloniki during the checking of the master plan for a new teaching hospital on the university campus.</p>

	<p>Greece: Technical liaison in the preparation of the Athens sewage treatment works preliminary design, between SWK (UK), contractors and Greek Government.</p> <p>Benin: Project manager responsible for initial stages of the formation, equipping, training and operation of three direct labour road construction brigades for the Ministry of Works.</p>
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Date:	1971 – 1972
Location	Nigeria
Company	Scott Wilson
Position	Senior Highway Engineer
Description	Senior Engineer in charge of two small road designs in Nigeria and promotional work in the Middle East and East Mediterranean.

Date:	1968 – 1970
Location	Ghana
Company	Scott Wilson
Position	Senior Highway Engineer
Description	Inventory of 3,200km of road, with proposals for alternative routes and estimates for different standards of reconstruction and preparation of contract documents.

Date:	1965 – 1968
Location	Nigeria
Company	Scott Wilson
Position	Senior Highway Engineer
Description	<p>Team Leader for preliminary engineering studies for 400km of highway in the Northern States of Nigeria. In charge of planning, organising and carrying out the road inventory of 10,000km Class 2 roads with a team of six engineers and two technicians. It was a UNDP project.</p> <p>In charge of a team engaged on the detailed engineering design and preparation of contract documents and drawings for the 96km Kunya-Babura Road and the 76km Hadejia-Nguru Road.</p> <p>In charge of the structural design of drainage structures in Northern Nigeria.</p> <p>Highway Engineer engaged on reviewing the design of the 140km Biliri-Lau Road, and making recommendations on drainage and alignment.</p> <p>Highway Engineer and Team Leader on preparation design and contract documents for the 52km Agaie-Baro Road.</p> <p>Highway Engineer responsible for the engineering element of a feasibility study for a proposed new 87km road.</p> <p>Responsible for the hydrology and of design of drainage structures for 289km of road.</p>

**CURRICULUM VITAE:****Achille CALZETTI**

Date:	<i>1962 – 1965</i>
Location	Nigeria
Company	Borini Prono & Co Ltd
Position	Project Engineer/Site Agent based in Kaduna –Northern Nigeria
Description	Deputy Area Manager, carried out contract negotiations to construct 40km of trunk road. Project Engineer for a 570km highway construction project. Site Agent For the construction of the Kaduna B Power Station and 4.5 kms of city roads.

Date:	<i>1961 – 1962</i>
Location	Greece
Company	Odon Odostromaton Ltd
Position	Site Engineer
Description	Site Engineer on the construction of 24km section of Athens to Corinth motorway. In charge of the construction of a 40m span prestressed concrete bridge.

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KYRGYZSTAN

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European Commission
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Belgium

SCR-E/11062/C/SV/WW

HSMSB/MO

Date: 09.02.2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

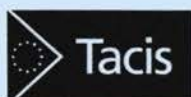
I, the undersigned, Achille Guiseppe Calzetti, confirm my availability for assignment on the above project exclusive for the Consortium formed by Scott Wilson Kirkpatrick and Co. Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick and Co. Ltd.

I confirm that in the event of the award of the contract to the Consortium led by Scott Wilson Kirkpatrick and Co. Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed:.....



Date: 09-02-01



Proposed position in the programme: PAVEMENT/MATERIALS SPECIALIST

1. **Family name:** LARSEN
2. **First Names:** Bent Kjeldgaard
3. **Date of birth:** 11 December 1952
4. **Nationality:** Danish
5. **Civil Status:** Single
6. **Education:**

Institution	Technical University of Denmark
Date:	1971 - 1980
Degree obtained	MSc – Civil Engineering

Institution	Technical University of Denmark, Institute for Roads, Traffic and Town Planning
Date:	1982 - 1984
Degree obtained	PhD – Pavement Engineering

7. **Language skills:**

Language	Reading	Speaking	Writing
Danish	5	5	5
English	5	5	5
German	4	4	4
French	2	2	2

8. **Membership of professional bodies:**
9. **Other skills:**
10. **Present position:** Pavement Engineer / Materials Engineer
11. **Years within the firm:** 4

12. Key qualifications:

Mr B.K.Larsen has a thorough theoretical and practical background for all aspects of pavement evaluation, Paved design, economic evaluation and pavement management. He has done scientific research on mathematical models on fatigue and plastic and elastic deformation characteristics problems (pavement performance) in connection with laboratory and in-situ tests on asphalt and unbound pavement materials and full scale pavement testing.

During his employment activities he has utilized this knowledge in the development, sale, marketing and implementation of various hardware and software pavement evaluation and pavement management systems. Self-development computerized systems have been based on pavement condition monitoring and pavement management monitoring. He is familiar with analyses of all types of pavement condition monitoring both structural evaluation (FWD and Benkelman deflection analysis, plate load bearing testing) and functional evaluation (roughness, rutting, macrotexture, friction and pavement surface distress) as well as positioning of road data utilising GPS (Global Positioning System). He has broad experience in pavement evaluation of all kind of road and airfield pavement (gravel, flexible, semi - rigid, rigid and reinforced - rigid). Mr B.K.Larsen has been working with the Falling Weight Deflectometer since 1975 and Pavement Management Systems since 1980.

During his Ph.D. studies, he performed various educational tasks at graduate and post-graduate level, and he has continued in this line of work, and has been a lecturer on courses held by the Danish Road Directorate and has conducted study tours on behalf of the Danish Road Directorate. He has been assigned to a number of projects in temperate regions (Europe, USA), Arctic regions (Greenland) as well as subtropical and tropic regions in Africa, Asia, Australia, North America and the Middle and Far East carrying out Pavement Evaluation, Pavement Design, Pavement Management and Feasibility and Identification studies. Road related computer programmes have been developed in this line of work (Fortran, Basic, VisualBasic, C and dBase programming), and training assignments have been carried out in a number of countries in Europe and Asia. He has actively participated in several International Pavement Design conferences, exhibitions and symposiums in Europe, Africa and the USA.

13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Kazakstan	1997
Kyrgyzstan	1999 - 2000
Mongolia	1996 1999 - 2000

14. Professional Experience Record:

Date:	<i>1996 – to date</i>
Location	Dominica, Mongolia, Kazakhstan, Kyrgystan, India
Company	Scott Wilson, The World Bank, Chic of China (contractor), Cowi
Position	Pavement Specialist, Pavement Supervision, Economic HDM evaluation
Description	Responsible for pavement evaluation, pavement design and materials assessment. Materials engineer on supervision assignments. WB advisor..

Date:	<i>March 1995 – September 1995</i>
Location	Denmark
Company	Ramboll Hannemann & Hojlund A/S
Position	Senior Road Engineer
Description	Home office support on road and airfield projects. Project and proposal management.

Date:	<i>March 1993 – October 1994</i>
Location	Denmark, India, Pakistan, Bangladesh, Zambia
Company	Kampsax International
Position	Senior Road Engineer
Description	Home office support and short term expatriate expert on foreign road projects. Project and proposal management.

Date:	<i>June 1990 – February 1993</i>
Location	Denmark, Italy
Company	Ro De Co Scandinavia Aps
Position	Director
Description	Sale and marketing of profilometer and other non-destructive pavement testing services and acoustical transducer testing equipment. Pavement and Management consultant, mainly in Italy.

Date:	<i>April 1988 – June 1990</i>
Location	Denmark
Company	Cowiconsult Consulting Engineers
Position	Pavement Evaluation and Design Specialist
Description	Development of Computer based Pavement Evaluation and Management Systems. Training.

Date:	<i>September 1984 – March 1988</i>
Location	Denmark, England, Italy, India
Company	Dynatest Engineering A/S Copenhagen
Position	Pavement Evaluation & Pavement Management specialist
Description	Development and maintenance of computer based pavement evaluation and management systems. Training, Lecturing.

Date:	<i>February 1982 – August 1984</i>
Location	Denmark
Company	Technical University of Denmark
Position	Pavement Evaluation, Institute for Roads, Traffic & Town Planning
Description	Ph.D Studies - Pavement Evaluation related research, including statistics, mathematical software modelling and studies of deformation characteristics of unbound materials as a function of frost/thaw action.

Date:	<i>August 1980 – January 1982</i>
Location	Denmark
Company	Technical University of Denmark
Position	Scientific Assistant, Institute for Roads, Traffic & Town Planning
Description	Research project for Danish Road Directorate

Date:	<i>April 1973 – July 1980</i>
Location	Denmark
Company	Department for data processing and statistics, H Lundbech A/S, Ottliavej 7-9, 2500 Valby
Position	Pre-graduate, part-time employee
Description	Working with monitoring and reporting of clinical research projects. Software programming and statistics.

15. Others:

Materials Engineer for the World Bank financed Urban Transport Project Phase I in Kyrgystan, working for Scott Wilson. Supervision of the contractor's concrete and asphalt materials compliance testing. Training of local staff in daily routine asphalt quality control testing. Bishkek, Osh and Jeelabad, Pavement Design Engineer for Phase II as for Phase I (see below). August-December 2000.

Pavement Engineer for the NHA financed Chennai-Nellore NH-5 Project feasibility study in India, working for Scott Wilson. Data collection: Benkelman Beam, Roughness and DCP etc., and pavement design/overlay design for rigid and flexible alternatives using twelve different national and international design methodologies. Drafting Materials Report and writing specifications for bituminous and concrete pavements. Madras, February – April, May – July 2000.

Pavement Design Engineer for the World Bank financed Urban Transport Project Phase I in Kyrgyzstan, working for Scott Wilson. Pavement overlay and asphalt rehabilitation design based on FWD and Benkelman Beam testing using the Russian and the TRL 833 design methods. Evaluating pavement condition and preparing input for and running the HDM-III pavement deterioration model for the 22 project links. Writing specifications. Bishkek, November-December 1999.

Short term IDA/World Bank consultant for a feasibility study of 210 km paved roads between Erdenesant-Arvaiheer and spot upgrading of 2000 km of unpaved roads between Arvaiheer-Hovd and Harhorin- Tosontsengel in Mongolia.

First phase: Collecting pavement condition data, visual inspections and supervising Benkelman Beam measurements. Preparing input for the HDM-III model and conducting preliminary estimation of magnitude of cost for suitable rehabilitation options to be carried out. Second phase: Traffic analysis, overlay design, training local staff in use of the HDM-III and RED economical analysis packages for unpaved and paved roads. Writing parts of the feasibility reports and the Project Implementation Report. Re-writing specifications for bituminous materials. General technical support. Ulaan Baatar, October-November 1999, December 1999-February 2000, April – May 2000.

Pavement Design for COWIconsult on the 4-lane extension of the extensively trafficked Varanasi-Arongabad road section in India financed by the World Bank. Rigid, semirigid and flexible rehabilitation/overlay design alternatives evaluated by the use of the AASHTO Design Methodology, TRL methods, IRC methods and Empirical-Analytical (Mechanistic) Design Methodology. September – December. 1998.

Evaluation of physical characteristics and condition of 80km of roads on the Caribbean Development Bank financed Road Improvement and Maintenance Project, Dominica. Carried out Benkelman Beam testing, Merlin roughness, DCP testing, laboratory assessment of materials, Pavement Rehabilitation Design etc. Preparing data for HDM-III runs. Five weeks on-site, Roseau, June-July 1997. PE, PD, MA, (SWK).

Pavement Engineer for the World Bank financed Almaty-Gulshat Road Project, Kazakhstan. Roughness measurements with a Bump Integrator, calibrated with Merlin Wheel. Supervising Benkelman Beam measurements and test pit locations. Preparing road condition data for HDM-III runs. Pavement overlay design according to Kazak (Russian) method, TRL 833, Analytical-Empirical and AASHTO methods. Specifications for aggregate and overlay mix design. Duration 10 weeks, Almaty, 1997. PE, PD, MA, MS, (SWK).

Pavement Specialist for the Kuwaiti Fund financed Darhan-Erdenet Road Design Project, Mongolia. Writing specifications for asphalt, surface treatment and unbound materials. Visual condition survey of road. Duration 6 weeks, Ulaan Baatar, 1996. PE, PD, MS, (SWK).

Drawing up of a Pavement Evaluation and Materials Assessment plan for two airports in Liberia, 1995. PE, MA, (RAM).

Determination of PCN, evaluation of FWD results and investigation of asphalt core samples from Taxiway 5 and Finger A, Copenhagen International Airport, 1995. PE, MA, (RAM).

Runway and taxiway flexible and rigid Pavement design, Heraktion Airport, 1995. PD, (RAM).

Asphalt investigations on the Danida financed Kapiri-Ndola-Kitwe-Chingola Road, Zambia. Investigated and found all the main causes to premature asphalt failures, however was unable to

stop the disaster. Neither the engineer, the contractor nor Danida wanted to accept the facts, as it would mean the rejection of more than 1 million m² of laid asphalt, therefore unchanged

defective asphalt mix continued to be placed up to the end of the project in December 1995. Duration 3 weeks in September 1994, Ndola. MA, (KX).

Technical guide for seven Chinese road supervision engineers on a study tour in Europe. Technical visits included the Port of Hamburg, the Calais Tunnel, Motorway Toll Station near Paris, and Motorway tunnels and technical facilities in Hamburg and Berlin. Tour duration 2 weeks, 1994. Representing the Danish Road Directorate. TG, (KX).

Identification study of selected roads in the major Noakhali District, Bangladesh. The Danida financed study covered 200 km earth, brick and asphalt roads, including bridges and culverts. Services included Benkelman Beam, Roughness, visual condition survey and GPS measurement of road alignment and position of culverts, etc. Road sections were prioritised for further study based on condition, traffic and infrastructure importance. Duration 1 month, Dhaka and Noakhali, 1994. PE, PM, (KX).

Correlation study between Bump Integrator ratings and IRI ratings made by the Danish Profilograph, carried out for the Danish National Road Institute 1993-1994, RD, (SE).

Rodeman calculations (HDM II) and Pavement Evaluation and Design of the Accra-Yamoransa Road Project, Ghana, 1993-1994. PE, PD, PM, (KX).

Pavement Condition Specialist on the Four State Pavement Management Project, India. Benkelman Beam and visual condition surveys. This World Bank Project covered more than 5000 km of roads for pilot studies in original four states, later five: Rajasthan, Bihar, Uttar Pradesh, Maharashtra and Haryana. Duration 1 month, New Delhi and Aurangabad, 1993. PE, PD, (KX).

Preliminary Rigid and Flexible Pavement Design of the Noida Bridge road connecting sections. Duration 2 days, New Delhi, 1993.. PD, (KX).

Preparation of the final Asphalt Overlay Design and the measurement procedure and program for the Danida financed Kapiro-Ndola-Kitwe-Chingola Road Project, Zambia. The design was made with the Analytical-Empirical approach based on Benkelman Beam testing results. Duration 2 weeks, Ndola, 1993. PE, PD, (KX).

Development of a Pavement Design Manual covering all the various climatic regions in Pakistan based on the Analytical-Empirical design method. Integration of the manual into a Pavement management System for rural roads. Duration 2 months, Islamabad, 1993 and 1994. PE, PD, (KX).

Prefeasability study for roads in Patuakhali and Barguna Districts, Bangladesh. Danida financed study with 200 km of earth, brick, rigid and flexible roads. Benkelman Beam, Roughness and condition surveys. Duration 1 month, Dhaka and Patuakhali, 1993. PE, PD, (KX).

Pavement Design check for the World Bank financed Khuzdar-Kalat Road in Belouchistan, Pakistan. Investigations included inspection of current road condition and inspection at the crusher site. Duration 2 weeks, Islamabad and Khuzdar, 1993. PE, PD, MA, (KX).

Pavement Evaluation and Design of asphalt overlays for 35 km of road between Kampala and Entebbe, Uganda, based on FWD testing using the TRRL lab. report 833 and the Analytical-Empirical approach. 1993. PE, PD, (COWI).

Semi-rigid Pavement Design for the Dulles Toll Motorway, Virginia, USA, 1992. PD (ROD).

Development of software integrating Road Monitoring and Inertial Navigation with GPS (Global Satellite Positioning System), 1992. RD; (ROD).

Pavement Evaluation based on FWD testing, including reporting of PCN values for Entebbe International Airport, Uganda, 1992. PE, (COWI).

Development of a Pavement Design and Pavement Rehabilitation Manual with accompanying software for IP and AGIP groups, Italy, 1991. RD; PD, (ROD).

Development of a Laser Profilometer. Exhibitions held in Italy, Norway, USA and Morocco. The "Profilograph" delivered to Italy (1 pcs.) and the National Danish Road Institute (1 pcs.), 1990-1992. TR, RD, (ROD).

Evaluation of FWD results and re-design of a concrete Pavement "Slangerupvejen" for Aalborg Portland, 1990. PE, PD, (COWI).

Preparation of flexible and rigid design alternatives for an airport pre-project "Arlanda 3: Banan", 1990. PD, (COWI).

Application of Pavement Evaluation data into a City Pavement Management System, Torino, Italy, 1990. PE, PM, (ROD).

Pavement Evaluation, Materials Assessments and Design of Overlays for 100 km road in south-eastern Tanzania, a Danida financed project. The work was performed on the basis of substantial laboratory test results, Benkelman Beam testing, Roughness and road condition surveys, 1989. PE, PD, MA, TR, (COWI).

Evaluation of FWD tests from runway 04R-22L and taxiway T1, Copenhagen International Airport, 1988-1989. PE, (COWI).

Evaluation of FWD tests and Overlay Design for Ellehammervej, Copenhagen Int. Airport, 1989. PE, PD, (COWI).

Evaluation of FWD tests for the Elsinore Port terminal area, 1989. PE, (COWI).

Preparation of tender documents and drawings for the rehabilitation of runway 12-30 in Copenhagen Int. Airport. Pavement analysis and design of rehabilitated pavements, 1988. PE, PD, (COWI).

Preparation of Tender Documents, Pavement Evaluation and Design and Materials Assessments for 100 km of road in north-eastern Tanzania, based on Benkelman Beam tests, Plate Loading tests, laboratory testing of materials and Roughness and visual condition surveys, 1988. PE, PD, MA, (COWI).

Analysis of FWD tests from the OECD project "Force", LCPC, Nantes, France, 1989-1990. PE, (ROD).

Analysis of the use of non-traditional materials (building rubble) using FWD testing, laboratory testing and nuclear density testing, Østre Gasværk, 1988. PE, MA, RD, (COWI).

Preliminary Design and suggestions for the Pavement Evaluation for Mwanza Airport, Tanzania, 1988. PE, PD, (COWI).

Pavement Evaluation and Pavement Management of more than 10000 km of provincial roads, town roads, state roads, motorway toll roads and test facilities using FWD testing, Roughness assessment and visual condition surveys. Mainly in Italy but also in Switzerland, France and the Middle East. Evaluation of PCN and Pavement Evaluation of most major military and civil airports in Italy, 1988-1992. The work included frequent visits to Italy. PE, PD, PM, RD, (SE).

Asphalt and existing road condition investigations on the Danida financed Kapiri-Ndola-Kitwe-Chingola Road, Zambia. Sent out to investigate causes and extent of premature asphalt failures. Discovered and verified the causes and mechanisms to deterioration of roads with stabilized base layers in tropical climates. On-site duration 3 weeks. September 1994. Follow up in 1995.

Identification Study of selected roads in the major Noakhali District, Bangladesh. Danida financed study covering approximately 200 km earth, brick and asphalt roads, including bridges and culverts. Services included GPS measurements of road alignment and position of bridges and culverts. Road sections were prioritized for further study based on condition, traffic and infrastructure importance. On-site duration: 1 month. February 1994.

Pavement Condition Specialist on the 4 State Pavement Management Project, India. This World Bank finance Project covers more than 5000 km of pilot studies in four states: Rajasthan, Uttar Pradesh, Bihar and Madhya Pradesh. Discovered and verified theoretically that the Loadman device is unfit Preliminary Rigid and Flexible Pavement Design of the Noida Bridge road connection sections. New Delhi, India. On-site duration: 2 days. November, 1993.

Preparation of the Final Asphalt Overlay Design and measurement procedure for the Danida financed Kapiri-Ndola-Kitwe-Chingola Road Project, Zambia. The final Design was based on the Analytical-Empirical design method on the basis of Benkelman Beam testing results. On-site duration: 2 weeks May 1993.

Development of a pavement Design Manual for NHA (National Highway Association) covering all the various climatic regions of Pakistan based on the Analytical-Empirical design method. Integration of the manual into a pavement Management System for rural roads. Total duration: 3 months. On-site duration: 2 months. April and September 1993 and January 1994.

Prefeasibility Study for roads in Patuakhali and Barguna Districts, Bangladesh. Danida financed study covering approximately 200km rural earth, brick, rigid and asphalt roads in the Southern part of Bangladesh. Discovered and verified theoretically that current road rehabilitation practice in Bangladesh is uneconomical. On-site duration: 1 month. April and June 1993.

Pavement Evaluation and Design of asphalt overlays for 35km of road in Uganda, based on FWD testing, utilizing TRRL Lab. Report 833 and the Analytical/Empirical approach, 1993.

Development of software for design and evaluation of plain jointed Concrete Pavements (JCP) and Reinforced jointed Concrete Pavements (RJCP) subjected to realistic road correlation study between Bump Integrator ratings IRI ratings made by the profilograph, carried out for the Danish National Road Laboratory, 1992-1993.

Semi-rigid Analytical-Empirical Pavement Design for the Dulles Toll Motorway, Virginia, USA. 1992.

Driving comfort analysis on the west bridge, storebelt utilizing computer simulation, 1992.

Publications:

Korrelation mellem Bumpmetertal og IRI-værdier (Correlation between Bumpmeter and IRI roughness ratings). Statens Vejlaboratorium Notat 246. 1993. (In Danish, with English summary).

Pavement Monitoring by Lasers and Inertial Navigation combined with GPS (Global Satellite Positioning System). TRB 72nd annual meeting, Washington DC, 1993

Road Condition Monitoring and Surveying using Inertial Navigation and GPS. Second International Symposium on Road Surface Characteristics. Technische Universität Berlin, Germany 1992

The Use of Laser and Inertial Navigation Technology for Longitudinal and Transversal Profile Evaluation. XIXth PIARC World Road Congress. Marrakech, Morocco, 1991

Interpretation of FWD Measurements. OECD Proceedings, Concluding Conference - FORCE Project. La Baule, LCPC, France 15-17 May, 1991

Description and application of RO.MA. (Road Evaluation and Pavement Management System). Third International Conference on Bearing Capacity of Roads and Airfields. N.T.I. Trondheim, 1990

Evaluation of PCN (Pavement Classification Number) of Airfields by means of the FWD. Third International Conference on Bearing Capacity of Roads and Airfields. N.T.I. Trondheim, 1990

Description and Application on the new RO.MA. Road Evaluation and Management System. Eurobitume, Madrid, Spain, 1989.

A study of Pavement Surface Properties by Correlating SCRIM and Sensor Measured Texture Depth, Eurobitume, Madrid, Spain, 1989.

Systematisk Vejvedligeholdelse (Systematic Maintenance of Roads), Dansk Vejtidskrift, November 1987. (in Danish).

Verification of the Analytical-Empirical Method of Pavement Evaluation., 6th. Ann Arbor Conference, Michigan, USA, 1987.

Mathematical Model for the Prediction of Functional and Structural Behaviour of Flexible Pavements. PhD thesis. Report no. 50, IVTB, The Technical University of Denmark, 1987.

Computer Simulation of the AASHO Road Test, PTRC 12th. Summer Annual Meeting, Brighton, England, 1984.

Mathematical Model for Predicting Pavement Performance, TRR 949, Washington DC, USA, 1983

Predictive Design of Flexible Pavements, Report no. 35, IVTB, The Technical University of Denmark, 1982.

European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

SCR-E/110622/C/SV/WW

HSMSB/BL

30th January 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Bent Larsen, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed



Date

30/1-2001

DIPLOMA
FROM
THE TECHNICAL UNIVERSITY
OF DENMARK

Bent Kjeldgaard Larsen

BORN 1952 12 11

HAS COMPLETED A COURSE OF POST GRADUATE STUDIES AT

Institute of Roads, Transport and Town Planning

AND HAS SUBMITTED A THESIS ENTITLED

Mathematical Model for the Prediction of Functional
and Structural Behaviour of Flexible Pavement

WITH Per Ullidtz

AS SUPERVISOR(S) AND

Per Ullidtz and

Per Simonsen

AS ADJUDICATION COMMITTEE

THE ABOVE NAMED HAS THEREFORE BEEN AWARDED

THE DANISH PH. D. DEGREE

LICENTIATUS(A) TECHNICES
(LIC. TECHN.)

LYNGBY, 1987 04 07


RECTOR


HEAD OF ADMINISTRATION

D I P L O M

FRA DEN POLYTEKNISKE LÆREANSTALT · DANMARKS TEKNISKE HØJSKOLE

Bent Kjeldgaard Larsen

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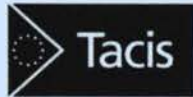
har i året 1980 afsluttet kandidateksamen og erklæres herved for

CIVILINGENIØR
POLYTEKNISK KANDIDAT

LYNGBY

Peter Lawatz
REKTOR

Paul Cosmides
ADMINISTRATIONSCHEF



Proposed position in the programme:

PROJECT ECONOMIST

- 1. Family name: OATEN
- 2. First names: Martin
- 3. Date of Birth: 5 January 1967
- 4. Nationality: British
- 5. Civil status: Single
- 6. Education:

Institution	Exeter University
Date:	1985 - 1988
Degree obtained	BA Economics & Geography

7. Language skills:

Language	Reading	Speaking	Writing
English	5	5	5
French	2	3	2
German	2	3	2

8. Membership of professional bodies:

- 9. Other skills: Computer literate
- 10. Present position: Principal Economist
- 11. Years with firm: 5

12. Key qualifications:

Martin Oaten has considerable experience in economic appraisal of infrastructure development projects worldwide utilising standard cost benefit appraisal methodologies demanded by the international donor community. He is familiar with project appraisal and monitoring techniques as well as transport sector project appraisal in Eastern Europe and the countries of the Former Soviet Union.

He was recently Project Manager on an EBRD funded **Road Sector Finance Study in Uzbekistan**. The project included undertaking an assessment of the road sector in the country including recommendations for improvements as well as identifying potential funding sources. Much of the analysis centred main Tashkent - Osh Road.

In addition, Martin was the project economist for the **EC Takis Border Crossing Study Phase II**, and visited many of the border posts during feasibility studies for the project.

He is familiar with all the problems associated with the change in expectations from a command economy to a market economy; these manifest themselves in decision making ability and the ability to match plans with resources.

Martin Oaten has undertaken a broad range of transport infrastructure development projects both in the UK and internationally. He has recently undertaken a traffic demand study for the Takis Russian Internal Waterway Project developing the demand model. He is the Project Economist for the **EC Takis Pilot Project to develop a Logistics Centre at Nizhny Novgorod**, so is familiar with the economic environment in the Region.

He has provided business plans for the development of infrastructure expansions at the Ports of Novorossiysk and Azov. Recent clients have included EC, the World Bank, Asian Development Bank and EBRD.

13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Armenia	1994
Belarus	1997
Kazakhstan	1997 - 1998
Lithuania	1997
Poland	1997 - 1999
Russia	1994 - 2000
Turkmenistan	1995

14. Professional Experience Record:

Date	1999 – to date
Location	UK and Overseas
Company	Scott Wilson
Position	Principal Economist
Description	<p>Project Manager on a an EBRD funded Road Sector Finance Study in Uzbekistan. The project included undertaking an assessment of the road sector in the country including recommendations for improvements as well as identifying potential funding sources. Much of the analysis centred main Tashkent Osh Road.</p> <p>Project Manager on a due diligence study for the project financiers of the Tube Lines consortia bid for the Jubilee, Northern and Piccadilly (JNP) Infraco as part of the London Underground PPP, UK. The project included a detailed technical and financial audit of the bid to ensure its robustness before financial close. Project management included coordinating and planning the inputs of 10 technical specialists, liaison with the client as well as final responsibility for project delivery and reporting.</p> <p>Project Manager and Financial Specialist to undertake financial and technical due diligence on a waste incinerator plant near Birmingham, UK. The project involves bi-annual reviews and reporting which highlights any changes in the financial and technical operation of the plant that are likely to impact on the future financing arrangements between the borrower and the funder.</p> <p>Project Manager on an EBRD financed study providing technical advice on an ongoing basis for transport sector projects in the Tacis countries of Eastern Europe. The contract is due to run 18 months with a total budget of Euros 300,000.</p> <p>Project Manager on an EBRD financed study providing technical advice on an ongoing basis for transport sector projects in the Phare countries of Eastern Europe. The contract is due to run 18 months with a total budget of Euros 150,000.</p> <p>Transport Economist on an Asian Development Bank funded study concerning the assessment of the maintenance requirements of the national highway network in Bhutan. The study involves use of the World Bank's HDM III model to develop an investment programme for maintenance activities on the network as well as providing recommendations for the institutional strengthening of the local contracting and consulting sectors.</p> <p>Transport Economist on an Islamic Development Bank funded feasibility study of a new link road linking Tajikistan with China. The project involved the full economic cost - benefit analysis of upgrading the road from an existing earth track to a permanent all weather surface.</p>

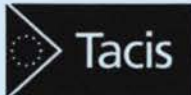


Date	1995 - 1999
Location	UK and Overseas
Company	Scott Wilson
Position	Senior Economist
Description	<p>Transport Economist for the EC Tacis Border Crossing Study Phase II project, a study commissioned by the European Commission examining the potential for upgrading border crossing facilities in Eastern Europe. Specific responsibility for evaluating border crossings between Poland and Lithuania, Lithuania and Russia, Belarus and Lithuania. In addition, also responsible for the development of an evaluation template used to assess the financial and economic viability of all border crossings.</p> <p>Transport Economist for the EC Tacis Inland Waterways and River Shipping project, a study commissioned by the European Commission examining potential future development of the inland waterways system in the Volga basin, region of Russia. The study included an assessment of existing and future demand through data research, a market survey and development of a model. The study was also concerned with the financial appraisal of investing in new equipment and facilities at Nizhny Novgorod and at other inland ports on the River Volga.</p> <p>Transport Economist for the EC Tacis Ports of Azov and Taganrog project, a study commissioned by the European Commission examining potential future development of the ports of Azov and Taganrog in the Black Sea. Particular responsibility included development of business plans for selected investments in infrastructure.</p> <p>Project Manager and financial expert on a study developing a business case for a major infrastructure investment in the port of Novorossiysk in southern Russia. The project examined the feasibility of building new port facilities as well as improved transport links in the form of a new railway and road. The business plan was then used as a basis in attracting private sector investment to the project in both Russia and Western Europe.</p> <p>Transport Economist on a World Bank funded feasibility study of an earth road in the west of Mongolia. The project involved the full economic cost - benefit analysis of upgrading the road from an existing earth track to a permanent all weather surface.</p> <p>Transport Economist on a World Bank funded feasibility study of a major interurban link in Kazakhstan. The project involved the full economic cost - benefit analysis of upgrading the road from the existing capital, Almaty, to the proposed new capital Akmola.</p> <p>Transport Economist on an EU funded study aimed at establishing a Road Fund within Malawi. Specific involvement concerned the funding mechanisms aspects of the study examining the potential for the financial self-sufficiency of all maintenance activities in the country.</p>



<p>Transport Economist on a rural road screening study funded by the Asian Development Bank. The project included the economic appraisal of eight rural roads utilising traditional cost - benefit analysis techniques.</p> <p>Transport Economist on a study for the World Bank to examine the economic feasibility of a number of potential highway and bridge schemes within various provinces in China.</p>

Date	1992 - 1995
Location	UK and Overseas
Company	TecnEcon
Position	Senior Economist
Description	<p>Senior Consultant working on transport sector studies and infrastructure projects overseas, including projects in the CIS, Belize, Uganda, Pakistan and Vietnam.</p> <p>Transport Economist engaged by London Transport to examining the potential for the introduction of intermediate transport modes (LRT's, Guided Bus and Trolley bus networks) in a strategic area in Greater London.</p> <p>Transport Economist on a study for the EBRD of the administration and financing of Turkmenistan's road sector. The principal aim of the study is to recommend how road user charges can be changed to reflect the economic costs of road use and to move the road sector financial self-sufficiency.</p> <p>Transport Economist for a strategic analysis of current services, traffic and forecasts of future demand for air services and their provision in Western UK. The study placed particular emphasis on the impact of air services on inward investment in the region.</p> <p>Transport Economist for assignment was commissioned by the EC (DG VIII) to develop a sectoral policy orientation for the identification and formulation of Community funded transport projects. Particularly responsible for developing the user guide and policy document concerning the road, rail and air transport sub sectors.</p> <p>Economist for assignment to assist Highland Regional Council prepare its road and other transport infrastructure projects for submission for ERDF funding under the 1994 to 1999 EU Highlands and Islands Structural Funds Programme.</p> <p>Transport Economist on this EC Takis funded study to undertake a survey of the Armenian highway sector. The main aims of the study were to survey the condition of the country's main road network and to develop a prioritised programme for the rehabilitation and maintenance of the network.</p> <p>Economist commissioned by a private client in St Petersburg to investigate the potential for establishing links with major UK food manufacturers to supply a string of retail establishments in Russia.</p> <p>Researcher and organiser in a three year training programme for ASEAN port managers and operators, responsible for organising seminar and preparing appropriate course materials.</p>



	<p>Economist for study conducted for the UK Department of Transport involving a comprehensive quantitative review of the red routes traffic and parking control policy.</p> <p>Transport economist on study commissioned by the Kuwait Fund for Arab Economic Development and the IDB. The appraisal involved an investigation of the existing earth road covering a distance of 168km from Dangriga to Punta Gorda and the feasibility of upgrading the road to all weather standard.</p> <p>Economist involved in the EC Structural Adjustment Programme, under which the Ugandan Government accommodates EC participation in its budget preparation activities. This included pursuing agreed priorities for health, education, agriculture and road maintenance in its public expenditure programme. Responsibilities included analysis of government expenditure data to monitor whether agreed objectives and expenditure targets were being met.</p> <p>Transport Economist on this technical and economic feasibility study of a proposed deep water port to be constructed at Gwadar on Pakistan's Baluchistan coast.</p> <p>Economist engaged on a market investigation examining the potential for establishing an Export Processing Zone (EPZ) at Noi Bai International Airport Hanoi, Vietnam.</p>
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Date	1988 - 1992
Location	UK and Overseas
Company	W S Atkins
Position	Economist
Description	<p>Economist in Infrastructure Planning Division involved in transport and infrastructure evaluation studies in the UK and overseas including Sri Lanka, Pakistan, Greece, Turkey and Tonga.</p> <p>Transport Economist responsible for developing traffic growth scenarios, toll structures and revenue forecasts for a proposed toll bridge over the Patras Straits in Greece. The study involved a full economic and financial cost benefit analyses.</p> <p>Transport Economist responsible for appraising rehabilitation options of a strategic urban highway in Colombo.</p> <p>Economist responsible for the economic and financial appraisal of a proposed light rail scheme. Standard cost benefit techniques were utilised in both analyses.</p> <p>Economist involved in LUL passenger demand forecasting analysis for various underground stations.</p> <p>Transport Economist involved in the review of current trends in the transport sector and forecasts of the effects of demographic, industrial and commercial developments. Included review of road and rail transport sectors in the Community, assessing the current situation and identifying future sectoral developments. This included possible economic development benefit resulting from infrastructural improvements.</p> <p>Transport Economist for financial and economic appraisal of a city centre bypass and new river crossing in Lahore; a build own operate transfer private/public sector investment initiative.</p> <p>Transport Economist involved in the economic evaluation of various local and strategic highway schemes within Colombo.</p> <p>Transport Economist involved in the economic feasibility study of upgrading 125km of rural road in the eastern area of the Sri Lanka.</p> <p>Economist involved in studies investigating the traffic impact of various airport expansion scenarios on the adjacent trunk road network to London Heathrow Airport.</p> <p>Economist involved in preparation of project dossiers for this multi sector aid package for funding by the EEC, designed to remove constraints to economic growth of Tonga.</p>

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Fax +44 (0)20 7976 7575
www.scott-wilson.com



European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/MO

Date 30th January 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Martin Oaten, confirm my availability for assignment on the above project exclusively for the Consortium led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed

Martin Oaten

Date

29/01/01

Part of the worldwide Scott Wilson consultancy group

Registered in London: No. 880328 Registered Office: Scott House, Basing View, Basingstoke, Hampshire RG21 4JG, England

UK Offices: Abingdon, Basildon, Basingstoke, Birmingham, Chesterfield, Crewe, Edinburgh, Glasgow, Inverness, Leeds, London, Manchester, Nottingham, Peterborough, Plymouth, Swindon, Telford and over 30 offices worldwide



Certificate No. FS 825



UNIVERSITY OF EXETER

We the undersigned hereby certify that

Martin Stewart Oaten

having fulfilled the requirements of the
Ordinances and Regulations of the University

was by the authority of the Senate

admitted to the Degree of

BACHELOR OF ARTS in SOCIAL STUDIES
with *Combined Honours in Economics and Geography*
Class II, Division I

at a Congregation held in the University on

15 July 1988

Rep Richards
Chancellor

Lina Harrison
Vice-Chancellor

[Signature]
Academic Registrar and Secretary



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Rep Richards

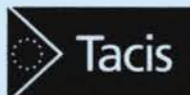
Chancellor

Linn Harrison

Vice-Chancellor

[Signature]

Academic Registrar and Secretary



Proposed position in the programme:

ENVIRONMENTAL SPECIALIST

- 1. **Family Name:** GOLOMBOK
- 2. **First Names:** Ruth
- 3. **Date of Birth:** 22 November 1960
- 4. **Nationality:** British
- 5. **Civil Status:** Single

6. **Education:**

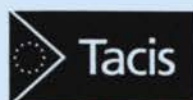
Institution	University of Glasgow
Date:	1978 - 1982
Degree obtained	BSc (Hons I) Chemistry

Institution	University of Cambridge
Date:	1986 - 1990
Degree obtained	PhD Chemistry

7. **Language Skills:**

Language	Reading	Speaking	Writing
English	5	5	5
French	5	3	2

- 8. **Membership of Professional Bodies:** Registered Associate Environmental Auditor
Member of the Chartered Institution of Water & Environmental Management (MCIWEM)
- 9. **Other Skills:** Computer Literate
- 10. **Present Position:** Principal Environmental Specialist
- 11. **Years with Firm:** 3 years

**12. Key Qualifications:**

Ruth has 8 years experience of carrying out Environmental Assessments on road and infrastructure projects. She is fully conversant with the demands placed up them by the various funding agencies especially Takis and EBRD. Relevant experience and qualifications for this role follow on below:

- Environmental and social studies ranging from development of strategies, impact assessments, audits and reporting, pollution prediction, monitoring and evaluation, particularly in relation to infrastructure and transportation projects.
- Undertaking projects in a range of countries in accordance with procedures and requirements of various clients including government departments, international bodies and donor agencies including Takis
- Creative problem solving using technical, numerical and analytical methods.
- Understanding of engineering and technical requirements and ability to work with engineers, specialists and developers.
- Knowledge of the range of issues associated with the natural, physical, biological and social-cultural environments, techniques to address them and their inter-relationships.
- Integration of mechanisms for community and stakeholder participation into all aspects of the project cycle.
- The development and practical application of policy, guidelines and regulatory measures.
- Proposal of environmental monitoring and management plans, review of local capabilities to implement such plans and the design and delivery of capacity building exercises and technology transfer for government officials, managers and members of local communities.
- Design and delivery of written and oral presentations.
- Development and use of environmental, economic, social and ethical indicators
- Techniques to raise awareness of and to integrate environmental and social considerations and principles of sustainability into policy making and management.

13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Czech Republic	1994
Poland	1998, 1999
Russian Federation	1998
Uzbekistan	1995, 1999

14. Professional Experience Record:

Date:	<i>1998 – to date</i>
Location	UK
Company	Scott Wilson Kirkpatrick & Co Ltd
Position	Principal Environmental Specialist
Description	Roads Warsaw Traffic Management Project: Project Identification, Poland - Environmental component of a study to assess a proposed traffic control system and identify components of a road management pilot programme, Phare.

Central Uganda Road Maintenance and Rehabilitation Programme Study and Design Update, Uganda - EIA of proposals for 270 km highway through heavily populated urban and rural agricultural areas. Undertaken for the African Development Bank.

Road Sector Institutional Support Technical Assistance Project, Uganda - EIA of the rehabilitation of three sections of rural highway through a National Park and agricultural areas. Effects during construction and operation were evaluated and mitigation measures recommended, undertaken for the World Bank.

West Midlands to North West Conurbations Multi-modal Study, UK - The project aims to manage existing transport networks as efficiently as possible. Input is being provided to the development of frameworks, methods and criteria consistent with those outlined in international, national and local guidance to rank various options in terms of environmental and social objectives. Government Office of the West Midlands

Other Transport

Train Operating Companies Commercialisation Project, Poland - Environmental component of a pre-investment study to modernise the freight locomotives, equipment and handling procedures. The study identifies environmental consequences of the proposed intervention and reviews current environmental legislation and the performance and management practices of the railway company and includes an Action Plan, undertaken for the EBRD.

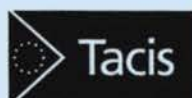
Uzbek Railway Project, Uzbekistan - Environmental component of a pre-investment due diligence study for the development of the railway infrastructure, EBRD.

Ahзов and Taganrog Port Development, Russian Federation - Environmental Review of current port operation and proposals of recommendations both in terms of design and operation of equipment and management procedures to reduce impacts on the environment, undertaken for Tacis

Liverpool Airport, UK - EIA of proposed New Terminal Development. Issues addressed include air quality, noise, ecology and impact arising from air traffic movements and associated increases in road traffic, private client.

Doncaster Finningley Commercial Airport, UK - EIA of proposed Commercial airport development. A key component of the study was the identification of measures to reduce the percentage of road vehicle movements to the site and other regional and national airports through enhancement of public transport provision, implementation of a green transport plan and other incentives to reduce use of cars.

	<p>Water Resources Azare, Misau, Jama'are Water Supply Project, Nigeria - Environmental input to a feasibility study of various options to increase water provision to three towns in Bauchi state, financed by the African Development Bank.</p> <p>Other development Mersa Alam Tourist Development, Egypt - Identification of environmental constraints and opportunities with the siting and operation of the development, to provide input to the masterplan and develop protocols for environmental protection, funded through a loan from the IFC.</p> <p>Policy/Strategy Development of Strategic Guidelines for Mining and Oil Extraction in Arid and Semi-Arid Regions - The guidelines are intended for government, prospecting companies, NGOs and monitoring agencies and cover all components of the environmental management cycle. They are being developed for the IUCN, together with the Secretariat of the Convention to Combat Desertification, the World Business Council and the OECD Secretariat.</p> <p>South East England Regional Air Services Study Environmental Appraisal Groups 2 and 3 - The appraisal will input to an independent study to look at capacity potential of all airports in the region. It involves design and implementation of an appraisal framework for which objectives and indicators are being set to rank the different options in terms of their implications for the environment, DETR</p> <p>Sustainable Tourism Study, Green Globe Destination Programme, Koh Samui, Thailand - This study is being undertaken as part of the programme to establish Koh Samui as the first certified Green Globe Destination. It comprises various components including establishment of a Destination Vision, involving participation of a wide range of stakeholders through workshops, meetings and questionnaires, a Strategic Environmental Review of the past performance and future issues facing Koh Samui and a Capacity Building Programme to establish stakeholder consensus and improve the local skills base.</p> <p>Environmental Awareness/Management National Indicators for Contaminated Land - The aims of the project are to develop and agree national indicators and to develop and implement a method for generating, collating and reporting on such information undertaken for the UK DETR, the Environment Agency and the National Assembly for Wales</p>
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Date:	1997 - 1998
Location	New Zealand
Company	UNEP/GRID - Christchurch
Position	Project Manager for Pacific Activities
Description	<p>Environmental Awareness/Management</p> <p>National Indicators Programme: Information Management Project, Ministry for the Environment, NZ - Leader of a multi-disciplinary team to design and implement a national, on-line information system that will accept, store, process provide access to and analyse environmental information. Contributors/users of the system include national and local governments, research institutes, consultancies, and the general public. The project addresses both the technical aspects of the system as well as associated organisational and policy issues eg. ownership, resourcing, standard, legislative requirements, management of the system etc. A key component of the project is the implementation of a carefully planned needs analysis and consultation exercise in order to achieve the buy-in, from the large and diverse group of stakeholders, which is essential for its success.</p> <p>South Pacific Regional Environment Programme (SPREP), Western Samoa - Establishment of an initiative to design a resource atlas/information system that incorporates data that can be monitored by, and of use to, local communities within the Pacific Island region. This initiative was developed through collaborative work with WWF, SPREP, UNDP and other programmes active in the region and involved use of GIS.</p> <p>Policy/Strategy</p> <p>Global Environmental Outlook (GEO-2), UNEP, Antarctica - Contributing author to the Antarctic sections of the GEO-2 Report, which summarises the major past and emerging environmental issues in this region, the effectiveness of policy responses and identifies new issues that require further research.</p>

Date:	1992 - 1997
Location	UK
Company	Mott MacDonald Group
Position	Environmental Project Manager
Description	<p>Roads</p> <p>Road Network Pre-investment Study, Czech Republic - Environmental component of an economic, environmental and technical study undertaken for the European Investment Bank (EIB) to identify, justify and rank various road improvement and new investment projects for possible financing by the EIB and the European Bank for Reconstruction and Development (EBRD). The appraisal was undertaken in accordance with EBRD and EIB policy.</p>

Environmental Assessments of various Road Developments, UK - Studies included an extension of the A1(M), the proposed widening of the M25, the construction of the new section of the A5, various bypasses and a new road crossing from the mainland to the Isle of Sheppey in Kent, as well as preparation of material for public enquiry. The assessments were undertaken in accordance with the requirements of the Department of Transport Design Manual for Roads and Bridges. Issues addressed included; noise, air, and water quality, land use and severance, archaeology and heritage, contaminated land, planning, effects on road users and nearby communities as well as implications for ecology, including the consequences of development across an internationally designated wetland area.

Environmental Studies of Highway Schemes, Hong Kong - EIA's undertaken for Hong Kong Government to study the construction and operation of several sections of the North Lantau Expressway, Kowloon Land Reclamation development and Route 5. The schemes pass through areas comprising mixed high rise residential and industrial, as well as rural land in the New Territories. Due to the height and density of residential buildings in the vicinity of the proposed routes and the already poor prevailing environmental conditions, a large number of potential receptors were identified. The limited land area available and other structural considerations restricted the possible mitigation options. Noise and air pollutant levels were identified as the key environmental issues and were modelled for both the construction and operational phases. Criteria for significance of impacts were developed through consideration of the legislation and guidelines, existing environmental conditions and consultation with the Hong Kong Environmental Protection Department. Impacts on water quality, ecology and landscape were also evaluated. Practical mitigation measures, including full enclosures of sections of the road, were recommended and a cost benefit analysis undertaken for each mitigation option.

Environmental Assessment for the Channel Tunnel Rail Link Transport and Traffic Infrastructure Study, UK - The study comprised an appraisal of several route options in terms of impact on road, rail and water traffic during both the construction and operational phases in order to establish the preferable route in environmental terms. This was followed by an assessment of the chosen option, to determine the environmental impacts and propose mitigation measures. The issues addressed included noise, air pollution, severance, visual intrusion and disruption.

Water Resources

EIA Small Towns Water Supply and Sanitation Project Part B: Jinja/Njeru Component, Uganda - Overall responsibility for the Environmental Impact Assessment undertaken for the World Bank and Ugandan National Water and Sewerage Corporation. Key issues were identified as water quality, maintenance of a reliable level of service, willingness and ability to pay for the services. charging and billing

strategies and public health status. Detailed mitigation, monitoring and management plans were developed which took account of local capabilities and available resources.

EIA of Tees Transfer Scheme, UK - Environmental Scoping Study followed by an Environmental Assessment of various pipeline and river transfer options to supply water from the Northumbrian catchment to the Yorkshire area. The range and potential severity of possible effects arising from the transfer of water between three catchments together with the high public profile of this scheme required a particularly rigorous approach to the assessment and the implementation of full and regular consultation as well as management of a large project team and budget in excess of £2.5 million.

EIA Hyderabad Second Water Supply and Sanitation Project, India - Overall responsibility for the Environmental Impact Assessment undertaken for the World Bank and Hyderabad Metropolitan Water Board. The key issues were ecology, hydrology and water quality, traffic generation and social-cultural issues, in particular public health and rehabilitation and resettlement.

EIA Flood Defence Improvement Schemes, UK - Appraisal of all environmental aspects associated with the construction, operation and maintenance of proposed engineering improvements works to inland and coastal flood defences in Lincolnshire and Cumbria. The study also addressed mitigation measures and enhancement opportunities.

EIA Perth Flood Defences, Environmental Assessment, UK - Preparation of an Environmental Statement, for submission to the Secretary of State for Scotland, to accompany the Flood Prevention Order to construct extensive walls, embankments, culverts, storage areas and pumping stations adjacent to the River Tay. This environmental statement was submitted to and accepted by the Institute of Environmental Assessment in order to renew Mott MacDonald's status as a Registered Environmental Assessor.

Investment

Mumbai International Airport, Bombay, India - Environmental component of the pre-feasibility study of a proposed new airport undertaken as part of the Bombay Infrastructure Initiative with the support of the British Government. A large number of potential receptors were identified.

Industry

EIA Tobacco/Cigarette Factories Izmir, Turkey and Samarkand, Uzbekistan - Environmental Impact Assessments of construction and operation of proposed factories to identify environmental concerns and recommend mitigatory works and measures. The appraisals were based on UK and EU policy, legislation and guidelines and focused on emissions to air and water.



	<p>EIA Isle of Man Incinerator and Landfill Study, UK - Studies to identify sites for a waste incinerator and associated landfill. Issues addressed included urban and rural infrastructure, climatic factors and air quality, roads and transport, coastal protection, conservation and landscape issues, hydrology and hydrogeology, planning land use and industrial sites and operations.</p> <p>Environmental Management Environmental Audit of the National Training Centre, Construction Industry Training Board (CITB) UK - The audit comprised both an appraisal of the current environment performance as well as an evaluation of potential consequences of past activities. Areas covered included emissions, waste management, soil and groundwater contamination, dangerous materials (eg. CFC's, asbestos), infrastructure and environmental management procedures. The study identified areas of non-compliance and areas where the performance was considered to be unsatisfactory. The necessary actions were identified and prioritised and advice provided to allow the formulation of an environmental management system.</p> <p>Environmental Audits - Industrial, retail and commercial sites to determine the risk and consequences of environmental pollution and contamination of groundwater from current and historic land use. Desk studies and site investigations have been undertaken.</p>
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Date:	1991 - 1992
Location	UK
Company	WS Atkins Water Division
Position	Environmental Scientist
Description	<p>Waterways Modelling of Coastal Water Quality - Hydraulic and water quality modelling to predict levels of pollutants in estuarine and coastal waters arising from the construction of new sewage outfalls in Devon. The predictions were analysed and interpreted and recommendations made concerning locations of outfalls, flow rates and level of treatment required. Also responsible for Project Co-ordination and liaising with client and consultees.</p>

Date:	<i>1986 – 1990</i>
Location	UK
Company	University of Cambridge
Position	PhD and Research Associate
Description	Research and application of Mathematical modelling - The techniques developed were later used for various water quality modelling applications

15. **Others:**

Research:

1994 – 1995: **Environmental Specialist, Hut Point/Ross Island, McMurdo Sound, Antarctica** - Provision of specialist environmental input to the development of a GIS environmental database to aid the implementation and operation of an internationally co-ordinated approach to environmental policy and management in this region. The work was undertaken with the support of the US National Science Foundation and the International Centre for Antarctic Information and Research.

Teaching/Seminars:

2000 – to date: Preparation and delivery of internal seminars to Scott Wilson staff providing an introduction to the principles of sustainable development, as well as the needs and methods to incorporate such principles into engineering design.

1997 – 1998: Seminars on EIA methods and practice to students undertaking the Msc course in Resource Management at Lincoln University, Christchurch, NZ.

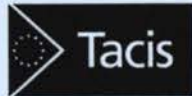
1995 – 1997: Delivery of various courses and seminars to overseas participants, as capacity building exercises on both overseas assignments and at UK institutions. Attendees have included delegates from government departments and research institutes in various countries including Pakistan, India, Bangladesh, Ethiopia and Indonesia.

Committees:

1997- 1998: **Steering Committee Member, Environmental Joint Action Group (JAG), NZ** - The JAG comprises a partnership of New Zealand environmental consultancies and New Zealand's Trade and Development Board. Its purpose is to enhance overseas fee income of the membership through co-operative activities in the gathering of market intelligence, promotion of capabilities and the targeting of projects in selected overseas markets.

1997 – 1998: **Committee Member, Christchurch Agenda 21, NZ**

1997: **Member of NZ Government Delegation to Malaysia Representing Environmental Sector in New Zealand, New Zealand/Malaysia Joint Management Commission for Co-operation in Science and Technology, Ministry of Science Research and Technology, NZ** - Identification and establishment of potential areas of, and basis for, collaboration between the two countries in the environmental field. Specific projects and



collaborators have been identified, and are being progressed, as well as possible funding arrangements.

Awards and Distinctions:

- 1978 – 1982: Mary Thomson University Bursary, University of Glasgow
- 1985 – 1988: ICI Industrial CASE Aware
- 1985 – 1988: UK Science and Engineering Research Council Grant
- 1987: Darwin College, University of Cambridge, Travel Grant
- 1994 – 1995: Trans-Antarctic Association Grant in support of Antarctic Fieldwork and Travel

Scott Wilson Kirkpatrick & Co Ltd
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European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/RG

Date 30th January 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Ruth Golombok, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed

R Golombok

Date

6/February/2001

Part of the worldwide Scott Wilson consultancy group

Registered in London: No. 880328 Registered Office: Scott House, Basing View, Basingstoke, Hampshire, RG21 4JG, England

UK Offices: Abingdon, Basildon, Basingstoke, Birmingham, Chesterfield, Crewe, Edinburgh, Glasgow, Inverness, Leeds, London, Manchester, Nottingham, Peterborough, Plymouth, Swindon, Telford and over 30 offices worldwide



Certificate No. FS 825

OMNIBVS HAS LITTERAS VISVRIS
VNIVERSITATIS GLASGVENSIS SENATVS
SALVTEM

Noueritis omnes Almam Vniuersitatem Glasguensem alumnam suam

RUTH GOLOMBOK

peractis feliciter quae cum regni legibus tum Vniuersitatis statutis requiruntur Scientiae Baccalaureum cum honoribus primae classis creasse et renuntiasse atque omnibus et singulis privilegiis libertatibus immunitatibus quae uel per auctoritatem apostolicam uel per regias litteras et regni statuta uel aliter quomodolibet huiusmodi graduatis concessae fuerint exornatam uoluisse.

In quorum fidem his litteris commune Vniuersitatis sigillum apponendum curabamus.

Dabamus Glasgae in aedibus academicis anno salutis mcm lxxxii die xiv mensis iulii

CURRICULUM

With Honours of the

First Class

CHEMISTRY

Mathematics

Mathematics (Higher)

Natural Philosophy

Archaeology

.....



This is to certify that

Ruth Golombok
was elected and admitted as

a Member of

THE CHARTERED INSTITUTION OF
WATER AND ENVIRONMENTAL
MANAGEMENT

on

17th April 1997

*Given under the Seal of the Institution
By Resolution of the Council*



David Woods President

RA Bispham Secretary

Certificate of Registration

This is to certify that

RUTH GOLOMBOK

is registered as an

Associate Environmental Auditor

from

10 FEBRUARY 19 96

Having, in the opinion of the Council, met the criteria for this level of registration as set down in the Rules of the Association.

Registrant
Number

24A

David S. Uxue

Chairman

This Certificate of registration is valid for a period of one year from the date shown above and is not transferable. Registration is dependent upon the individual continuing to abide by the Code of Practice specified by the Environmental Auditors Registration Association. This certificate remains the property of the Association and must be surrendered on request.

Note: The Environmental Auditors Registration Association is incorporated under the Companies Act 1985 as a company limited by guarantee without a share capital.



UNIVERSITY OF CAMBRIDGE

I hereby certify that

RUTH GOLOMBOK

of

DARWIN COLLEGE

in the University of Cambridge was at a full
Congregation holden in the Senate House on

7 May 1994 admitted to the Degree of

DOCTOR of PHILOSOPHY

Witness my hand this seventh day of
May one thousand nine hundred and ninety four

Registrary's Clerk

Registrary of the University

Proposed position in the programme:**BRIDGE SPECIALIST**

1. **Family name:** WEBB
2. **First names:** Peter Michael
3. **Date of Birth:** 9 January 1944
4. **Nationality:** British
5. **Civil status:** Divorced

6. Education:

Institution	Brighton College of Technology
Date:	1962 - 1965
Diploma obtained	Diploma in Civil and Structural Engineering

7. Language skills:

Language	Reading	Speaking	Writing
English	5	5	5

8. **Membership of professional bodies:** Member Institution of Civil Engineers
9. **Other Skills:** Computer literate
10. **Present position:** Principal Engineer
11. **Years with firm:** 35

12. Key qualifications:

Peter Webb has some 25 years experience in the management of design projects and their implementation and the preparation of tender and construction documentation for bridgeworks projects both in the UK and overseas in various countries and is conversant with the requirements for virtually all forms of bridge construction.

- He has very recently completed his responsibilities as the management team leader in the Ukraine providing expert and technical advice for the design, preparation of contract documents and for construction of new bridges.
- Team leader for the due diligence in regard of construction of a new tunnel and technical advice on the construction of bridges in Poland
- He has provided wide ranging technical assistance and training in all aspects of bridges and related fields.

His experience also includes responsibilities for design, inspection, rehabilitation and assessment of many diverse new or existing structures.

13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Poland	1997 - ongoing
Ukraine	1998 - ongoing

14. Recent Professional Experience Record:

Date	<i>1988 – to date</i>
Location	UK and Overseas
Company	Scott Wilson
Position	Principal Engineer
Description	<p>Ukraine: Management Team Leader for technical assistance to Ukrdiproddor for the assessment and inspection of existing bridges, design, preparation of contract and tender documents and construction for new steel/concrete bridges plus remedial works to existing steel structures, as part of border crossing improvements at the Western River Bug. Management Team responsibilities also include advice on contract strategy, provision of estimates, technical assistance during contract evaluation, and being a member of the tender evaluation committee.</p> <p>Poland: Team leader for due diligence study in regard of construction of a new tunnel beneath railway embankment and strengthening of an existing viaduct over rail lines, Bialystok. Study included review of operation and construction proposals, tender documentation, procurement strategy and technical assistance</p> <p>Poland: Technical advice for construction of 13 bridges of</p>

	<p>reinforced concrete, prestressed concrete or composite construction and a tunnel for the Poznan Bypass forming part of the A2 Motorway.</p> <p>Poland/Ukraine: Technical review and advice on the condition and remedial works required to existing bridge and procurement of a second structure as part of border crossing improvements.</p> <p>Poland: Technical advice to local design consultants in regard of design requirements for a two span highway bridge of asymmetric cable stayed construction with spans of 225m and 117m. This structure is the first of its form to be designed by local engineers.</p> <p>UK: Project manager for the design of an 84m span steel truss of fabricated tubular steel sections connecting the Millennium Dome site with the River Thames, London.</p> <p>Guam: Expert advice to litigation team in respect of the collapse of a major island link bridge of post-tensioned balanced cantilever construction with a central span of some 220m.</p> <p>Sudan: Technical advice to local consultant in regards of selection of bridge construction forms and design for wadi crossings of up to 1km in width. Subsequently provision of technical advice during construction of bridgeworks.</p> <p>UK: Seconded to lead team for the feasibility study and subsequent design of the strengthening and the structural refurbishment to two multispan viaducts crossing Ladybower Reservoir, Derbyshire. Both structures of an unusual form of construction with concrete encased arched lattice steel trusses supporting the reinforced concrete decks for the highway and aqueduct galleries below. Approx contract value £6 million</p> <p>UK: Independent Technical Review of a ship collision barrier, of steel construction, to protect a nuclear refuelling processing facility against accidental impact from vessels of up to 20,000 tonne displacement.</p> <p>UK: Independent Technical Assessment of X Flap Dock Gate and dock structure for the static and seismic conditions, including extent of strengthening works, to provide an acceptable safety case for the dry-docking of nuclear submarines. Dock Gate some 21m by 16m of orthotropic construction.</p> <p>Hong Kong: Non-linear finite element analysis of the externally prestressed precast segmental box girder superstructures for the Route 3 Country Park Highway to determine their ultimate flexural capacity .</p> <p>UK: Design of energy absorbing steel crane containment barrier to protect nuclear submarines against impact resulting from crane failure or accidental overload.</p>
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	<p>UK: Feasibility study to assess suitability and repair requirements for the alternative use of a concrete caisson dock gate, some 33.5m by 20m in plan and 16m high, as part of a ship impact barrier.</p> <p>UK: Feasibility study for a prestressed concrete docking cradle to support and provide an acceptable safety case for nuclear submarines during a seismic or other exception event.</p> <p>UK: Team Leader for production of preliminary designs for some 90 bridgework structures, mainly rail underline, for the urban sections of the proposed high speed Channel Tunnel Rail Link including cut and cover tunnel sections at the St Pancras Terminus.</p> <p>UK: "State of the art" design assessment of a major river crossing bridge superstructure in Glasgow, Scotland, followed by an independent design check of strengthening utilising unbonded external prestressing, Bridge superstructure of multicell post tensioned box construction with approach spans of 62 metres in length and a central river span of 143 metres, constructed by the balanced cantilever method.</p> <p>UK: Design assessment and technical inspections during construction of a major road tunnel in the Docklands area of London, UK; to secure provisions for proposed future building development over or adjacent. The tunnel, with a construction value of £240 million, lies within close proximity to the River Thames and traverses navigable waterways. Construction utilised both top-down and bottom-up methods.</p> <p>UK: Technical inspections during construction of the East India Road Tunnel in London, UK, to secure provisions for proposed future building development over or adjacent. Construction of the 0.34km long tunnel is by the top-down method through reclaimed dock and estuarial areas within close proximity to the River Thames.</p> <p>Project Manager for bridgework projects which have included:</p> <p>UK: Design and production of tender and construction documentation for the replacement of a road bridge deck over London Underground lines at Upton Park, East London.</p> <p>UK: Feasibility study to identify options and provide recommendations for strengthening or replacement of three road bridges over London Underground lines in Central London.</p> <p>Nepal: Preliminary design of bridgeworks for the Arun Access Road, to provide crossings of fast flowing mountainous rivers.</p> <p>UK: Feasibility Studies for bridgeworks in the widening of a major feeder route into London, UK.</p>
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	<p>Mozambique: Design of abutments and anchors for pontoon bridge crossing of the Limpopo River, Xai Xai, Mozambique. Bridge superstructures of proprietary modular construction.</p> <p>UAE: Design of bridgeworks and structures for the Trade Centre Interchange Project, Dubai, United Arab Emirates. Project cancelled during design phase.</p> <p>UK: Preparation of conceptual designs for bridge-works on a length of the proposed Channel Tunnel Rail Link including a multi span river crossing with spans of up to 100 metres and deck construction in steel and prestressed concrete, and cut-and-cover tunnels.</p> <p>Saudi Arabia: Deputy Project Manager for design and supervision-in-chief of air base facilities at the King Faisal Air Academy, Riyadh, Saudi Arabia.</p>
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Date	1988 – 1978
Company	Scott Wilson
Location	UK and UAE
Position	Assistant Principal Engineer
Description	<p>Head of Bridgeworks and Structural Department, Telford office, with overall responsibility for the preparation of designs and contract documentation.</p> <p>Team Leader with responsibilities for design, survey and assessment projects which have included:</p> <p>UAE: Site Condition Survey and Report on the condition of approximately one hundred deteriorating structures in an oil/gas processing plant in Abu Dhabi followed by assessment and recommendations for repairs to selected structures.</p> <p>UK: Conceptual design of the main river crossing for proposed Third River Crossing of River Thames at Dartford, England. Multispan approach viaducts and replacement bridges for widening of existing urban trunk road. New main crossing has spans of 200m, 500m and 200m with approach viaduct spans of 48m.</p> <p>UAE: Design of two reinforced concrete and pre-stressed bridges to urban trunk road over oil pipelines in Abu Dhabi.</p> <p>UAE: Design of hardened aircraft alert and maintenance associated shelters for a military air base in the United Arab Emirates.</p> <p>UK: Survey and report, including recommendations for repairs, of a fire damaged multi-storey office block Camberley, England.</p> <p>UK: Conceptual design and recommendations of flood water</p>

diversion scheme beneath existing motorway intersection for land development project in the UK. Schemes considered involved both cut and cover and pipe jacking construction techniques.

Singapore: Engineering advice and recommendations on suitability of precast prestressed elements for construction of a multi-storey office development complex in Singapore.

Oman: Scrutiny of design and details, including proposals for improvements, for a number of steel portal hangers with spans of up to 40 metres for military installations in Oman.

Hong Kong: Assessment of warping stresses in sharply curved multi-span, multi-cell prestressed concrete box bridges, by computer modelling, for projects in Hong Kong.

Nigeria: Design of 200 metres long road and ramp bridge of multiple box segmental construction for the New Federal Capital City, Abuja, Nigeria.

Nigeria: Independent design check to Merrison rules of steel folded plate barrage gates, folded plate stop logs and structural steel gate control/lifting towers, Sokoto Water Barrage, Nigeria.

UK: Site inspection, assessment and report, including design of remedial works required for fire damaged St John's Precinct multi-level shopping complex in Liverpool, England.

Team Leader with responsibilities for:

Design of standardised and interchangeable bridge super-structure and substructure components for a number of State Road projects in Nigeria.

Design of multi-span prestressed concrete bridge to cross the Rima River, Nigeria, length 440m.

Date	<i>1979 – 1979</i>
Location	Papua New Guinea
Company	Scott Wilson (Hong Kong)
Position	Senior Bridge Engineer
Description	Seconded to Papua New Guinea to lead team for the design of bridgeworks and preparation of contract documents for the replacement of 10 steel bridges and remedial works to 22 steel/concrete bridges on the Kassam to Daulo Section of the Highlands Highway, situated in a high risk earthquake region.

Date	<i>1973 – 1978</i>
Location	UK
Company	Scott Wilson
Position	Senior Assistant Engineer
Description	<p>Team Leader for the design of bridgeworks and preparation of contract documents for the Napier Mole Road Bridge crossing the China Creek, Karachi, Pakistan. Seconded to bridge site in 1977 as Resident Engineer.</p> <p>Team member with responsibilities for:</p> <p>Design of structural steel strengthening to bridge super-structure of steel plate girder construction and remedial works to bridge substructure for 13 structures on the Dahid-Fujarah Road, United Arab Emirates.</p> <p>Design of multi-span road bridges sited at wadi crossings for the Gharian to Brak Road, Libya; bridge decks of pre-stressed/reinforced concrete construction.</p> <p>Design of 7-span serially constructed curved twin-cell prestressed concrete box bridge, Lagos, Nigeria.</p> <p>Conceptual design and costing for stressed ribbon, span 770m, Lei Yue Mun Bridge, Hong Kong.</p>



Date	<i>1970 – 1973</i>
Location	UK
Company	Scott Wilson
Position	Assistant Engineer Chartered
Description	Team member for design of the elevated sections of the Lagos-Apapa Road, Nigeria. Design of prestressed and reinforced concrete bridges for various road and motorway projects in UK.

Date	<i>1968 – 1970</i>
Location	UK
Company	Scott Wilson
Position	Assistant Resident Engineer
Description	Supervision of construction of prestressed and reinforced concrete bridges on a 16km section of the M6 Motorway, UK.

Date	<i>1965 – 1968</i>
Location	UK
Company	Scott Wilson
Position	Assistant Engineer Under Agreement
Description	Team member for the design of civil engineering, structural and bridge works.

Scott Wilson Kirkpatrick & Co Ltd
Scott House,
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European Commission
Tacis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

Your Reference: SCR-E/110622/C/SV/WW

Our Reference: HSMSB/PW

Date: 30th January 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Peter Webb, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed

Peter Webb

Date

7th February 2001.





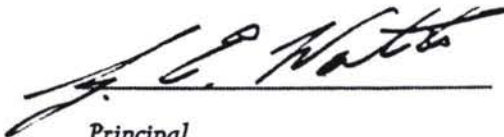
BRIGHTON COLLEGE OF TECHNOLOGY


DIPLOMA IN
CIVIL AND STRUCTURAL
ENGINEERING

AWARDED TO

Peter Michael Webb

who has completed a course in Civil Engineering
approved by the Council of the Institution of Civil Engineers
and the Council of the Institution of Structural Engineers
and has passed the final examination


Principal


Head of Department of
Civil Engineering and Building

Dated 31st day of July 1965

THE INSTITUTION OF CIVIL ENGINEERS

Established 1818

Incorporated by Royal Charter 1828

This is to certify that

PETER MICHAEL WEBB

was on 23rd JUNE, 1970 elected a

MEMBER

of

THE INSTITUTION OF CIVIL ENGINEERS

A Society established for the general advancement of Mechanical Science and more particularly for promoting the acquisition of that species of knowledge which constitutes the profession of a Civil Engineer, being the art of directing the great sources of power in Nature for the use and convenience of Man.



WITNESS our hands and Seal at
Westminster, this 23rd day of

JUNE, 1970.

Angus Atkin President

J. Shute Secretary



Proposed position in the programme:

CONTRACTS EXPERT

- 1. **Family name:** JUDGE
- 2. **First names:** David Elliot Perceval
- 3. **Date of Birth:** 1946
- 4. **Nationality:** British
- 5. **Civil status:** Single (widowed)
- 6. **Education:**

Institution	Kingston College of Advanced Technology (now Kingston University)
Date:	1966 - 1969
Diploma obtained	Diploma in Civil Engineering

7. **Language skills:**

Language	Reading	Speaking	Writing
English	5	5	5
French	1	1	1

- 8. **Membership of professional bodies:** Chartered Engineer
Member of the Institution of Civil Engineers, UK
(1973)
- 9. **Other Skills:** Computer Literate (Word & Excel)
- 10. **Present position:** Principal Engineer
- 11. **Years with firm:** 5

12. Key qualifications:

Mr. Judge has gained extensive experience over several years in the procurement of contractors, comprising the preparation of tender documentation and the assessment of tenders to determine the most economic package to fulfil the client's requirements. This involves attention to detail to ensure that the tender documents set out fully and clearly the services or goods to be supplied together with all critical conditions, and careful review of tenders submitted to determine compliance with the requirements of the tender documents, identify any qualifications, assess technical aspects and make recommendations for award of contract to the tenderer who submits the optimum overall bid. Particular projects in which he has been involved in procurement are:

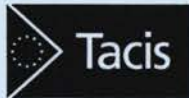
- Kyrgyz Republic Urban Transport Project (current)
- Karnataka State Highways Improvement Project, India (current)
- Tacis Cross-Border Co-Operation Programme (1998-1999)
- Asian Development Bank Phnom Penh to Ho Chi Minh City Highway Improvement Project (1996-1997)
- Asian Development Bank Road Rehabilitation Project in Uzbekistan (1997)
- Asian Development Bank Road Roads Development Project in Mongolia (1995-1996)
- Passenger Terminal Building at Hong Kong's new international airport (1993-1995)
- Rail link to Hong Kong's new international airport (1992-1994)
- Extension to Hong Kong's urban mass transport railway and associated property developments (1981-1986)

13. Specific Central and Eastern European and NIS Experience:

Country	Date
Kyrgyz Republic	2000
Mongolia	1995 - 1996
Uzbekistan	1997

14. Recent Professional Experience Record:

Date:	<i>1995 – to date</i>
Location	UK
Company	Scott Wilson
Position	Principal Engineer
Description	<p>U.K.</p> <p>Preparation of proposals and expressions of interest for consultancy services contracts for road rehabilitation projects in Bulgaria, Cambodia/Vietnam, Ethiopia, India, Macedonia, Poland, Sudan, and Uzbekistan.</p> <p>Provision of contractual advice on due diligence commission for bidder on a high-speed rail link in the Netherlands.</p> <p>Provision of contractual advice to contractor for prospective arbitration on claims arising on a road project in Pakistan.</p> <p>Preparation of documents for the procurement of a negotiated contract for refurbishment of dockside cranes in Aktau, Kazakhstan.</p> <p>Preparation of tender documents for the procurement of contractors for the Tacis-funded Cross-Border co-operation programme for improvements to border crossings and construction of a new road bridge.</p> <p>Assessment of tenders for consultancy services for supervision of construction of improvements to border crossings and new road bridge under Tacis-funded Cross-Border co-operation programme.</p> <p>Provision of advice on contractual issues and claims to other departments within the company.</p> <p>Responsible for writing procedures for the procurement of contractors for civil engineering construction overseas.</p>



Date:	<i>February 2000 - on-going</i> (work carried out during visits in-country)
Location	Bangalore, India
Company	Scott Wilson
Position	Procurement Specialist
Description	Preparation of prequalification and tender documents for procurement of contractors for a road rehabilitation project under World Bank procurement procedures utilising both International Competitive Bidding (incorporating prequalification) and National Competitive Bidding (incorporating postqualification), and assessment of prequalification submissions. Preparation of expressions of interest for supervision consultancy services contracts and assessment of submissions. Preparation of Requests for Proposals for procurement of consultants for supervision contracts.

Date:	<i>March 2000</i>
Location	Bishkek, Kyrgyz Republic
Company	Scott Wilson
Position	Procurement Specialist
Description	Procurement advice during pre-tender meetings for urban transport project.

Date:	<i>July 2000</i>
Location	Romania
Company	Scott Wilson
Position	Contracts Specialist
Description	Participation in a technical and contractual audit of contract administration on the Bucharest - Pitesti Motorway, to establish that it had been correctly carried out and that contract modifications were sound from a commercial perspective.

Date:	<i>1996 - 1997</i> (work carried out over three one-month visits)
Location	Phnom Penh, Cambodia & Ho Chi Minh City, Vietnam
Company	Scott Wilson
Position	Contracts Expert
Description	Responsible for the preparation of prequalification documents and assessment scoring system and procedures, and assessment of submissions for prequalification for the procurement of contractors for a multi-contract project for the ADB-funded rehabilitation of the road linking Phnom Penh in Cambodia and Ho Chi Minh City in Vietnam.



Date:	<i>1997 - 1997</i> (6 week period)
Location	Tashkent, Uzbekistan
Company	Scott Wilson
Position	Contract Specialist
Description	Responsible for the preparation of prequalification documents and assessment scoring system and procedures, and outline tender documents for the procurement of contractors for an ADB-funded road rehabilitation project.

Date:	<i>1995 - 1996</i> (work carried out over three visits totalling 7 months)
Location	Ulaanbaatar, Mongolia
Company	Scott Wilson
Position	Procurement Specialist
Description	Procurement of contractors for an ADB-funded project for the rehabilitation of 300 km of road from Ulaanbaatar to Altanbulag, involving preparation of prequalification and tender documents, attendance at pre-tender site meetings and visit, preparation of tender addenda, and assessment of tenders.

Date:	<i>1992 - 1995</i>
Location	Hong Kong
Company	Provisional Airport Authority (now Airport Authority)
Position	Senior Contracts Engineer
Description	<p>Preparation, in association with in-house construction lawyers, of standard conditions of contract and a general technical specification to be used on civil engineering contracts for the construction of Hong Kong's new international airport at Chek Lap Kok.</p> <p>Preparation, as team leader, of the particular specifications and tender documents for the procurement of contractors for construction contracts for the passenger terminal building at the new airport (total value HK\$10.5 billion).</p>



Date:	1992 - 1992
Location	Hong Kong
Company	Mass Transit Railway Corporation
Position	Contracts Engineer
Description	<p>Preparation of standard conditions of contract, general technical specification and method of measurement for civil engineering contracts for the construction of the rail link to Hong Kong's new international airport. The work involved liaison with external lawyers and other departments within MTRC.</p> <p>Preparation as team leader of particular specification and tender documents for the procurement of a contractor for a design-and-construct contract for a twin-level bridge on the new airport rail link. The work involved liaison with, and co-ordinating input from, other departments within MTRC.</p> <p>Responsible for the drafting of procedures for the preparation of tender documentation for civil engineering contracts for the new airport rail link.</p>

Date:	1989 - 1991
Location	Hong Kong
Company	Mass Transit Railway Corporation
Position	Resident Engineer
Description	<p>Preparation of specifications and tender documents, assessment of tenders and making recommendations for award, and contract administration for two contracts for repair works to the external walls of 21 No. high-rise residential blocks (total value HK\$90M). The work included supervision of works, certification of sums due for payment, and assessment and negotiation of claims.</p>

Date:	1986 - 1989
Location	Hong Kong
Company	Mass Transit Railway Corporation
Position	Contracts Engineer
Description	<p>Member of a legal team set up to prepare the defence for a major litigation (in the order of HK\$400M-500M) and other associated legal actions relating to a residential property development. Duties included working with MTRC's external legal advisors identifying engineering and planning issues in the plaintiff's case, assisting with drafting responses, and reviewing programming aspects of the actual construction of the development. Overall the cases were settled on terms favourable to the Corporation.</p>

Date:	<i>1981 - 1986</i>
Location	Hong Kong
Company	Mass Transit Railway Corporation
Position	Contracts Engineer
Description	<p>Drafting of particular specifications, preparation of tender documents, assessment of tenders for the procurement of contractors and recommendations for award of contracts for civil engineering works on a section of the Island Line extension to the MTR network and associated property developments.</p> <p>Review of specifications used on the Island Line project to collect comments and anomalies identified by use of the documents on site, and drafting of revised clauses to incorporate appropriate amendments.</p>

Date:	<i>1979 - 1981</i>
Location	Sussex, UK
Company	Sir William Halcrow & Partners
Position	Measurement Engineer
Description	Responsible for monthly measurements and claims negotiations for the Lewes Tunnel project.

Date:	<i>1977 - 1979</i>
Location	various projects, UK
Company	Sir William Halcrow & Partners
Position	Contracts Engineer
Description	Responsible for contracts administration and claims investigations.

Date:	<i>1976 - 1977</i>
Location	Offshore Department, London
Company	Sir William Halcrow & Partners
Position	Engineer
Description	Project management for offshore oil terminal in Ecuador and in the preparation of feasibility reports and designs for offshore structures and port facilities.

Date:	<i>1972 - 1976</i>
Location	Tunnels Department London, UK
Company	Sir William Halcrow & Partners
Position	Assistant Engineer/Engineer
Description	<p>Design and project administration for the Jubilee Line and Piccadilly Line extensions to the London Underground network.</p> <p>Design and preparation of report for enlargement of Post Office cable tunnel.</p> <p>Design checks on contractors design of reinforced concrete caissons for Dubai Dry Dock.</p>

Date:	<i>1971 - 1972</i>
Location	Clydeside Expressway, Glasgow, Scotland, UK
Company	Sir William Halcrow & Partners
Position	Assistant Engineer
Description	Responsible for setting out and supervision of construction of reinforced concrete structures and services diversions.

Date:	<i>1969 - 1971</i>
Location	Transportation Department, London, UK
Company	Sir William Halcrow & Partners
Position	Graduate Engineer under Indentures
Description	<p>Design of airport extensions in UAE</p> <p>Preparation of tender drawings and bills of quantities for bridge and causeway in Bahrain</p> <p>Highway layout planning and earthworks quantities for Hyde By-Pass, Cheshire, UK.</p> <p>Preparation of data for Roskill enquiry on Third London Airport</p> <p>Preliminary design for reinforced concrete road bridge, Lea Valley, London.</p>

15. Others

Training course for ICE syllabus Civil Engineering Law and Contract Procedures (1997/1998)

Scott Wilson Kirkpatrick & Co Ltd
Scott House,
Basing View,
Basingstoke,
Hampshire
RG21 4JG
England

Telephone +44 (0)1256 461161
Fax +44 (0)1256 460582
www.scott-wilson.com



European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/DJ

Date 30th January 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, David Judge, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed

A handwritten signature in black ink that reads "David E.S. Judge". The signature is written over a horizontal line.

Date 6-2-01



THE INSTITUTION OF CIVIL ENGINEERS

Established 1818

Incorporated by Royal Charter 1828

This is to certify that

DAVID ELLIOT PERCEVAL JUDGE

was on 31st DECEMBER 1973 admitted a

MEMBER

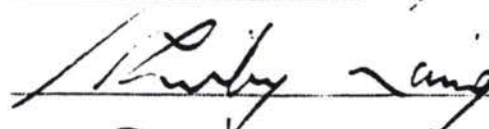
of

THE INSTITUTION OF CIVIL ENGINEERS


A Society established for the general advancement of Mechanical Science and more particularly for promoting the acquisition of that species of knowledge which constitutes the profession of a Civil Engineer, being the art of directing the great sources of power in Nature for the use and convenience of Man.



WITNESS our hands and Seal at
Westminster, this 3rd day of
JANUARY 1974.



President



Secretary

COLLEGE DIPLOMA IN CIVIL ENGINEERING

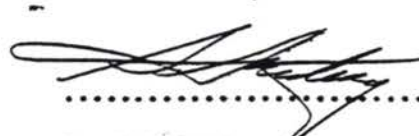
EXAMINATION RESULTS - FINAL YEAR

SESSION 1968-1969

The following candidates have been awarded the Diploma :

ALUWIHARE, Richard Piyasiri
BEAGLEY, David Peter
BRINGES, Terrance
CLARKE, Brian Anthony
DEBNAM, Paul George
FERNANDO, Mervyn Oliver
GALKETTIYA, Punchi Banda
GREENFORD, Richard Charles
GULHANE, Prabhaker Mahadeo
HALE, Colin Ian
HARTLEY, Martin,
JUDGE, David Elliot Perceval
KAMALASENA, Balapuwaduge
KERSLAKE, John Philip
KARDNARATNA, Totage Dayananda Fernando
KUNASINGAM, Rajasingam
LEONG, Siem-Chong
LUKER, Martin James
MANN, David Frederick
MC MASTER, John Frederick
NORTH, Michael Alan
PETERKIN, Richard James
PRASTITIS, Louis Michael
PURSEY, Andrew Richard
RADWAY, David Albert
SALFORD, Graham Charles
TEACKERAY, Nigel Philip
TILAKARATNE, Ruhunage Don Benal
TINSON, Colin Roy
TUKITUKU, Marika Rakai
WALKER, Christopher Seymour
WANASINGHE, Dingiri Banda
WARD, Graham Frederick South
WARNAKULASURIYA, Punyasiri
WARNER, Michael John
WESTWOOD, Nigel Ian
WITTHAMS, Kevin James
WITHARANE, Harischandra
ZEYNEL, Aziz Tozun

.....
L. E. LAWLEY
Principal


.....
S. ARMSTRONG
Head of Department

The following candidate has failed :

MUNCK, Gerald Eric Stampe



Proposed position in the programme

CUSTOMS LIAISON

- 1. **Family name:** CHEESMAN
- 2. **First names:** Leslie Peter
- 3. **Date of Birth:** 13th September 1942
- 4. **Nationality:** British
- 5. **Civil status:** Married
- 6. **Education:**

Institution	Kingston Technical College, Kingston, Surrey
Date: from - to	1956 to 1960
Degree(s) or Diploma(s) obtained	<p>9 "O" levels and 3 "A" levels</p> <p>Attended N. London Polytechnic over two years to obtain a City and Guilds in Plastics Technology Diploma, in 1962.</p> <p>Awarded a National and International CPC, by examination in 1982.</p> <p>In 1990, I was elected to be a Member of Faculty at Henley Management College and remain as an Associate Member of Faculty. I have taught to MBA level on a wide range of management topics and assisted many mature students to achieve their MBA.</p> <p>At Henley Management College, Henley on Thames, I was examined for the RSA Management Assessment Award (to assess other managers) and passed in 1991.</p>

7. **Language skills:** (Mark 1 to 5 for competence)

Language	Reading	Speaking	Writing
English	5	5	5
Russian	1	1	1

**8. Membership of professional bodies:**

Fellow, Chartered Institute of Transport	FCIT
Fellow, Institute of the Motor Industry	FIMI
Fellow, Institute of Sales & Marketing Management	FISM
Fellow, Institute of Logistics and Transport	FILT

9. Other Skills:

Computer Literate
Presentation and Teaching Skills

10. Present position:

Project Manager/ADR Expert

11. Years as a Consultant:

12

12. Key qualifications:

Over thirty years experience in the road, rail and Intermodal transport industry in sales, operational and senior management positions involving work in both developed and less developed countries.

Currently Project Manager for Scott Wilson for the **EC Taxis TRACECA International Road Transport Transit Facilitation project**, which will establish road transport training centres, train trainers and provide courses in CPC, ADR and TIR in the 11 country TRACECA region. A secondary component is to develop SafeTIR in the region, with the assistance of the IRU.

Previously, he was the co-ordinator, based in Brussels, for the **European Commission Taxis TRACECA** programs that covered all aspects of transport development within the 10 countries of the FSU, design and development of ADR training courses for the transport professionals and identification of the legal basis for the introduction of ADR legislation into the national laws of each country.

He was Project Manager for the **EC Taxis TRACECA Trade Facilitation, Customs Procedures and Freight Forwarding** project where he also undertook work on the evaluation of the cotton export market from Uzbekistan.

Concurrently with the above project he was co-ordinator for the **EC Taxis TRACECA Legal and Regulatory Framework project**. This project was instrumental in bringing about change to the laws of transport in the region and to the establishment of National Freight Forwarding Associations in three FSU countries, with the framework established to enable Associations to be developed in the other countries of the Region. At this time he also contributed to the World Bank study on the deregulation of transport in Georgia.

Prior to this time he has been a Transport Consultant involved in a wide range of activities including:

- Seminars, workshops and lecturing at Henley Management College on MBA and Diploma courses covering general business management as well as specific transport related topics in truck and car fleet management.
- Vehicle fleet and management reviews for a wide range of UK companies.



- As the Transport Logistics specialist for the United Nations High Commissioner for Refugees (UNHCR) in Tadjikistan, FSU, with overall responsibility for the efficient movement of goods. This project required extensive travel throughout Central Asia to arrange for the importation of goods from Europe, Russia, Iran, Pakistan and neighbouring countries.
- A short term Logistics and Transport advisor for a Tacis project providing technical assistance in Russia for rail and international haulage by road of foodstuffs, as well as local collection and delivery and freight forwarding activities.

Before working as an independent consultant he was:

- Deputy Director of the Centre for Automotive Management at Henley Management College
- Transport Controller of a governmental organisation in Malawi, Central Africa responsible for the safe movement of over 600,000 tonnes of produce each year, the planning of the department and the training of his successors.

In his early career he held a succession of senior management appointments with responsibility for international freight forwarding, intermodal freight transport operations and the transport of a wide range of dry freight and bulk liquids that also included operational studies, costings, sales and marketing, customs and export documentation.

13. Specific Eastern Countries Experience:

Country	Date: from to
Russia	1998 to present
Hungary	1998 to present
The 11 TRACECA FSU countries	1996 to present
Tajikistan	1994 to present

14. Recent Professional Experience Record

Date: from - to	October 1999 to date
Location	Working throughout the 11 TRACECA countries
Company	Scott Wilson
Position	Project Manager
Description	<p>EC Tacis TRACECA International Road Transport Transit Facilitation project</p> <p>The project spans 11 countries from Ukraine to Mongolia under a Tacis TRACECA programme that will provide training centres for road haulage operators and train trainers to deliver courses in CPC, ADR and TIR. There is also an element of investment in computers for the development of the IRU SafeTIR programme.</p> <p>Design and development of ADR and DGSA training courses for transport professionals and identification of the legal basis for the introduction of ADR legislation into the national laws of each country.</p>

**CURRICULUM VITAE:****Leslie Peter CHEESMAN**

Date: from - to	September 1999
Location	Nizhny Novgorod
Company	Scott Wilson
Position	Road Transport Specialist
Description	EC Tacis Nizhny Nargorod Regional Transport Development project To review the developing strategic investment plan for the region from the perspective of the international and local road haulage companies in the Nizhny Oblast. This is part of a long term plan for the region which will extend over 2 years.

Date: from - to	September 1998 – August 1999
Location	Nepal
Company	UNCTAD
Position	Freight Forwarding Specialist
Description	Freight forwarding specialist input, as part of a \$28 million investment in three ICDs for Nepal. Program continued for two years, part time. Employed by UNCTAD, Geneva to work with local specialists to ensure the maximum possible use of the main rail fed ICD at Birgunj, Nepal and reduce congestion within the existing system. Additional work on two other Nepal/India crossing points for road vehicles, was also undertaken.

Date: from - to	June 1998 - July 1998
Location	Russia
Company	Scott Wilson
Position	Road Transport & Warehouse Specialist
Description	EC Tacis Nizhny Nargorod Regional Transport Development project Road transport and warehouse specialist input into a major review of transport infrastructure in Nizhny Novgorod, Russia funded by the EU. Support of the development of links between inland waterway transport and the inter-modal transport and storage requirements in the region as part of an EU funded initiative. Involved in design of the terminal and specification of the computer hardware/software for the MIS.



CURRICULUM VITAE:

Leslie Peter CHEESMAN

Date: from - to	March 1998 - May 1998
Location	Budapest
Company	Bank of America
Position	Transport Specialist
Description	Transport Specialist for privatisation process of the State Road Transport Company, Hungarocamion, Budapest, Hungary. Employed by the potential investors to undertake a due diligence review of the business of the company in conjunction with consultants Deloitte and Roland Berger, that had started the privatisation process. Privatisation was achieved.

Date: from - to	September 1997 - February 1998
Location	Brussels
Company	Tractebel
Position	Team Leader in Brussels
Description	Team Leader of the TRACECA co-ordinating team that control the activities of the 27 studies and projects throughout the expanded TRACECA region of 11 FSU countries that included Mongolia, Moldova, and the Ukraine.
Detail:	Based in Brussels with occasional fact finding visits to European capitals and to Central Asia. With two experienced field officers the need to travel extensively is reduced with greater emphasis on the communication and co-ordination needed with International Banks, the contractors and the Tacis Task Manager in Brussels.

Date: from- to	February 1996 - September 1997
Location	Tbilisi and Tashkent
Company	Scott Wilson
Position	Regional Co-ordinator
Description	Regional co-ordinator/Transport expert, EC Tacis TRACECA Trade Facilitation, Customs Procedures and Freight Forwarding project in Georgia, Armenia, Azerbaijan, Turkmenistan, Uzbekistan, Kazakhstan, Kyrgyzstan and Tadjikistan:
Detail:	Regional co-ordinator. Nominally based in Georgia but working in 8 of the FSU countries to develop a program of trade facilitation, customs procedures and freight forwarding in conjunction with representatives from HM Customs, The Freight Transport Association and FIATA. This was extended to include the export of cotton from Uzbekistan and within this a short project for World Bank on the prospects for deregulation of the transport industry in Georgia.

**CURRICULUM VITAE:****Leslie Peter CHEESMAN**

Date: from - to	February 1994 - June 1994
Description	Transport Specialist, Tacis Project, Ekaterinburg, Russia:
Detail:	Employed by EU Tacis through Masdar and TMS International on a Tacis food distribution project to carry out audits of a number of transport and distribution organisations and provide recommendations for their improvement or restructuring. The task included the preparation of the road and rail transport component of the strategy for the development of agriculture in the region.

Date: from - to	November 1993 - February 1994
Location	Tajikistan
Company	UNHCR
Position	Logistics Officer
Description	Part of a United Nations team helping to assist refugees in the region. The role was the management and control of petrol from Turkmenistan, timber from Russia and Sweden, coal and roofing sheets from Kazakhstan. Other materials including blankets, plastic sheeting, radio spares and vehicles were imported from Iran, Pakistan and Europe. Some by air freight. The task included all documentation and clearance procedures as well as dealing with the special conditions prevalent at times of civil conflict.

Date: from - to	Mid 1992 – Mid 1997
Location	England
Company	Henley Management College
Position	Lead Tutor
Description	Lead Tutor, Marker and Moderator, HDL Training and Development, UK (now Financial Times Management)
Detail:	Undertaking a number of training and development tasks at Certificate, Diploma and MBA levels of further education in both general management and transport management for Henley Management College and Financial Times Management (formerly Henley Distance Learning).

Date: from - to	Mid 1992 – Mid 1998
Location	England
Company	Self Employed
Position	Consultant
Description	Transport and Fleet Advisor on Cars and Trucks, to Commercial Companies in UK
Detail:	Fleet Management Seminars for Croner Publications in London. Subsequently asked to assist a number of companies in the implementation of change strategies within their transport operating policy. This required senior management involvement and debate. Negotiating with staff and Union Representatives to achieve implementation. Financial savings in excess of £100,000 per annum were achieved.

**CURRICULUM VITAE:****Leslie Peter CHEESMAN**

Date: from - to	1990-1992
Location	England
Company	Henley Management College, UK
Position	Deputy Director, Centre for Automotive Transport
Description	Full time Member of Faculty, involved in curriculum design, expansion and change, lecturing, research, staff management and business development.

Date: from - to	1988-1990
Location	Blantyre, Malawi
Company	ADMARC (Parastatal marketing organisation of the Government of Malawi), through Agrisystems, UK
Position	Transport Controller,
Description	Post was funded through FAO/UNDP World Bank. Responsible to the Managing Director for the movement of 600,000 tonnes of agricultural produce (mostly grains) each year from 1,200 smallholder buying units to safe storage throughout Malawi and the export of raw cotton fibre to overseas markets. Organisation of and chairing meetings between various aid agencies and the government to better co-ordinate the transport needs of the country and the growing refugee population from Mozambique. This also involved the control of transport companies and rate negotiations.

Date: from - to	1985-1988
Location	England
Company	Trafpak Services Limited, (part of Sea Containers Group)
Position	Managing Director
Description	This NVOCC (freight forwarding) company was acquired by the Sea Containers Group in a loss making position. The task was to turn it round and expand the range of services. This was achieved within the agreed timescale and resulted in a world-wide business with agency agreements concluded with individual companies based in 43 countries. The operation of over 1,000 specialised 20 tonne capacity ISO tank containers provided a service in a wide range of potable and hazardous liquids in bulk.

**CURRICULUM VITAE:****Leslie Peter CHEESMAN**

Date: from - to	1982-1985
Location	England
Company	Freightliner Limited (part of British Rail)
Position	General Manager
Description	This inter-modal freight operational company had 11 workshops, 600 x 38 tonne artic units, 1,300 trailers and a staff of 900 drivers. The operating tasks involved the collection and delivery of containers to/from rail transfer points to/from customer premises. This involved Union negotiations, customer meetings and the design and implementation of a driver productivity bonus scheme that improved utilisation by over 30%. Subsequent research also demonstrated the cost-effective benefit of direct overnight trunking operations for certain of the routes, which was implemented. There were also significant changes made in the manner of acquisition and control, of parts of this, the largest heavy artic road fleet in the UK, for a large part of this time.

Date: from - to	1976-1982
Location	England
Company	Wincanton Transport Limited (a part of Unigate)
Position	General Manager/Director
Description	General Manager (Bulk Haulage) and subsequently Director of the company, responsible for the business expansion of this modest transport operation into a major haulier for Unigate and third party users. During this time he represented the company at the Road Haulage Association (RHA) in London and organised many sales and marketing functions. He was also involved in European freight company acquisition and in trade and traffic between the UK and Europe.

Date: from - to	1973-1976
Location	England
Company	National Freight Corporation (NFC)
Position	Sales Manager
Description	Sales Manager and subsequently Marketing Manager for the Group, close contact with customers and the operations sections of the companies in order to formulate strategies for business expansion. This involved site meetings, Union negotiations, costings and feasibility studies. The industries included oil companies, quarries, chemical companies and the food industry

Date: from - to	1961-1973
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Location	England
Company	Imperial Chemicals Industries (ICI) - Plastics Division
Position	Sales Manager, Research and Development Department
Description	Basic sales and marketing training in Head Office and subsequently long periods abroad in America, Canada and East Africa, undertaking the role of technical sales, market development, product research and successor training. Being on the receiving end of international freight transport encouraged the subsequent focus on freight forwarding and transport in general

15. Publications

He has presented papers at International Conferences and seminars on FSU Freight Transport and ADR Legislation in Turkmenistan, Vienna and Almaty.

He has contributed many chapters to books on freight transport and written articles on car and truck fleet management, mostly as a result of publisher encouragement from Croner Publications, MCB and Tolley Publishing.

These include:

- Co-author 1981: Energy Saving in Distribution (Book) Gower
- Author 1988: Africa Rural Transport (Article) MCB
- Author 1990: World Agent Networks (Article) MCB
- Co-author 1993: Fleet Management and Company Cars (Book) Croner
- Author 1994: Cost Control in Fleet Management (Article) Tolley
- Author 1995: How to Purchase Fleet M Services (Article) Croner
- Author 1995: Survey of Company Car Schemes 1995/1996 (Book) Tolley

Les Cheesman

FCT,FLT,FM

Fairbank House
Shepton Montague
Wincanton
Somerset, BA9 8JH

Tel: Fax: Ans. 01749 813224
E-mail: LesCheesm@aol.com

European Commission
Takis Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

SCR-E/110622/C/SVWW

HSM38/LC

7th February 2001

Central Asian Border Crossings, SCR-E/110622/C/SVWW

Statement of Exclusivity and Availability

I, the undersigned, Les Cheesman, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed



Date

7 Feb 2001

Proposed position in the programme: **GEOMORPHOLOGICAL SPECIALIST**

- 1. **Family name:** HEARN
- 2. **First names:** Gareth J
- 3. **Date of Birth:** 16 October 1958
- 4. **Nationality:** British
- 5. **Civil status:** Married

6. **Education:**

Institution	Kingston Polytechnic
Date:	1978 – 1981
Degree obtained	BSc

Institution	London School of Economics and Political Science
Date:	1987
Degree obtained	PhD Geomorphology

7. **Language skills:**

Language	Reading	Speaking	Writing
English	5	5	5
French	3	3	3
Italian	3	3	2
Nepali	3	3	3

- 8. **Membership of professional bodies:** Chartered Geologist and Environmental Geomorphologist
Fellow of the Geological Society
Fellow of the Institution of Mining and Metallurgy
- 9. **Other Skills:** Computer Literate
- 10. **Present position:** Senior Environmental Geomorphologist
- 11. **Years with firm:** 11

12. **Key qualifications:**

Gareth Hearn is an Environmental Manager with Scott Wilson and a specialist environmental geomorphologist. He has considerable experience from his geological and geomorphological training of the environmental aspects of highway construction projects both in developing countries and in UK. This experience includes:

Tajikistan - Environmental specialist on the Murgab - Kulma Pass Feasibility Study for the Islamic Development Bank. Carried out environmental assessment of this proposed high altitude road on the Tajikistan-China border.

Philippines - Buguio-Bontoc-Banawe Road Rehabilitation. Economic evaluation engineering assessment and detailed engineering for 200km rehabilitation in mountainous terrain. Responsible for geotechnical and environmental aspects (1997/98)

Mongolia - Environmental specialist for roads subproject of World Bank Transport Rehabilitation project. Responsible for management of technical team. Also responsible for similar team for ADB Road Development project. Included environmental workshops for local maintenance engineers and preparation of Environmental Guidelines for road works (1995/97)

Malawi - project manager for environmental overview of design for road rehabilitation project, involving the incorporation of mitigation measures into the design (1995)

Malaysia - Lecturer on Environmental and Geotechnical Engineering Modules for Road Maintenance Management and Practice Course (1996)

United Kingdom - environmental manager for variety of major projects including: Manchester Airport; Channel Tunnel Rail Link (on-going)

13. **Specific Central and Eastern European and NIS Experience:**

Country	Date:
Nepal	1982 - 1985 (2 years)
	1989 (3 months)
	1992 - 1994 (15 months)
Mongolia	1994 - 1996 (4 months)
Tajikistan	1998

14. **Recent Professional Experience Record:**

Date:	1998 - 1999
Location	Hong Kong
Company	Scott Wilson
Position	Project Manager and Principal Geomorphological Investigator
Description	Engaged on review of large landslides to update and expand existing landslide inventory, concentrating on the recognition and classification of large landslides for aerial photographs.

**CURRICULUM VITAE:****Gareth J Hearn**

Date:	<i>1998</i>
Location	Tajikistan
Company	Scott Wilson
Position	Environmental Specialist
Description	Environmental assessment of the proposed high-altitude road on the Tajikistan-China border funded by the Islamic Development Bank.

Date:	<i>Jan 1997 – July 1998</i>
Location	Philippines
Company	Scott Wilson
Position	Engineering Geologist/Environmental
Description	Economic evaluation, engineering and environmental assessment, detailed engineering and contract documentation for 200km road rehabilitation in mountainous terrain. Responsible for hazard assessment, geotechnical investigations and environmental impact assessment.

Date:	<i>1995 – 1997</i>
Location	UK
Company	Scott Wilson
Position	Project Manager/Environmental Specialist
Description	<p>Mongolia - UK Project Manager and Environmental Specialist for the Roads subproject of the World Bank Transport Rehabilitation Project. Responsible for the programming and technical co-ordination of 7 specialists, Project Management, Liaison with the Department of Roads and Report Production (including Mongolian translation).</p> <p>Responsible for environmental assessment workshops for DoR maintenance engineers and preparation (in Mongolian) of Environmental Guidelines for Road Works.</p> <p>Also similar specialist responsibilities for Asian Development Bank Road Rehabilitation Project.</p>

Date:	<i>1996</i>
Location	Malaysia
Company	Scott Wilson
Position	Environmental/Geomorphologist
Description	Sole lecturer for the 'Environmental Issues' Module and support lecturer for the 'Geotechnical Engineering' Module at the Road Maintenance Management and Practice Course at the Institute Kerja Raya Malaysia (IKRAM). The Environmental Module included a review of government legislation and procedural guidelines for EIA, a discussion of impact assessment and mitigation and illustration for road maintenance practice in Malaysia.

Date:	1995
Location	Malawi
Company	Scott Wilson
Position	Senior Environmentalist
Description	Environmental Impact Assessment for 100km road in northern Malawi, covering the review of an earlier EIA and determination of how the findings and recommendations should be incorporated into the design, and consideration of detailed alignment, cross-section and erosion control from both geotechnical and environmental standpoints.

Date:	1994
Location	Mongolia
Company	Scott Wilson
Position	Environmentalist
Description	Responsible for a comprehensive Initial Environmental Examination for 200km of proposed paved road in Mongolia. The study relied on fieldwork for the majority of its database and examined a range of environmental and related engineering issues including plant ecology, herd management, land-use, drainage, construction materials sources and extraction, erosion control, cultural and heritage and socio-economics.

Date:	1988 – 1994 (visits totalling 18months)
Location	Nepal
Company	Scott Wilson
Position	Environmental Geomorphologist
Description	<p>1993</p> <p>Flood damage assessment and preliminary cost estimate for remedial works following unprecedented flooding along the 84km long Naubise-Mugling Road in July 1993. This study included the following:</p> <ul style="list-style-type: none"> - inventory of flood, scour and landslide damages - compilation of contractors' rates from previous projects - preliminary design of road reinstatement, scour protection and stabilisation works at affected sites - production of bills of quantities for preliminary cost estimate. <p>1993</p> <p>Design and supervision of geotechnical ground investigation at three large landslide sites along the Naubise-Mugling Road. Slope stability analysis and preliminary review of stabilisation options were also undertaken.</p>

	<p>1988-94 Rapid engineering and environmental feasibility surveys for hill and river route alignments together with detailed terrain evaluations and engineering geological investigation for the 120km Arun Access Road in east Nepal. Played a key role in the identification, choice and refinement of the designed alignment. Also responsible for the establishment of a comprehensive environmental assessment and impact monitoring programme for the Arun Access Road concentrating on land-use, drainage, soil erosion and landslide activity. These investigations have been in place since 1989 and have yielded an environmental database that can be used to directly assess the impact of road construction on the physical environment.</p> <p>1989-90 Geomorphological walkover surveys and air photograph interpretations for the Arun Access Road and the Charali Taplejung Road in east Nepal, the Baitadi-Darohula Road in west Nepal and the Naubise-Mugling road in Central Nepal.</p> <p>1989 Lecturing and field courses for the Mountain Risk Engineering Course at the International Centre for Integrated Mountain Development, Kathmandu.</p>
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Date:	1988 – 1994
Location	UK
Company	Scott Wilson
Position	Environmental Manager
Description	<p>Geomorphologist and Manager of the Natural Environmental Systems Unit of the Scott Wilson Kirkpatrick Environmental Division.</p> <p>Temporary Resident Engineer for Contract C Phase 1 Ground Investigations: Former Industrial and Waste Disposal Sites, Kent and Essex. Client: Union Railways.</p> <p>Preliminary geomorphological assessment of the effects of channelisation of the River Bollin in Cheshire, as part of the proposed works for a second runway at Manchester Airport.</p> <p>Environmental Team Leader for Section C of the Channel Tunnel Rail Link between Ashford and Maidstone, Kent responsible for the co-ordination of environmental input to the Engineering Design Team. Client: British Railways.</p> <p>Air photograph interpretation and preliminary ground assessment for the Channel Tunnel Rail Link, Section C, and production of the Geotechnical Desk Study Report. Client: British Railways.</p> <p>Lecturer in Environmental Assessment and Geotechnical Engineering at the SWK/Crown Agents Road Maintenance Management and Practice course in UK funded by the British Council.</p>

Date:	1989 – 1991
Location	Papua New Guinea
Company	Scott Wilson
Position	Senior Engineer
Description	Geomorphological mapping, erosion and landslide hazard mapping at the Ok Tedi copper mine, Western Highlands. The study comprised a systematic assessment of geology, geomorphology, slope stability and rates of ground movement and erosion together with a classification of hazard and risk along a service corridor of 60km in length and in the mine lease area of 20km ² .

Date:	1985 – 1988
Location	UK
Company	Rendal Palmer & Tritton
Position	Engineering Geologist/Environmentalist
Description	<p>Projects and responsibilities included:</p> <p>Indonesia: Member of a site team responsible for terrain evaluation, materials and environmental assessments and slope stability studies for dual carriageway alignment and construction feasibility between Cikampek and Padalarang in West Java</p> <p>Turkey: Site team leader and project manager for a landslide hazard assessment in northeast Turkey. Responsibilities included an assessment of landslide risk in a landslide disaster area and engineering geological and geomorphological assessments of other existing and potential landslide sites in the surrounding area. Inventories were made of cut slope stability along highways and broad recommendations made with regard to future route planning and earthworks design, landslide hazard assessment and land-use planning.</p> <p>UK: Site team leader and project manager for a cliff stability study along a 3km length of coastline on the Isle of Wight. The project comprised engineering geological mapping of the cliff face, cliff fall hazard and risk mapping, assessments of existing remedial measures and recommendations for further stabilisation works and cliff management strategies in an area of high tourist amenity.</p> <p>Responsible for engineering geomorphological mapping of a kilometre length of unstable cliff line in North Yorkshire, together with assessments of materials suitability for use in stabilisation earthworks. Also responsible for the establishment of a beach process monitoring programme in conjunction with the local authority.</p> <p>Responsible for the supervision of ground investigations (rotary core,</p>

	<p>shell and auger boring, trial pitting and in situ testing) for landslide investigations and the design of stabilisation works and foundations design for buildings and bridges.</p> <p>Responsible for slope stability and groundwater assessments for landfill (domestic and industrial refuse) management in old Oxford Clay pits in Bedfordshire, UK.</p> <p>Project engineer for rock slope stability mapping and foundations assessments for dockside materials handling facilities in Cornwall. Engineering geological and geomorphological mapping for bypass projects in Southern England</p> <p>Responsible for the co-ordination of an environmental and geomorphological study of the area surrounding the proposed site for the Fawley B Power Station on Southampton Water. The study included interpretation and quantification of coastal processes from air photographs and published wind and wave climate data and liaison with environmental specialists with regard to saltmarsh management, terrestrial ecology, impact studies and public amenity. Environmental Statements were prepared in accordance with the European Economic Community Directive.</p> <p>As part of the pre-application studies for the Hinkley Point power station, Somerset. Undertook a coastal physiography study of the neighbouring coastline. The study comprised interpretation of air photographs and published data, the establishment of an airborne monitoring exercise, surveys of beach and cliff materials and assessments of cliff erosion processes and rates, patterns and volumes of longshore drift.</p>
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Date:	1982 – 1985
Location	Nepal
Company	London School of Economics and Political Science
Position	Post-Graduate Research Student
Description	<p>The research included a critical review of engineering geological and geomorphological techniques of terrain evaluation, materials assessment, landslide/erosion hazard assessment and flood prediction for highway design purposes in the Low Himalaya. Environmental impact studies were also carried out with regard to slope disturbance by cut and fill on side long ground, earthworks spoil disposal on long, steep slopes and drainage disturbance (storm flow rates, erosion and sediment transport) caused by accelerated slope and road runoff.</p> <p>Temporary consultant to Geomorphological Services Limited, UK responsible for geomorphological mapping of unstable slopes in the West Midlands, UK and Regional Advisor (SE England) for the Department of the Environment review of landslides in Great Britain. Temporary (part-time) Lecturer/Demonstrator (computing, statistics and surveying) at Goldsmiths College, University of London</p>

Date:	1982
Location	Nottingham, UK
Company	Trent Polytechnic
Position	Research Assistant
Description	Member of a team developing computer-based models for predicting storm runoff from urban catchments.

15. **Others:**

Publications:

"An appraisal of slope and drainage instability along the Dharan-Dhankuta road in east Nepal caused by the September 1984 storm and proposals for road remedial and associated stabilisation works." Report to the Transport and Road Research Laboratory, Crowthorne, Berks 1985.

"Geomorphology and mountain highway design: some lessons from the Dharan-Dhankuta highway, east Nepal". International Geomorphology, 1, 1986.

"Landslide hazard assessment techniques for planning purposes: a review". Proceedings of the 22nd Annual Conference of the Engineering Group of Geological Society, Planning and Engineering Geology, Plymouth, 1986.

"Effects of road construction on geomorphological processes in active mountain terrain and implications for design". Geomorphology and Public Policies. Annual Conference of the Institute of British Geographers, Portsmouth, 1987.

"An evaluation of geomorphological contributions to mountain highway design with particular reference to the Lower Himalaya." PhD Thesis University of London, 1987.

"Landslide hazard mapping at Ok Tedi Mine, Papua New Guinea". International Symposium on Landslides, Christchurch, New Zealand, February 1992.

"Engineering geomorphology: A UK perspective". Bulletin of the International Association of Engineering Geology, 1991.

"The Catak landslide disaster, Trabazon Province, Turkey". Terrae Motae, 1, 84-90, 1989.

"Engineering geology and slope stability of tropical residual soils in West Java, Indonesia". 6th International Congress of the IAEG, Amsterdam, 1990.

"Rapid geomorphological reconnaissance survey for road alignment in west Nepal". Bulletin of the International Association of Engineering Geology, 48, 59-68.

"Engineering geomorphology and mining operations in unstable mountains". Risk Assessment in the Extractive Industries. The Institution of Mining and Metallurgy, Exeter University, March 1994. Transactions of the Institution of Mining and Metallurgy 1995.

Comparison between aerial and ground-based assessments of road earthworks failures in Nepal. 8th REAAA Conference, Taipei, 1995.



CURRICULUM VITAE:

Gareth J Hearn

Landslide and erosion hazard mapping at Ok Tedi Copper Mine, Papua New Guinea. Quarterly Journal of Engineering Geology, 1995.

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Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/MO

Date 6th February 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned Gareth J Hearn, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed

A handwritten signature in black ink, appearing to read 'Gareth J Hearn', written over a large, faint watermark of the signature.

Date 6th February 2001

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Certificate No. FS 825



Proposed position in the programme

PROCUREMENT ADMINISTRATOR

1. **Family Name:** HARVEY
2. **First Names:** Ann
3. **Date of Birth:** 8 January 1952
4. **Nationality:** British
5. **Civil Status:** Married
6. **Education:**

Institution	Basingstoke College of Technology
Date:	9/97 – 6/99
Qualification obtained:	BTEC National Certificate in Business and Finance

Institution	Basingstoke College of Technology
Date:	9/99 – Present
Qualification obtained:	Currently studying for the Higher National Certificate in Business Studies

7. **Language Skills:**

Language	Reading	Speaking	Writing
English	5	5	5

8. **Membership of Professional Bodies:**

9. **Other Skills:** Computer Literacy
Microsoft Word, Excel, PowerPoint
10. **Present Position:** Project Administrator
11. **Years with Firm:** 1 year

12. Key Qualifications:

Experienced **Procurement Administrator** working on behalf of funding agencies for procurement projects in all parts of the world.

Key Roles:

- Co-ordination of purchase, despatch and delivery of goods in accordance to guidelines

Responsible for:

- Reporting to Funding Agencies
- Maintaining regular contact with clients
- Sourcing of suppliers
- Evaluation of quotations
- Ensuring best possible prices are obtained
- Ensuring smooth implementation of procurement process
- Maintaining accurate records for audit
- Ensuring prompt payment of suppliers

Experienced **Project Administrator** working closely with Project Managers in all aspects of project work covering projects in East and Central Europe and the Former Soviet Union.

Key Roles:

- Assisting multi-disciplinary teams of professionals
- Assisting with international projects

Responsible for:

- Assisting Project Manager with teams of professionals, both internal and independent experts and associated companies.
- Managing the needs of professionals when travelling.
- Logistics for multi-country projects
- Logistics for UK and overseas training courses
- Maintaining contact with professionals in the field
- Financial management such as billing
- Collation and Despatch of reports to meet deadlines
- Maintaining accurate records

13. Specific Central and Eastern European and NIS Experience:

Country	Date
Mongolia	August 2000
Moldova	February 2001

14. Recent Professional Experience Record

Date:	<i>November 1999 – to date</i>
Location	Basingstoke
Company	Scott Wilson Kirkpatrick & Co Ltd.
Position	Procurement Administrator
Description	<p>Based within the International Development Department responsible for administering the procurement process for international projects. Working closely with Scott Wilson's Head of Procurement in the preparation of procurement procedures, tender documents, contract terms, conditions and insurance. Experienced with international procedures for DfID and EC Tacis. Also experienced in all aspects of administration including</p> <ul style="list-style-type: none"> • Logistics Management • Quality Management • Staff Training • Report Production • Training Administration • Financial Management <p>2000-Ongoing: Procurement Administrator for DfID funded Disaster Replenishment Project responsible for sourcing supplies for Hospitals and Clinics on the Island of Montserrat following volcanic eruption. Sourcing supplies for the replenishment of emergency disaster supplies. Ensuring implementation of DfID Procurement Procedures.</p> <p>2000-ongoing: Procurement Administrator for DfID funded Replenishment Project responsible for sourcing supplies for the Island of St Helena. Supplies are to replace existing harbour equipment in Jamestown. Ensuring the implementation of DfID Procurement Procedures.</p> <p>1999-ongoing: Procurement Administrator for EC Tacis TRACECA International Road Transport Transit Facilitation Project assisting the UK Project Manager with the procurement of Customs equipment for 11 countries within Tacis procurement procedures. Visit made for procurement supervision.</p> <p>1999-ongoing: Procurement Administrator for the DfID funded Waste Water Operations and Maintenance Support to GOSD in Cairo responsible for the procurement of supplies, maintaining close contact with client, funding agency and suppliers to ensure smooth running of procurement process in accordance with DfID guidelines. Technical inspection visit was carried out to supplier of CCTV Vehicle with sonar equipment.</p>

Based within the International Development Department responsible for assisting Project Managers with all aspects of project work for international projects.

2000-Ongoing: UK Project Administrator for EIB funded **Supervision of Construction of A2 Motorway Poznan Bypass, Poland.** Responsible for administration, logistics and billing ensuring guidelines are implemented. Co-ordinating Consultant travel and maintaining regular contact with the team in the field.

2000-Ongoing: UK Project Administrator for DfID funded **Ghana Rural Feeder Roads Project** responsible for billing within DfID guidelines keeping accurate billing records and producing monthly invoice. Maintaining close contact with Project Manager and team in the field.

1999-Ongoing: UK Project Administrator for Tacis **TRACECA International Road Transport Transit Facilitation Project** responsible for assisting the Project Manager in all aspects of project administration including, logistics management, financial management, quality procedures, report distribution, following Tacis guidelines and keeping close contact with project team and local experts in all countries. Also responsible for assisting with the organisation of training courses in the UK and in Eastern Europe and the Former Soviet Union. Visits made to the UK Training course held at Wadhurst for 22 delegates from overseas and to the training course held in Mongolia for 12 delegates ensuring smooth running of the course and to ensure needs of delegates and trainers were met.

2000-Ongoing: Quality Manager for Institutional Development and Overseas Road Business Unit working closely with Quality Director, responsible for ensuring that projects are administered within procedures set down by British Standards Institute in accordance with ISO 2000 Standard. Carrying out audit programme and overseeing implementation of new procedures for the new ISO standard.



Date:	<i>June 1999 – October 1999</i>
Location	Basingstoke
Company	North & Mid Hampshire Health Authority
Position	Commissioning Assistant
Description	Commissioning of Specialist Treatment in the Private Sector and in specialist hospitals out of the area. Responsible for a commissioning contract with a specialist Children's Hospital in London providing packages of care. Secretary to Commissioning Team Meeting. Monitoring hospital waiting times.

Date:	<i>December 1997 – May 1999</i>
Location	Basingstoke
Company	North & Mid Hampshire Health Authority
Position	ECR Team Leader
Description	Responsible for the monitoring of Extra Contractual Referrals keeping within agreed budgets and guidelines. Delegated responsibility to authorise costs up to £20,000 ensuring where possible that treatment took place within contract. Direct contact with Senior Hospital Consultants, General Practitioners and Patients. Responsible for co-ordinating the Appeals process on behalf of GPs within guidelines. Responsible for maintaining database records within the 'Safe Haven' environment. Ensuring the prompt processing of invoices within financial guidelines. Responsible for managing the workload of two assistants.

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Your Reference SCR-E/110622/C/SV/WW

Our Reference HSMSB/AH

Date 30th January 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Ann Harvey, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed *A. Harvey*

Date 6-2-01



Proposed position in the programme

INFORMATION SYSTEMS SUPPORT

1. **Family name:** VINCENT
2. **First names:** Stephen Paul Robert
3. **Date of Birth:** 1955
4. **Nationality:** British
5. **Civil status:** Married
6. **Education:**

Institution	Imperial College, London
Date:	1982 - 1983
Degree obtained	MSc – Concrete Structures

Institution	Churchill College, Cambridge
Date:	1974 – 1977
Degree obtained	BA Engineering (MA 1981)

7. **Language skills:**

Language	Reading	Speaking	Writing
English	5	5	5

8. **Membership of professional bodies:** Member of the British Computer Society
 Member of the Institution of Civil Engineers
 Member of the Institution of Structural Engineers
9. **Other Skills:** Trainer, Facilitator
10. **Present position:** Associate
11. **Years with firm:** 23

12. Key qualifications:

Stephen Vincent is an Associate of Scott Wilson, specialising in business transformation support, with particular skills in implementing information management systems and managing advanced technology projects.

Over the past twelve years, his experience has included long term assignments working with clients in countries in Asia, three years of strategic development and day to day management of computer systems supporting fifteen offices in the UK, and the management of a diverse group of information systems specialists working in many international locations. He has been closely involved with a wide range of information technology activities at all levels from high level strategic reviews down to the practical details of day to day operations.

Experience of particular relevance includes:

Business transformation and data standards

- Currently a member of the resident team of a project to identify and implement extensive business process improvements at the Department of Public Works and Highways in the Philippines. This project has involved stakeholder consultation, process analysis and the definition of appropriate information technology architectures and standards.
- Past member of British Standards sub-committee B/212/6 Computer Modelling for Construction, dealing with international standards for data exchange.

Stakeholder involvement and community development

- Assistance with the development of stakeholder involvement in the transport sector in Pakistan. This has included facilitating workshops and discussions, and providing technical input during the early stages of the establishment of the Association of Road Users of Pakistan.

Information Systems

- Chairman of the European Council of Civil Engineers Information Technology Task Force, and past Chairman of the Institution of Civil Engineers Computer Applications and Methods Panel.
- Participation in European research activities to review the future impact of information technology in civil engineering.
- Management awareness presentations, and participation in the design and implementation of road management systems for each of the four provinces of Pakistan, including coordination with national transportation activities.
- Development and presentation of international training course modules.

Management

- Management and direction of a specialist team developing information systems and advanced technology project assignments.
- Experience of strategy development and daily operational management of computer networks supporting the activities of fifteen UK offices.

Special interests

- The acceptance and sustainability of new technology solutions.
- Knowledge development, participatory approaches, and the effects of attitude and motivation.
- Contemporary management approaches, including process thinking, leadership and teamwork.
- The effect and application of Internet, Intranet and communication technologies.

13. Experience of Specific Countries with Transition Economies:

Country	Date:
Philippines	1997 – present
Pakistan	1996 – 2000
Qatar	1993 – 1995
Botswana	1990 – 1992
India	1990
Mozambique	1989 – 1991

14. Recent Professional Experience Record

Date:	1994 – date
Location	UK
Company	Scott Wilson Kirkpatrick
Position	Associate- Head of Information Systems
Description	<p>Co-ordinating the planning of information systems specialist assignments</p> <p>Member of the project team for the Philippines Road Information and Management Support System project since 1997. This project has included undertaking a comprehensive analysis of the activities of the Department of Public Works and Highways, through facilitated workshops and participatory activities. Following the design and prioritisation of potential improvements, the project team are now responsible for integrating together a series of business improvement implementation projects, in parallel with the introduction of new computer systems. Tasks have included preparing for the implementation of a new national highway locational referencing system, and reviewing data collection standards and methods.</p> <p>Three year visiting assignment with the Finnroad Road Management Project team in Pakistan. This assignment has involved holding seminars and workshops with senior government officials and practical engineers in each of the four provinces in Pakistan, designing a road management methodology and supporting computer system, and supervising the training and implementation of the system.</p> <p>Experience in Pakistan also included assistance with the establishment of the self-supporting Association of Road Users of Pakistan and input to transport sector consultation processes.</p> <p>Assistance with the establishment of a number of world wide web sites on the Internet, including sites for consultation and exchanges of views in the transport sector.</p> <p>Management of assignments of specialist information systems staff working on projects in Uganda, Vietnam and Mongolia.</p>



	Steering committee, specialist panel and review inputs to professional and research activities at National, European and International levels.
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Date:	1992 – 1994
Location	UK
Company	Scott Wilson
Position	Principal Engineer, Head of Information Systems
Description	<p>Responsible for the development and management of information system consultancy assignments. Co-ordination of a small team of specialists who have carried out a variety of assignments in different parts of the world. Management system assignments in India, Botswana, Mozambique and Qatar have covered most aspects of how public authority departments operate, combining objective system analysis and implementation skills with the firm's extensive experience.</p> <p>The department's earth resources assignments have varied from investigating agricultural subsidy systems for the European Commission, to utilising remote sensing for river basin planning in the Sudan and Ethiopia, to studying water abstraction in the Middle East. Assignments in the UK have concentrated on the selection and use of geographic information systems.</p> <p>Responsible for the daily management of the firm's computer facilities in over a dozen offices in the UK, and for the planning and development of information systems facilities for the future. This has involved understanding and working with PC networks, clusters of DEC VAX minicomputers, communications equipment and all forms of software from standard office packages to specialist analysis software.</p> <p>Contributions to a number of committees and review panels, including assignments for the European Commission and attendance at international research meetings and conferences associated with the use of information technology in the construction industry.</p>

Date:	1989 – 1991
Location	UK
Company	Scott Wilson
Position	Principal Engineer, Information Systems
Description	<p>Technical co-ordinator and financial management of Information Systems projects in Africa and India. Projects included setting up computer systems overseas, and training staff in the application of geographic information systems and remote sensing techniques.</p> <p>Short technical assignments overseas in India, Mozambique and Botswana, analysing information systems requirements for management systems.</p>



	<p>Advice on technical approaches to the use of information systems for consultancy projects.</p> <p>Technical input to European Commission Esprit II Exploratory Action, "Computer Integrated Building".</p> <p>Management of software developments, including a collaborative project with the University of Southampton to develop object oriented parallel processing techniques for geographic information systems.</p>
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Date:	1988 –1989
Location	UK
Company	Scott Wilson
Position	Assistant Principal Engineer
Description	<p>Deputy Project Manager, Channel Tunnel Rail Link Design Team C for the 1989 scheme.</p> <p>Structural design supervision, structural survey investigation, and design planning and methods studies.</p> <p>Supervision of the implementation of a geographic information system based on high performance transputer technology.</p>

Date:	1988
Location	Saudi Arabia
Company	Scott Wilson
Position	Assistant Principal Engineer
Description	Two months on secondment to British Aerospace in Riyadh advising on the programming of computerised management systems.

Date:	1986 – 1988
Location	UK
Company	Scott Wilson
Position	Senior Chartered Engineer
Description	<p>Project planning, alternative design studies, and supervision of the design of several structures forming part of an airbase in the Middle East.</p> <p>Short assignment in Kampala, Uganda, to install a computer and train local staff to use design software.</p> <p>Review of computer software and hardware for use in design.</p>

Date:	1985 – 1986
Location	UK
Company	Scott Wilson
Position	Senior Chartered Engineer
Description	<p>Design of applications software and co-ordination of programmers working on current software developments.</p> <p>Development of a software strategy to combine vector mapping data, raster satellite image data and a relational database to form an integrated geographic information system for use in civil engineering design.</p> <p>Liaison and research links with universities to investigate the potential of artificial intelligence, parallel processing technology and improvements in human interface design.</p>

Date:	1983 – 1984
Location	UK
Company	Scott Wilson
Position	Engineering System Analyst/Programmer
Description	<p>Design and development of engineering applications programs for computer aided drafting and reinforced concrete detailing.</p> <p>Responsible for reviewing software design methods and standards, with particular emphasis on the portability of computer programs between different computer systems.</p>

Date:	[1] 1982 – 1983, [2] 1981 – 1982 & [3] 1980 – 1982
Location	UK
Company	Scott Wilson
Position	[1] MSc in Concrete Structures, Imperial College London, [2] Resident Engineer & [3] Assistant Resident Engineer
Description	Supervision of major refurbishment of existing nine storey steel framed office block, including extensive internal demolition and temporary works to maintain the facade, construction of new reinforced concrete foundation rafts and service cores, and the addition of an extra storey of steelwork.

Date:	1977 – 1980
Location	UK
Company	Scott Wilson
Position	Graduate Under Agreement
Description	<p>Assistant on supervision of site investigation for UK road project</p> <p>Structural design for office buildings in London.</p> <p>Design for a rockfill dam for Nigeria.</p>

15. Others

Publications and Presentations:

"Appropriate Decisions: High level coordination and stakeholder recognition"

"HDM-4: A user perspective"

Presentations at the PIARC XXIst World Congress, Kuala Lumpur, October 1999

"Infoculture – Technology to construct the future",

author Stephen Vincent, book published by Thomas Telford April 1998.

"Civil Engineering in the Information Society",

Stephen Vincent, International Conference on Computers in Civil and Building Engineering, Seoul, Korea, August 1997

"Pavement Management Concepts"

Presentation at one day conference at the Institution of Civil Engineers May 1996.

"The Essence of Sustainable Road Network Referencing"

SPR Vincent and AS Leach, The 22nd PTRC European Transport Forum, September 1994.

"The Development of Road Management Systems in Southern Africa"

S P R Vincent, H R Kerali, A S Leach, K McPherson, Third International Conference on Managing Pavements, San Antonio, Texas, May 1994.

"Computer Integrated Construction: Pipe Dream or Vision ?"

Presentation by S P R Vincent at The Institute of Structural Engineers colloquium on Benefits of Research in Practice, November 1993.

"Is GIS putting the Cart before the Horse ?"

S P R Vincent, UK Association of Geographic Information annual conference, October 1993.

"Integrating Different Views of Integration"

S P R Vincent, UK Science and Engineering Research Council N&N Workshop on the Integration of Construction Information, May 1993.

"Management Development in the Construction Industry: Information Technology"

Informal Discussion at the Institution of Civil Engineers introduced by S P R Vincent, September 1992.

"Computer Integrated Building Strategic Final Report"

S P R Vincent one of ten joint authors, editor A Dupagne, for European Commission Esprit II Exploratory Action 5604, December 1991

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6th February 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, Stephen Vincent, confirm my availability for assignment on the above project exclusively for the Consortium formed by Scott Wilson Kirkpatrick & Co Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick & Co Ltd.

I confirm that in the event of award of the contract to the Consortium led by Scott Wilson Kirkpatrick & Co Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

Signed

Stephen PR Vincent

Date

12th February 2001

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Certificate No. FS 825



Proposed position in the programme

HIGHWAY ENGINEER

- 1. **Family Name:** Tonkih
- 2. **First Names:** Gennady Andreyevich
- 3. **Date of Birth:** 31 January 1941
- 4. **Nationality:** Kyrgyz
- 5. **Civil Status:**
- 6. **Education:**

Institution	Polytechnics Institute, Frunze
Date: from - to	1965
Degree or Diploma obtained	

7. **Language Skills:**

Language	Reading	Speaking	Writing
Russian	5	5	5

- 8. **Membership of Professional Bodies:**
- 9. **Other Skills:**
- 10. **Present Position:** Senior Engineer for Highway Designing
- 11. **Years with Firm:** 28 years
- 12. **Key Qualifications:**

Gennady has extensive experience working in conjunction with International consultants in preparing Feasibility Studies and reports. He has been working as a Highway Engineer for the last 28 years for 'Kyrgyzdortransproject.'

His main responsibilities include:

- Choice of direction
- Main geometrical characteristics
- Designing of pavements, drainage, and specifications
- Environment protection and conditions of a road
- Supervision of construction.



13. Specific Central and Eastern European and NIS Experience:

Country	Date:
Kazakhstan	1993

14. Recent Professional Experience Record

Date: from – to	1972 – 2001
Location	Kyrgyzstan
Company	Kyrgyzdortransproject
Position	Senior Engineer
Description	<p>2000 Urban Transport Project Phase 1 in association with Scott Wilson. Funded by Government of Kyrgyz Republic and World Bank. This involves the surveying of roads in Bishkek, Osh and Jelal-Abad and determining a rehabilitation plan including prioritising the necessary work.</p> <p>2000 Feasibility Study of Osh-Sary-Tash-Irkeshtam and Osh-Isfana Road. European Union, Tacis funded.</p> <p>1999 Osh-Isfana Road, Project of detours of territories of Uzbekistan and Tadjikistan of 90km length. Funded by the Government of Kyrgyz Republic.</p> <p>1998-99 Feasibility Study for Jambyl-Talas-Suusamyr Road. Funded by the Government of Kyrgyz Republic with IDB assistance.</p> <p>1996-7 Feasibility Study and tender documentation for Bishkek – Torugart Road, length 540 km. Funded by the Government of Kyrgyz Republic with IDB assistance.</p> <p>1997 Detailed design of Bishkek – Osh Road rehabilitation project km 81–161, km 248–325, km 361– 412. Funded by the Government of Kyrgyz Republic with ADV assistance.</p> <p>1996 Detailed design of Bishkek – Osh Road rehabilitation project. Included km 161-248, km325-362, km 412-426. 1996. Funded by the Government of Kyrgyz Republic with ADB assistance.</p> <p>1995 Reconstruction of the Bishkek-Osh highway 309-428 km. Government funded. Study of the existing road: it passes in difficult conditions along canyon edge and not safe. The project stipulates the increase of radii in the plan, reduction of gradients, anti-landslide measures, strengthening of designs of pavement</p>

	<p>under modern axial load, reconstruction of structures of drainage.</p>
1994	<p>Reconstruction of a highway Bishkek – Osh km 161-190. Government funded. In 1992 existing 2-lane road was destroyed by 9 points' earthquake (land-slides, earth bank destruction, bridges, water supply systems). Highway designed on 2 lanes in view of modern axial loads by-passing sliding sites.</p>
1994	<p>Reconstruction of the highway Barskaun – Ak-Shiyrak. Mountain pass Sary-Moynok, 32-40 km. The existing road of low technical level, one lane, with high ingredients, small radii, had 16 hairpin curves. Difference of levels is 800m on 8km. The project of complete reconstruction of a road on 2 traffic lanes with reduction of quantity of hairpin curves up to 4.</p>
1993	<p>Feasibility study of a highway Almaty – Uzun-Agach-Balikchi – Torugart of 436 km length. Funded by the Government of Kazakhstan and the Government Kyrgyzstan. The highway passes the territory of Kazakhstan and Kyrgyzstan all the way to Chinese border. A problem of the project was to ensure the shortest way from Kazakhstan and regions of Russia through Kyrgyzstan to China and further to Pakistan and India.</p>
1992	<p>Reconstruction of the highway Almaty – Tashkent – Termez, 177-202 km. Funded by the Government Kazakhstan. The existing 2 lane road has insufficient geometrical parameters (high ingredients). The project stipulates partial change of geometrical parameters of the road, strengthening of pavement under the modern axial load.</p>
1992	<p>Reconstruction of the highway Bishkek – Balikchi – Torugart, 475-491. Government funded. The existing road on two lanes has insufficient width and pavement. The pavement is destroyed. The project is supposed to broaden the lanes, reconstruction of the pavement according to modern axial load, reconstruction of water supply structures.</p>
1998	<p>Feasibility study of a highway by-passing Chui valley villages, 'Kyzyl Asker – Kalininskoe - Chaldovar'. Government funded. Three variants were proposed – the road of 76 km length was chosen, out of them – 4-lanes on 34km, 40km on 2 lanes.</p>

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State Design Institute



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European Commission
TACIS Procurement Unit
Rue Montoyer, 31
B-1000 Brussels
Belgium

SCR-E/11062/C/SV/WW

HSMSB/MO

February 9, 2001

Central Asian Border Crossings, SCR-E/110622/C/SV/WW

Statement of Exclusivity and Availability

I, the undersigned, G.A.Tonkih, confirm my availability for assignment on the above project exclusive for the Consortium formed by Scott Wilson Kirkpatrick and Co. Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick and Co. Ltd.

I confirm that in the event of the award of the contract to the Consortium led by Scott Wilson Kirkpatrick and Co. Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

G.A. Tonkih

Date: 9,02,01



Proposed position in the programme

TOPOGRAPHY SPECIALIST

- 1. **Family Name:** Murataliev
- 2. **First Names:** Jusup
- 3. **Date of Birth:** 1953
- 4. **Nationality:** Kyrgyz
- 5. **Civil Status:**
- 6. **Education**

Institution	Polytechnic College, Bishkek
Date: from - to	1978
Degree(s) or Diploma(s) obtained	

Institution	Kyrgyz State University, Bishkek
Date: from - to	1986
Degree(s) or Diploma(s) obtained	

7. **Language Skills:**

Language	Reading	Speaking	Writing
Kyrgyz	5	5	5
Russian	5	5	5

8. **Membership of Professional Bodies:**

9. **Other Skills:**

10. **Present Position:** Chief of Survey Team

11. **Years with Firm:** 22 Years

12. **Key Qualifications:**

Jusup has 22 years of survey experience in Kyrgyzstan. He has a very good working knowledge of all the topographical surveys that are required in this terms of reference. He is also very familiar with the requirements of international funding agents.

13. **Specific Central and Eastern European and NIS Experience:**

Country	Date:
China	1993
Kazakhstan	

14. Recent Professional Experience Record

Date: from - to	1980 to date
Location	Bishkek, Kyrgyzstan
Company	Institute Kyrgyzdortransproject (KDTP)
Position	Chief of Survey Party
Description	<p>This tasks involves the management of all manner the inputs required to obtain data from all manner of topographical surveys. Relevant recent experience includes:</p> <p>2000 Urban Road Project. Phase 1. Government of Kyrgyz Republic and World Bank.</p> <p>1997-2000 Rehabilitation of Bishkek-Osh Road. Km 161 – 361, km 412 – 426. Construction supervision – Topography Engineer.</p> <p>1996 Reconstruction of sanatorium ‘Ak-Chardak’ in ‘Boz-Teri’ village. Area – 10 ha. Funded by the Government of Kyrgyz Republic.</p> <p>1994-6 Reconstruction of Bishkek-Osh road, km 80 – 88, km 161 – 199, km 428 – 458. Funded by the Government of Kyrgyz Republic (tasks 1,2).</p> <p>1993 Surveying of area for Custom post on Irkeshtam-Kashgar Road Area – 50 ha. Funded by the Government of Kyrgyz Republic. (tasks 1,2).</p> <p>1993 The highway Irkeshtam-Konoo-Uluchat in China 20 km long. Funded by the Government of China. The design of 2-line road was developed according to Chinese standards. The road lays in difficult area at the height of 2,500 – 2,900 m. (tasks 1,2).</p>

Date: from - to	1978 – 1980
Location	Bishkek, Kyrgyzstan
Company	Kyryzdortransproject (KDTP)
Position	Chief of Survey Group
Description	Topography surveys at different scales

15. Others

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I, the undersigned, J. Murataliev, confirm my availability for assignment on the above project exclusive for the Consortium formed by Scott Wilson Kirkpatrick and Co. Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick and Co. Ltd.

I confirm that in the event of the award of the contract to the Consortium led by Scott Wilson Kirkpatrick and Co. Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

J. Murataliev

Date: 9.02.01



Proposed position in the programme

BRIDGE ENGINEER

- 1. **Family Name:** Kuznetsov
- 2. **First Names:** Gennady Fayitovich
- 3. **Date of Birth:** 16/11/1940
- 4. **Nationality:** Kyrgyz
- 5. **Civil Status:**
- 6. **Education:**

Institution	Polytechnics Institute
Date: from - to	1965
Degree(s) or Diploma(s) obtained	

7. **Language Skills:**

Language	Reading	Speaking	Writing
Russian	5	5	5

8. **Membership of Professional Bodies:**

9. **Other Skills:**

- 10. **Present Position:** Manager of Bridges
- 11. **Years with Firm:** 31

12. **Key Qualifications:**

Gennady has 31 years experience working in the design and construction of bridges. He has recently worked extensively alongside international consultants and is familiar with International Funding Agents requirements such as Takis, and the World Bank.

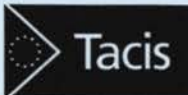
Relevant experience to this role includes:

- Study of bridges and overpasses
- Preparation of Bridge Reports
- Preparation of detailed projects and executive drawings on bridges
- Compiling of technical specifications

13. **Specific Countries Experience:**

14. Recent Professional Experience Record

Date: from - to	1993 - date
Location	
Company	Kyrgyzdortransproject
Position	Manager of bridges
Description	<p>Work with the customers, choice of the geometrical characteristics of bridges, main structures</p> <p>Recent experience includes:</p> <p>2000 Urban Transport Project Phase 1 in association with Scott Wilson. Funded by Government of Kyrgyz Republic and World Bank. This involves the surveying of roads in Bishkek, Osh and Jelal-Abad and determining a rehabilitation plan including prioritising the necessary work.</p> <p>2000 Feasibility Study of Osh-Sary-Tash-Irkeshtam and Osh-Isfana Road. European Union, Taxis funded.</p> <p>1999 Osh – Sary – Tash – Irkeshtam and Osh – Isfana Road. Entailed examining bridge crossings. Funded by the Government of Uzbekistan</p> <p>1999 Barskaun – Kumtor Road. Examined bridge crossings at Barskaun/Sary-Moinok, Arabel-Suu Rivers.</p> <p>1998 Feasibility study for Jambyl-Talas-Suusamyr Road. Funded by the Government of Kyrgyz Republic with assistance of IDB.</p> <p>1997 Detailed design of Bishkek – Osh Road rehabilitation project km81 – 161, km 248 – 325, km 361 – 412 1997. Government of Kyrgyz Republic with ADB assistance. Bridge reconstruction detailed design development (tasks 1-4).</p> <p>1996 Detailed design of Bishkek – Osh Road rehabilitation project, km 161 – 248, km 412 – 426. Funded by the Government of Kyrgyz Republic with ADB assistance. Bridge reconstruction detailed design development (tasks 1-4).</p> <p>1993 Bridge via the Kyzyl-Suu river on the Irkeshtam-Kashgar highway. Steel concrete bridge of 108 meters long: of 18m apertures and 1.5km approaches. Funded by the Government of China. Outputs included detailed project reports, hydraulics, executive drawings, and specifications (task 3, 4).</p>



CURRICULUM VITAE:

Gennady F KUZNETSOV

	1989	Bridge via the Kara-Darya river at 583 km of Bishkek-Osh highway. Steel concrete bridge of 140m long, with two lanes and 33m apertures. Government Study of the existing project, hydraulics, executive drawings, specifications (task 1,2,3,4).
--	------	--

Date: from - to	1970 – 1993
Location	
Company	Institute 'Kyrgyzdortransproject'
Position	Senior Engineer
Description	Choice of the geometrical characteristics of bridges, main structures, hydraulics, specifications.

15. Others

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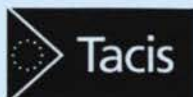
Statement of Exclusivity and Availability

I, the undersigned, G.F.Kuznetsov, confirm my availability for assignment on the above project exclusive for the Consortium formed by Scott Wilson Kirkpatrick and Co. Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick and Co. Ltd.

I confirm that in the event of the award of the contract to the Consortium led by Scott Wilson Kirkpatrick and Co. Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.

G.F.Kuznetsov

Date: 9.02.2001



Proposed position in the programme

PAVEMENT ENGINEER

- 1. **Family Name:** Kokinos
- 2. **First Names:** Vasily Vasilyevich
- 3. **Date of Birth:** 12/05/1948
- 4. **Nationality:** Kyrgyz
- 5. **Civil Status:**
- 6. **Education**

Institution	Technical Road Automobile College, Frunze
Date: from - to	1967
Degree(s) or Diploma(s) obtained.	

7. **Language Skills:**

Language	Reading	Speaking	Writing
Russian	5	5	5

8. **Membership of Professional Bodies:**

9. **Other Skills:**

10. **Present Position:** Chief Road Projects Engineer

11. **Years with Firm:** 28

12. **Key Qualifications:**

Vasily has extensive experience of project related pavement evaluation work. His experience has involved:

- Geometrical research of road
- Survey of pavement condition
- Preparation of detailed designs and executive drawings for the chosen road sections
- Research of drainage, water diversion and culverts
- Preparation of detailed projects on pipes, drainage and water-system

13. **Specific Countries Experience:**

Country	Date:
Kazakhstan	1992

14. Recent Professional Experience Record

Date: from - to	1993
Location	Bishkek, Kyrgyzstan
Company	Kyrgyzdortransproject
Position	Chief Road Projects Engineer
Description	<p>Head of the project based road-engineering team. Directing the inputs of his team and co-ordinating their activities. Projects he has been involved in include:</p> <p>2000 Urban Road Project. Phase 1. Government of Kyrgyz Republic and World Bank.</p> <p>1999 Surveys and design of Osh-Sary-Tash-Irkeshtam Road, funded by the Government of Uzbekistan</p> <p>1998 -99 Feasibility study for Jambyl-Talas-Suusamyр Road funded by the Government of Kyrgyz Republic with assistance of IDB.</p> <p>1996 - 7 Feasibility study and tender documentation for Bishkek - Torugart Road, length 540 km. Funded by the Government of Kyrgyz Republic with IDB assistance.</p> <p>1997 Detailed design of Bishkek - Osh Road rehabilitation project km 81 - 161, km 248 - 325, km 361 - 412. Funded by the Government of Kyrgyz Republic with ADB assistance.</p> <p>1996 Detailed design of Bishkek - Osh Road rehabilitation project, km161 - 248, km 412 - 426. Funded by the Government of Kyrgyz Republic with ADB assistance.</p> <p>1994 Reconstruction of Bishkek - Osh Road. Funded by Government of Kyrgyz Republic.</p> <p>1992 Reconstruction of Almaty - Tashkent - Termez Road, km 177 - km 202. Funded by the Kazak Government.</p> <p>1991-2 Reconstruction of Bishkek - Balykchi - Torugart Road, km 450 - km 469. Funded by the Kyrgyz Government.</p> <p>1994 Reconstruction of Barskaun - Ak-Shiirak Road. Sary-Moinok pass, km 32 - km 40. Kumtor Operating Company (Canada).</p>

**CURRICULUM VITAE:****Vasily V KOKINOS**

Date: from - to	1972 – 1978
Location	Bishkek, Kyrgyzstan
Company	Kyrgyzdortransproject
Position	Engineer/Team Leader
Description	Started as an engineer and became team leader of road design group.

Date: from - to	1972
Location	Bishkek, Kyrgyzstan
Company	Republic Road Scientific Research Department
Position	Engineer
Description	Engineer of project examination department.

15. Others

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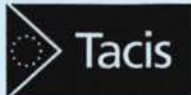
I, the undersigned, V.V. Kokinos, confirm my availability for assignment on the above project exclusive for the Consortium formed by Scott Wilson Kirkpatrick and Co. Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick and Co. Ltd.

I confirm that in the event of the award of the contract to the Consortium led by Scott Wilson Kirkpatrick and Co. Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.



V.V. Kokinos

Date: 9.02.2001



Proposed position in the programme

SOILS AND MATERIALS ENGINEER

- 1. **Family Name:** Golubev
- 2. **First Names:** Vasily Nikolayevich
- 3. **Date of Birth:** 30/09/1951
- 4. **Nationality:** Kyrgyz
- 5. **Civil Status:**
- 6. **Education**

Institution	Polytechnic's Institute, Frunze
Date: from - to	1974
Degree(s) or Diploma(s) obtained	

7. **Language Skills:**

Language	Reading	Speaking	Writing
Russian	5	5	5

8. **Membership of Professional Bodies:**

9. **Other Skills:**

10. **Present Position:** Soils and Materials Engineer

11. **Years with Firm:** 11

12. **Key Qualifications:**

Vasily is a very experienced soils and materials engineer with 26 years of working in geological studies and geo-physics. He has extensive experience of putting together feasibility studies for International Funding Agencies such as the IDB and ADB.

13. **Specific Central and Eastern European and NIS Experience:**

14. Recent Professional Experience Record

Date: from – to	1990 to date
Location	Bishkek, Kyrgyzstan
Company	Kyrgyzdortransproject
Position	Geological and geophysical engineer
Description	<p>Engineering and geological studies of soils, geophysics, study of materials.</p> <p>Recent experience includes:</p> <p>1999-2000 Soil and Material Engineer for the Rehabilitation of Jalal-Abad – Uzgen Road. Construction supervision with Dar Al-Handasah Association.</p> <p>1998-9 Feasibility Study for Jambyl-Talas-Suusamyr Road. Funded by the Government of Kyrgyz Republic with IDB assistance.</p> <p>1996-7 Feasibility Study and tender documentation for Bishkek – Torugart Road, length 540 km. Government of Kyrgyz Republic with IDB assistance. Conducted engineering and geological study of the road, prospected existing sand borrow pits, determined deposit resources.</p> <p>1997 Detailed design of Bishkek – Osh Road rehabilitation project km 248 – 325, km 361 – 412. Funded by the Government of Kyrgyz Republic with ADB assistance. Conducted engineering and geological study of the road.</p> <p>1993 Feasibility study of reconstruction of Balykchy-Bokombaevo-Karakol road, 220 km long. Funded by the Government of Kyrgyz Republic. Conducted engineering and geological study of the route. Investigated two existing sand borrow pits; prospected five gravel deposits: determined aggregate composition; determined strength characteristics of materials; determined deposits resources and methods of extraction. Investigated strength characteristic of road pavement constructions, geotechnical and slope stability on an alignment of road.</p> <p>1993 Feasibility study of access roads to Kumtor gold deposit with total length of 94 km. Funded by the Kumtor Operating Company (Private Canadian Company). Carried out engineering and geological study of the route; studied one existing gravel carrier; prospected 6 sand deposits, determined aggregate composition; determined stability characteristics of materials; reserves of deposits and methods of extraction.</p>

15. Others

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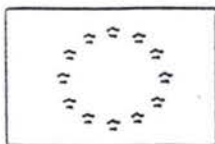
Statement of Exclusivity and Availability

I, the undersigned, V.N. Golubev, confirm my availability for assignment on the above project exclusive for the Consortium formed by Scott Wilson Kirkpatrick and Co. Ltd and Compass GmbH and led by Scott Wilson Kirkpatrick and Co. Ltd.

I confirm that in the event of the award of the contract to the Consortium led by Scott Wilson Kirkpatrick and Co. Ltd I will be able and willing to provide services during the period of implementation of the project as indicated in the terms of reference.


V.N. Golubev

Date: 9.02.01



EUROPEAN COMMISSION

Joint Relex Service for the Management of Community Aid
to Non - Member Countries (SCR)

Directorate E - Invitations to Tender, Contracts and Legal Matters

ANNEX E

General Conditions for Service Contracts financed from Phare/Tacis Funds

Version 1/1997
modified 1/1999 (ECU = EUR)

This text is also available in French and German.
E-mail Tacis.pu@tacis-pu.com



Appendix

A

Road Condition Survey Report



ROAD CONDITION SURVEY REPORT

Road No. _____ From _____ To _____ Km No. _____ Date _____

Chainage	LH drains			Carriageway					Cross Drainage			RH drains			Road Reserve		Other			Comments	Chainage							
	Side	Size	Lined	Grade +/-	Curve %	Width	Colour	Material	Other	River Name	Culvert Type	Bridge/Box	Outfall	Side	Size	Lined	Mitre	Cut off	Crops			Veg Type	Crossfall	Junction	Sign	BP / Quarry	Village	Misc
+ 900																											+ 900	
+ 800																												+ 800
+ 700																												+ 700
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+ 500																												+ 500
+ 400																												+ 400
+ 300																												+ 300
+ 200																												+ 200
+ 100																												+ 100
+ 000																												+ 000



Appendix

B

Clarification notices





3225481459
EUROPEAN COMMISSION
EuropeAid Cooperation Office

Europe, Caucasus, Central Asia
Financial and contract management

FAX MESSAGE

TO: **Scott Wilson Kirkpatrick & Co Ltd**
Attn.: Mr Adrian Tite
FAX NO: (+44-1256) 816 835
FROM: Eddy Wellens, Tacis Procurement Unit
CC: Mr John Bradley, AIDCO A4, Task Manager
RE: Project : SCR-E/110622/C/SV/WW
Central Asian Border Crossings

No. of pages including this sheet: 1

Clarifications to all Tenderers (1)

Dear Sirs,

Please find attached clarifications following questions from one tenderer.

Yours faithfully,

Eddy Wellens
Tacis Procurement Unit

Job	
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Enclosures	
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3225481459



EUROPEAN COMMISSION
EuropeAid Cooperation Office

Europe, Caucasus, Central Asia
Financial and contract management

Brussels,

Subject: Project SCR-E/110622/C/SVWW
Central Asian Border Crossings

CLARIFICATIONS TO ALL TENDERERS (1)

In response to a query from one of the short-listed companies, please be advised of the following answers:

Question 1: Could the pre-feasibility study of the road network in Uzbekistan carried out under EBRD financing be made available to the bidders ?

Answer: It is not possible to make available to bidders the pre-feasibility study of the road network in Uzbekistan carried out under EBRD financing. The final report will not be available until February but the sections of road concerned are expected to have been agreed between EBRD and the Uzbekistan government before the start of the contract.

Question 2: Does the feasibility study ("Module B" of the terms of reference, budget of € 500,000) include phase 2 (detailed design and tender documents) ?

Answer: Phase 1 is for the road link Tashkent / Osh. Phase 2 (detailed design, tender documents ...) is only for the sections of this road corresponding to the expected EBRD financing (40 million US \$).

Question 3: What is the meaning of the sentence "to allow a margin of flexibility, the design, specification and training activities may later be varied up to 70% of total budget, depending on needs and requirements in each state, and always in common agreement between the contractor, the beneficiary authorities, and TACIS" ? Does that mean that equipment can be replaced by man-days consultancy ? (see ToR, page 22)

Answer: With regard to the margin of flexibility indicated on page 22 of the ToR, the situation is as follows:

- during the first phase the contractor will provide the design concept and a listing of the equipment
- in a second phase the contractor will organise the procurement of equipment and software.

At this stage the exact cost of the equipment and software will be known.

Whilst there is a budget of € 1.1 million for equipment, it is believed that up to € 280,000 could in fact be saved on this budget (the equivalent of some 70% of the € 400,000 allocated for system design and specification, training activities). To the extent that such savings are made on procurement, these savings should be used to strengthen the training component.


Carla Osório
Procurement Co-ordinator
AIDCO A6

Facsimile Transmission

To	: Tacis Procurement Unit	Fax No	: 00322 548 1459 ✓
Attention	: Carla Osorio	Page 1 of	: 1
From	: Mark Maunsell-Thomas	Date	: 8/2/01
Copy	:	Internal Distribution	:
Subject	: Clarification	Job No	:

Central Asian Border Crossings SCR-E/110622/C/SV/WW

Dear Ms Osorio,

We request clarification of the following point from the Terms of Reference:

In section 4.3, Global Budget, it states that Module B/ Feasibility Study is allocated 500 000 euros. Furthermore in section 2.3 it says, "Commencement of Phase 2 will be conditional on acceptance of the recommendations of the Feasibility Report by the Client and the Bank."

Is Phase 2 of Module B included within this 500 000 euro budget?

Regards,



Mark Maunsell-Thomas



Appendix

C

Procurement procedure for Module B





The following provides a detailed description to the procurement procedures that will be used in Phase 2 of Module B. They refer to the task numbers as listed in 4.2.2 of Annex B.

Task 13 Tender Documents

The proposed construction works for road rehabilitation, associated drainage and bridge works, are to be carried out under contracts awarded following International Competitive Bidding. The bidding documentation will be prepared in accordance with EBRD guidelines and the particular requirements of the Client. They will be based on the latest version of the FIDIC Conditions of Contract for Works of Civil Engineering Construction which include:

- Invitation for Tenders
- Instructions to Tenderers
- Conditions of Contract
- Form of Tender and Appendix to Form of Tender
- Specification
- Bills of Quantities
- Drawings
- Typical Forms for, e.g., Contract Agreement, Performance Guarantees, etc.
- Schedules of Supplementary Information to be supplied by tenderers for the purposes of tender assessment
- Supplementary information to be supplied to tenderers, e.g. ground investigation data
- Notes for the Guidance of Tenderers (optional)

A large number of documents need to be prepared for obtaining the necessary approvals and for tendering purposes. However, the documentation is almost the same for each contract, particularly if standard details and specifications are employed. The SNIP/GOST standards, particularly for drainage structures and for road furniture, can be used to ensure consistency and continuity. If necessary, the use of European or American standards [note to Mark – are American standards appropriate for an EC funded project?] may be proposed if considered desirable to enhance local standards and encourage the use of internationally accepted good practices.

It must be remembered that a substantial proportion of the tender documentation will subsequently be incorporated into the contract documentation and, as such, it is of vital importance that it is properly prepared. Poor preparation of documents, at this stage, is one of the main sources of claims under a contract. No matter how much care is given to the preparation of a design, it is unlikely to be properly executed if the contractor and the site supervision staff are not provided with a coherent set of documents to work from. The Consultant's considerable experience world wide in the preparation of all forms of contract documentation and on supervision of construction will ensure that the documentation is prepared to the highest standard. The bidding documents will be finalised based on the detailed engineering design and we will provide ongoing support to the Client to obtain the necessary approvals.



Task 14 Pre-qualification of Contractors

Companies interested in tendering for contracts will be asked to submit for assessment, details of their organisation, such as their experience, their management organisation, their equipment and their financial resources. This is to ensure that only those with appropriate and adequate backgrounds are invited to submit tenders. Pre-qualification is beneficial, as it ensures that only those companies that are suitable in all respects are invited to submit tenders. It thus saves the Client time and money in the production of documents and assessment of tenders, and avoids patently unsuitable companies incurring the costs (which can be quite considerable) of preparing tenders. It can also avoid the potentially invidious situation in which the client is forced to reject the lowest tender on the grounds of incapacity or, even worse, appoints a contractor who subsequently proves to be incapable of carrying out the contract.

The pre-qualification process consists of:

- Preparation and issue of the Pre-qualification Notice
- Preparation of pre-qualification documentation
- Issue of the Pre-qualification Document to applicants
- Receipt of applications for pre-qualification
- Assessment of applications for pre-qualification
- Preparation of the Pre-qualification Report and recommendations for pre-qualification
- Notification of successful and unsuccessful applicants

The Pre-qualification Notice is the means of advertising that a project is available for contractors to bid for. There may be specific requirements of the Client as to the content and/or circulation of the Notice and these will be taken into account. The Pre-qualification Notice should include, as a minimum, the following information:

- The name of the Client for the project
- Reference to the source of funds, if from a separate funding agency
- A brief outline of the project, including the location and scale of the work and (where appropriate) the scope and number of contracts
- The type of contract to be used (e.g. re-measurement, management etc.)
- The organisation (with the address) from which further information and/or the Pre-qualification Document can be obtained
- The anticipated programme for pre-qualification, tendering, award and completion of contracts
- Instructions for applying for the Pre-qualification Document (including details of fee, if applicable)
- The address for the delivery of pre-qualification applications and the date and time by which they are to be received



The pre-qualification documentation will usually consist of two documents:

- The Pre-qualification Document

This is the document that is issued to companies that wish to apply for pre-qualification; and

- The Pre-qualification Evaluation Document

This document sets out the principles and, where appropriate, scoring to be adopted in assessing pre-qualification submissions, together with the procedures to be followed when assessing submissions. It is usually a confidential document and as such will only be issued to the Client and those involved with the assessment of submissions, not to the applicants.

The Pre-qualification Document is the means by which aspiring contractors are informed of the nature of the project, the scope of the contract(s) involved, and the information which they are required to provide for assessment purposes. In general, requests for the Pre-qualification Document would be expected soon after the Pre-qualification Notice is published and the Document will be completed (including any necessary approvals) so that it is available for issue at the time the Notice is published.

The Pre-qualification Document will include, as a minimum, the following:

- The Notice of Pre-qualification
- Brief description of the project country, including details of major points of access climate, topography, religion, principal language, etc
- Brief details of the project, including estimated contract values and some approximate quantities for the major items of work to give an indication of the scale of each contract, and the required time for completion of construction. It is important that descriptions of work are clear, as some terms may be interpreted differently in different countries
- Anticipated programme for the issue of invitations to tender and award of contracts
- The names of the responsible parties, such as the Employer and Engineer for the works
- The name of the funding agency
- A list of eligible countries, if there are to be restrictions on the nationality of applicants
- The address from which further information (if required) can be obtained
- The procedures for submitting applications, including packaging and labelling, and address, time and date for submission of applications
- Details of information which the applicants must provide. To ensure a uniformity of approach in the preparation of submissions, and thus assist in the assessment, it is useful to include pro-formas for the applicants to complete and return
- Brief outline of the factors that will be taken into account in the assessment, but without specific details of the scoring system



The Pre-qualification Document will also identify any other points relevant to either the pre-qualification or the tender processes. These could include matters such as particular pre-qualification criteria for joint ventures.

The precision with which assessments of pre-qualification submissions can be carried out is dependent on the quality of the information received from applicants. This in turn is dependent upon the clarity and comprehensiveness of the Pre-qualification Document, so it is important that care is taken over its preparation. It will also identify the criteria that will be used in the assessment procedure as it would be unfair to introduce criteria later of which the applicants were unaware. Assessment of pre-qualification submissions will be made as objective as possible. The adoption of some form of scoring system can assist in converting qualitative judgements into quantitative scores, which will facilitate comparison and ranking of submissions. The Pre-qualification Evaluation Document will be prepared in parallel with the Pre-qualification Document. This will ensure that the correct questions are asked in the Pre-qualification Document, so that data that is to be assessed and/or scored is in fact supplied by the applicants.

Following publication of the Pre-qualification Notice the Pre-qualification Document is to be issued to those companies who wish to be pre-qualified for contracts under the project. They may apply in person or request that the documents be sent to them but, either way, a register will be maintained of all applicants with details of contact names and addresses. It is common for a nominal fee to be charged for the documents, primarily to cover reproduction and mailing costs; if such a fee (which would usually be non-refundable) is required from applicants, then receipts will be prepared and issued to applicants confirming payment.

When submissions are delivered they will be properly recorded; this can best be done on the register of purchasers of the Pre-qualification Document. By this means it will be immediately apparent which purchasers have declined to prepare submissions. Receipts for the pre-qualification submissions will also be issued to the applicants. It is important that the latest time and date for submissions are strictly observed, and any submissions received late are returned unopened. To allow this to be done it is usual to require the envelope containing the submissions to bear the name and address of the applicant. This allows late applicants to be identified, but removes any chance of accusations being levelled that there had been sight of the contents of the returned submissions.

Assessment of pre-qualification submissions can produce a significant quantity of paper in the form of completed pro-formas. It is important that these are properly filed and stored, together with the submissions, so that they may be reviewed in the event of queries or disputes at a later date. To remove any possibility of accusations of collusion against the assessor(s), it is advisable for the Summary of Assessment to be signed by all those involved in the assessment confirming that they have no commercial interest in any of the applicants.

The Pre-qualification Report will:

- Briefly set out the background to the pre-qualification process, with reference to the publication of the Pre-qualification Notice



- Identify the number of companies that purchased the Pre-qualification Document and that made submissions for assessment
- Give a brief report on each submission received and its success or otherwise in the assessment process
- Identify those companies that have successfully passed the assessment process and can be considered as pre-qualified for contracts under the project

The Pre-qualification Report will be succinct and cover primarily the findings of the assessment without giving extensive detail of the assessment process. Pro-formas completed during assessment will not be included with the Report but will be available for inspection if required.

Once the pre-qualification assessment has been completed and the recommendations accepted by the Client, applicants should be notified. This will be done on an individual basis, rather than by circulating lists of successful and unsuccessful companies. It is important to note that applicants must not be advised of the results of the assessment until the Report has been accepted by the Client.

Task 15 Tender Procedures

The general principles of the procurement process may be stated as ensuring that:

- The tender and contract documents are unambiguous and clearly set out the rights and obligations of the parties to the contract
- The selection and appointment of the contractor is carried out in a fair and impartial manner that will withstand subsequent scrutiny
- The contractor has the appropriate technical knowledge, experience, and resources to undertake the works
- The contractor has adequate financial resources to undertake the works
- The contractor is eligible in accordance with the rules of the client and/or the funding agency
- The contractor has a good understanding of the works to be undertaken and any special features of the contract; and
- The cost to the client/funding agency will be reasonable for the works envisaged

The Invitation for Tenders is usually a fairly short document, around one page, and would typically include brief information on the funding agency for the contract for which bids are sought, the fee for purchase of the tender documents (if any), the date and time by which tenders are to be submitted, the address for submission, and the amount of tender security that is to be provided with the tender.

The Instructions to Tenderers sets out particular requirements that tenderers must satisfy when preparing and submitting their tenders, and as such they cease to have any relevance once a contract has been awarded. In particular they have no role so far as subsequent



interpretation of the contract is concerned. The contents of the Instructions may be prescribed by the Client but they should include at least the following:

- Latest date and time and address for submission of tenders
- Requirements for tender bond
- Information and documents to be submitted by the tenderers (e.g. method statement, outline programme, site management organisation, plant, sub-contractors, corporate health & safety and quality management procedures etc.)
- Details of pre-tender site visit and meeting
- Requirements for packaging and labelling of submissions
- Number of copies of tender to be submitted
- Procedures for opening of tenders and attendance by tenderers if permitted
- Information available for inspection by tenderers
- Procedures for alternative designs
- Main criteria for evaluation, including means by which arithmetical errors will be resolved

The Conditions of Contract to be used on this project is the latest version of FIDIC. Modifications required for the specific contracts would be included by means of Special Conditions or Conditions of Particular Application.

From a legal/contractual point of view the Form of Tender could be considered as the most critical component in a tenderer's submission as it is where he commits himself to his offer. It is usually a short document - one or maybe two pages - and the standard forms only require minor modifications to tailor them to a particular contract.

The Appendix to Form of Tender contains contract-specific information on matters such as the completion period, level and limit of liquidated damages, details of the method for reimbursing price fluctuations, etc. Some items will involve consultation with the Client before they can be finalised.

The Specification will be prepared during the detailed engineering design. It is important that the document is reviewed from a contractual viewpoint to ensure that the terminology is correct and that it is technically and contractually compatible with the other documents. It is also important to differentiate between a design specification and a contract specification. The former is basically a guide to good practice when preparing a design, and is unlikely to be relevant or correctly worded for use as a contract document.

It is common practice, and recommended as good practice, to prepare specifications in two parts, a General Specification and a Special or Particular Specification especially on multi-contract projects. The General Specification will typically be a standard document that may have been prepared by the Client authority and would be included in the tender and contract documents for all contracts. The Particular Specification will be prepared for each individual contract and will supplement and amend as necessary the General Specification.



The Bills of Quantities, as with the Specification, will be prepared by the designer. However they should also be reviewed from a contractual viewpoint, in particular with respect to the Preambles, to ensure that the work coverage of the Bill items is clearly defined. If a standard method of measurement is used then the appropriate reference must be made. It is recommended that, whenever practicable, all matters relating to measurement of the Works for payment purposes should be included in the Bills of Quantities.

Preparation of the Drawings is the responsibility of the designer but, as with the Specification and Bills of Quantities, a contractual over-view is required. A particular feature of this over-view would be checking cross-references to the Specification and nomenclatures, such as materials descriptions included on the Drawings, to remove any anomalies or inconsistencies.

When a contract is awarded there are several formalities to be completed such as the signing of a contract agreement, provision by the contractor of performance securities, etc. Clients usually have standard forms for these and samples are often included in the tender documents to familiarise tenderers with the commitments they would be required to enter into.

Schedules of Supplementary Information can vary greatly in content from tender to tender, but the idea behind them is to elicit information from tenderers on their proposals for carrying out the works, e.g. staff and plant to be deployed, sub-contractors to be used, method statement, outline programme, cash-flow diagram etc. This information is used for the purposes of tender assessment. In general these Schedules should only be incorporated into a contract in special cases, and with a clear understanding of the contractual complications that may arise. They can nevertheless be of use in assessing a tenderer's understanding of the works to be constructed.

There will often be other information, for example ground investigation data, which is provided for the tenderers either by being issued with the tender documents or by being made available for inspection. It is important to note that in general such information should be limited to factual data and not include any interpretative conclusions.

In the event that amendments are required to any of the Tender Documents, these will be handled by means of Tender Notices or Tender Addenda. When making any such amendments it is important to distinguish between those Tender Documents which will ultimately be incorporated into the Contract, and those (such as the Instructions to Tenderers and Notes for Guidance) which are for tendering purposes only.

It is not possible to forecast every eventuality that may arise during the tender period which will require action on the part of the consultant. However common ones are dealing with enquiries from tenderers, issuing Tender Notices and Tender Addenda, and handling requests for extensions to the tender period. Tenderers' enquiries may be received either orally or in writing, but a record must be kept of all communications and responses must always be in writing. In some cases a query may highlight an error in a document which requires an addendum to be issued to correct it. Responses must be circulated to all tenderers, but without any indication of the source of the enquiry.



It is important to distinguish between Tender Notices and Tender Addenda. Tender Notices are the means of communication from the client to tenderers during the tender period, whereas Tender Addenda are the mechanism by which amendments are made to those Tender Documents which will subsequently be incorporated into the Contract. Tenderers must take account of both Tender Notices and Tender Addenda when preparing and submitting their tenders.

Tender Notices may cover any matters relating to the preparation and submission of tenders and do not become part of the Tender Documents. They may amend the Instructions to Tenderers or Notes for Guidance, or they may cover the issue of Tender Addenda. Tender Addenda will become Tender Documents and their contents will be incorporated into the subsequent contract. As noted above they are only to be used to make amendments to those Tender Documents which will subsequently be incorporated into the Contract. Such changes may be required, for example, when it becomes apparent that there is an error in the Tender Documents issued, or when the Client wishes to make a change to some aspect of the works.

When issuing Addenda due account should be taken of the magnitude of the change and the potential effect on tenderers' work in preparing their bids. It is not reasonable to issue, close to the tender return date, an Addendum that will have significant or wide-ranging effects on tenderers' submissions. If tenderers are not able to assess these effects fully there is a danger that they will price high for the change owing to indeterminate risks. It is not uncommon for a deadline to be stated after which no Addenda will be issued; this should not be less than four weeks before the date set for return of tenders. If it is essential that an Addendum be issued after this date then the tender period should be extended.

Under many standard conditions of contract a contractor is "deemed" to have visited the site while preparing his tender (i.e. in law he is assumed to have done so, whether in fact he has or not). It is however of benefit to all concerned if a pre-tender site visit and meeting (sometimes called a pre-tender conference) are organised by the Client or consultant to which all tenderers will be invited. The details with regard to date and location of meeting, limit on numbers of attendees per tenderer, etc. will be set out in the Instructions to Tenderers. The timing of the site visit and meeting will depend on the length of the tender period. If it is set too early tenderers will not have had an opportunity to review the tender documents and identify points they wish to have clarified on site, whereas if it is set too late there will not be time for them to incorporate the effects of clarifications or amendments into their tenders.

It is important that the receipt of tenders is properly managed, with all tenders being logged in with the time of delivery. If tenders are delivered some hours (or even days) in advance of the closing time then they must be kept unopened in a safe secure place until the specified time for opening. Tenders should be submitted double-wrapped so that late submissions can be returned unopened. The outer cover should only bear the contract reference, and no indication of the identity of the tenderer. The inner cover should bear both the contract reference and the tenderer's name and address. This retains the anonymity of submissions when first received, and yet allows for late submissions to be returned to the tenderer unopened. The outer cover should also carry a statement to the effect that it is not to be opened before the due time and date; the instructions for this will be included in the Instructions to Tenderers.



Clients usually specify the procedure for the opening of tenders. As a minimum, the tenderers' names, prices and any adjustments submitted will be recorded. It is important that any specified procedures are strictly followed, particularly with regard to alternative tenders or offers of discounts, as these may inadvertently be disqualified if not properly handled at the opening. In the event that a tenderer has exercised his right to make additional submissions modifying or withdrawing his tender, it is imperative that these submissions are opened or otherwise dealt with in the correct order. Once tenders have been opened, and throughout the ensuing assessment process, it is important that the documents are kept secure. Tenders contain commercially sensitive information and the assessment team have a duty to the tenderers to ensure that confidentiality is maintained. For this reason the number of copies of tenders requested will be kept to a minimum. The original tenders will, after verification that the copies are identical, be kept in the Client's office and only the copies referred to during assessment.

Assessment of tenders cannot readily be made objective and scored in the same manner as pre-qualification submissions and, apart from the tender price, it is primarily a subjective exercise. Clients may set out their own requirements for tender assessment, particularly with regard to procedures, but there are some general points that will apply in all instances. The assessment will normally be carried out in two stages. The first one will be a brief review of all submissions leading to a short-listing of two or three tenders, which will then in the second stage be subjected to detailed review. An interim report will be submitted to the Client at the end of the first stage with recommendations for the short listing. The first stage review will comprise the following:

- The tenders will be checked for compliance with the requirements of the Instructions to Tenderers
- An arithmetic check of all tenders will be carried out with any discrepancies being notified to the tenderers and their agreement sought to the corrected tender sum. In the event of an error in an extension in a Bill the rate will be taken as correct and the extension amended, and in the event of an error in the total of a Bill then the extensions will be taken as correct and the Bill total revised
- Any qualifications set out by a tenderer will be reviewed and in general qualified tenders will not be accepted. Any refusal by a tenderer to remove his qualifications may lead to his tender being rejected
- The acceptability of tender securities will be confirmed
- Up-dated pre-qualification data (if requested) will be reviewed to confirm the tenderers' continued acceptability
- Confirmation that changes made under Tender Addenda have been allowed for in the tender

Short-listing of tenders for second-stage assessment, from those that clear the first-stage review, will usually be done on the basis of the lowest corrected tender prices. Essentially the selection will include those tenders with a realistic chance of being appointed. In general it is recommended that the two lowest tenders are carried forward, but this may vary depending on the relative tender prices. For example if the prices of the second and third tenders are very close it may be advisable to include the third-placed tender.



The second stage assessment will comprise detailed assessment of the short-listed tenders, and involve reviews of the following:

- The Bills of Quantities, particularly the Preliminaries, to check if there is excessive front-end loading that would lead to large payments being made early in the Contract. The effects of these can be off-set by the use of discounted cash flow calculations to produce the net present value of each tender (i.e. the value in “today’s” money) which may change the order of the tenders. Alternatively a tenderer may be asked to provide an increased Performance Bond to protect the Client from the risk of a contractor defaulting after several large payments have been made
- The method statement to assess its suitability as an indication of how the Works will be executed, and to ensure that there are no qualifications hidden within it
- The outline works programme, to assess its suitability for the execution of the Works
- Proposals for the deployment of plant
- Submissions for base prices for materials if the tender documents contain provision for price fluctuations to be reimbursed on the basis of invoices rather than indices including if applicable sources of materials
- Proposed sub-contracting as a percentage of the total work
- Proposed site management structure and staff
- Alternative tenders (e.g. alternative design, revised completion dates) if appropriate

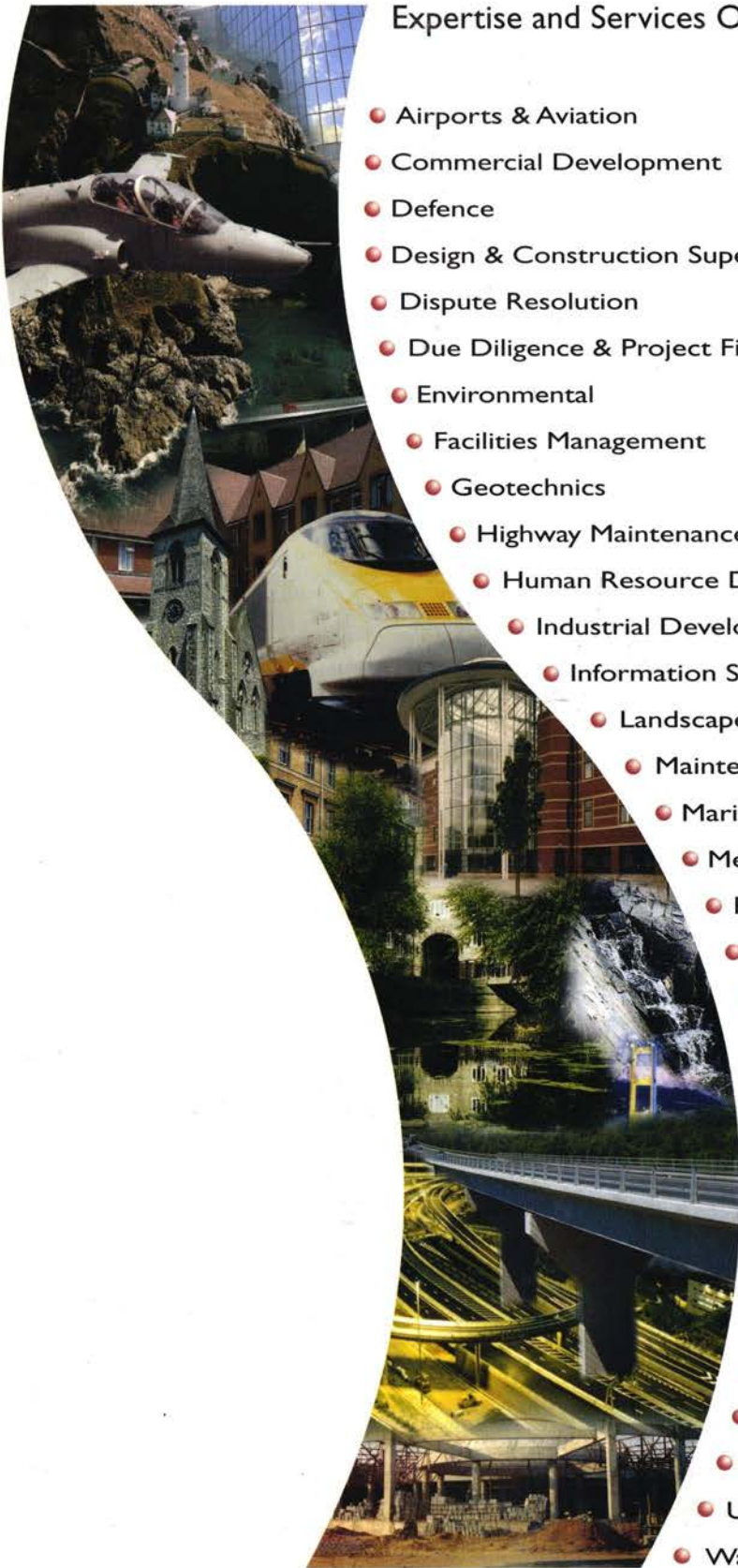
It may be necessary during the course of tender assessment to send questions to some tenderers to seek clarification of some aspect of their submissions. Standard forms will be prepared for these questions, including a box in which the tenderer can enter his reply. Each question will have a discrete number, and a register maintained of all questions issued. It is important to note that such issue of questions should not allow tenderers to alter their tender prices unless the question revises the work content of the contract.

The ‘Engineer’s Estimate’ is used as a reference point for rating tenders, but it must not be treated as the ‘correct price’ for doing the work. There can be many factors that tenderers may take into account in preparing their tenders, including commercial assessments of the risks involved, that different companies may view differently. It is not possible to forecast accurately how tenderers will price these factors and the estimate can only be based on available market data on current rates and prices. It will however provide a useful figure for comparison purposes.

Upon completion of the tender assessment a report will be prepared and submitted to the Client setting out the background to the tender procedure, information on the number of invitations to tender issued and tenders received, any major points of concern, and details of the assessment process. It will also include a recommendation for award of the contract(s). Following acceptance of the tender assessment report, amended bidding



documents incorporating all revisions and correspondence will be prepared as contract documents relating for signing by the successful bidder.



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