

Traceca: Central Asian Railways

Restructuring Project

Module C: Turkmenistan Railway

Restructuring Study

**Inception Report** 

September 1997

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### INTRODUCTION

The project for the restructuring of Turkmenistan Railways (TDY) forms module C of the TACIS / TRACECA Restructuring Study of the Central Asian Railways. The project is being financed and managed by TACIS / TRACECA in collaboration with the European Bank for Reconstruction and Development.

TDY has 2,198 route Km of single line track with 1520m gauge, 21,373 staff with freight carryings of 8.0m tonnes annually, and 7.25m passengers annually. Since 1991 freight traffic in Turkmenistan Railways has declined significantly and revenue has fallen due to inadequate tariffs. A backlog of repair and general maintenance of locomotives, wagons and track, arising from lack of foreign currency and inability to purchase spares and replacement materials, is contributing to the continuing decline of traffic, and has led the Turkmenistan Government to become focused on restructuring the Railways.

# This document is the Inception Report

# 1 Project Synopsis

### 1.1 Wider Objectives

- Support the Government and the Railway to further develop its plans for comprehensive restructuring in the light of its current and expected market opportunities and its goal to be a commercially driven, financially self sustaining enterprise.
- Advise on the future relationship between the Railway and the Government and the development of a commercially oriented organisation structure.

# 1.2 Specific Objectives

- To support the restructuring process by assisting TDY to develop a restructuring implementation plan
- To describe the organisation of a project implementation unit and the legislative, regulatory and planning instruments which are required, such as a new railway law, contract plan between the Government and the railway, agreed restructuring targets, action plans, social plans and training.

# 1.3 Planned Outputs

• A brief overall review of all major facets of the railway's traffic, operations, facilities,



equipment, finances, organisation, management, human resources, environmental impacts and legal situation.

- Review of the legal framework and status of the railway, its powers, obligations and responsibilities, its relationship with the Ministry of Transport and Communications and other Governmental agencies, including price control and other monopoly authorities.
- A review of the present, and proposals for new railway organisation and management structures.
- An assessment of the present management information systems relative to the needs of a modern commercial organisation, and identification of future development requirements.
- An analysis of present traffic patterns and trends for key freight traffics by commodity type, and passengers by service.
- An analysis of the current level and structure of railway costs for the most important traffics, and a comparison with the levels and structure of tariffs to identify any traffic types which may not be profitable.
- A definition of the basic elements of a contract between the Government and the Railway which would provide for social services to be provided in the most efficient way and compensate the Railway for financial losses associated with such traffic.
- An assessment of the present and prospective future financial situation of the Railway
- An analysis of the Railway's operational efficiency and an outline of low cost investment improvements
- An assessment of facilities and equipment of infrastructure network.
- An assessment of maintenance and repair management, procedures, facilities and locations
- An assessment of the present and future human resources requirements of the Railway and the definition of an adjustment programme.
- A survey of the environmental impacts of Railway construction, maintenance and operations, identification of any problem areas, and recommendations for any needed measures
- A description of priority capital investment requirements aimed at supporting the restructuring programme rehabilitating and preserving critical infrastructure and equipment, and providing investment to meet new market opportunities.
- A Regional Collaboration Meeting.



# 2. Analysis of Project

### 2.1 Institutional

The legislative basis for TDY activities is the President's Decree No. 1709 dated March 1994. However a certain number of railway regulations from the former Soviet Union are still valid. In the Constitution of the Republic of Turkmenistan nothing seems to be said about railways.

In the decree mentioned above it is clearly stated that TDY is a state owned and state managed enterprise. Although TDY is called an independent production and economic complex with legal personality and separate accounting, in reality it is a very hierarchically structured administration. The decree is more an enumeration of the duties of TDY than a description of the relationship between the railways and the state.

A draft for a new railway law is presently bring examined by the Parliament after having been agreed upon by the Cabinet of Ministers. The text of the draft shows that the new law will hardly bring any change to the legal status of TDY but has the aim to just regulate in a more detailed manner the railway activities and particularly the duties.

Generally speaking our interview partners gave the impression that TDY and the Transport Ministry are not giving too much thought to the status question but that main efforts are concentrated on technical development. It is therefore one of the tasks of the consultant to demonstrate to the Turkmen partners the reasons why the railway organization should be restructured.

### 2.1.1 Reasons for restructuring

Passenger and freight traffic have immensely decreased since the breaking up of the Soviet Union. As the cost structure has not followed all possible measures have to be undertaken to adapt TDY.

Turkmenistan is trying hard to develop its economy and the standard of living. Railway restructuring could essentially reduce the financial burden and set capital free for other purposes.

It would also be a relief for the government budget if private capital could be interested in investing into some of the rail activities, the structures being duly prepared in the sense of efficiency and business profitability.

Although TDY has a factual transport monopoly at least for long distance traffic real competition between modes will arise in the coming years. TDY has to get prepared for

this and should start with it immediately in order to achieve the restructuring objective in an orderly way and step-by-step process.

### 2.2 Financial

### Financial results before adjustment for inflation

An analysis of the financial results of Turkmenistan Railways for 1995, 1996 and the half year to June 1997 is contained in the Table set out below. Year on year comparison of the reported data is hampered by the inflation that occurred during 1995 and 1996. Full year inflation for 1995 was 1393% and for 1996 was 644% based on the published consumer price index. Average weighted annual inflation in 1995 and 1996 was 596% and 254% respectively.

The financial net result for transportation activity in 1995 and 1996 shows that revenue exceeded costs by 44% in both years. The results for the half year 1997 shows that the margin on transport related activity declined to 31%.

Table 2.2.1
Turkmenistan Railways: Financial Results 1995 to June 1997
Million Manats

Description	Full Year 1995	Full Year 1996	6 Months 1997
Transportation Revenue			
Freight	6,668	137,854	100,042
Passenger	653	7,544	10,218
Total	7,321	145,398	110,260
Transportation Expenditure	4,070	81,154	75,622
Net Result Transportation	3,251	64,244	34,638
Profit %	44%	44%	31%
Net Income Auxiliary Activities	178	8,720	5,742
Net Other Income/Expenditure	608	(99,948)	537
Net Result before Taxes & Profit Distributions	4,037	(26,984)	40,917

The loss reported under Net Income/Expenditure Other Activities in 1996 resulted from an exchange loss on a Russian debt amounting to 101,188 million manats.

# Financial results after adjustment for inflation

In order to compare the result of TDY year on year it is necessary to adjust for the effects of inflation. Based on the summary information provided to the consultants it is possible to make the following brief observations:

- The freight revenue reported for the first six month of 1997 appears to have declined compared with the inflation adjusted revenue levels for 1996. TDY have stated that they believe that the decline in freight traffic has now bottomed out.
- Passenger revenue appears to be constant after adjustment is made for the effects of inflation.
- Transport expenditure is below the level reported for 1996 after adjustment for inflation. The consultants have only limited information at this time regarding the reason for costs reductions but there appear to have been reductions in almost all categories of expenditure.

Table 2.2.2
Turkmenistan Railways: Financial Results 1995 to June 1997
Inflation Adjusted Transportation Activity results
Million Manats

Description	Full Year 1995	Full Year 1996	6 Months 1997
Average Annual Inflation Factor	5.96	2.54	<b>-</b>
FullYear Inflation Factor	13.93	6.44	-
Inflation Index Factor to 01.01.1997	38.38	2.54	-
Transportation Revenue			
Freight	255,934	350,149	100,042
Passenger	25,064	19,162	10,218
Total	280,998	369,311	110,260
Transportation Expenditure	156,216	206,131	75,622
Net Result Transportation	124,781	163,180	34,638
Profit %	44%	44%	31%

### 2.3 The TDY System

The TDY system operates 2,198 route km of single line track with gauge of 1,520m. The main line links Turkmenbashi, Ashgabat, Mary and Chardjev, with branch lines Chardjev / Dashkavuz / Tahiatash to Kazakstan and Russia, Chardjev / Farap and Uzbekstan, and Kerichi / Kilif to Afganistan. A new line to Iran from Tedschen / Sarahks was constructed recently and opened in 1996 connecting the TDY system to Iran Railways, and affording a through rail route from the land locked Central Asian States to Bandar Abbas in the Persian Gulf. The maximum line speed is 100 kph for passenger trains and 80 kph for freight trains, with some sections or track having speed restrictions of 40/60 kph.

# 2.4 Management Organisation of TDY

The present management organisation of TDY is set out on the Organisation Chart shown in Annex 4.1 attached.

### 2.5 Human Resources

The Department of Human Resources has responsibility for all staff and personnel matters in the railway and ancillary services (water supply, repair trains etc.). The total staff on the railway at 1st August 1997 amounted to 21,373 persons, a reduction of 595 persons in the nine month period since 1st December 1996, and a reduction of 3,098 persons on the staff numbers at 1st January 1991, when TDY were carrying about four times greater volume of traffic. The breakdown of the staff numbers is set out on Table 2.5.1 below:

**TABLE 2.5.1** 

Service	Staff numbers	Staff numbers	Staff numbers
	1-1-1991	1-12-'96	1-8-'97
Loco. Workshop	4,320	3,000	3,080
Wagon Workshops	1,995	1,789	1,771
Passenger	1,551	1,826	1,716
Signal & Comm.	1,420	1,688	1,681
Track	4,766	4,719	4,693
Power Supply	459	443	455
Operating	2,858	2,685	2,672
	1,705	1,595	1,761
Freight Handling	769	384	386
Civil Construction	1,093	954	766
Other Services	442	451	435
Ancillary Services	3,093	2,334	2,343
Total	24471	21,868	21373

Since 1991 the main staff reductions have been achieved by TDY surrendering their schools, healthcare facilities, kindergartens, and their Railway College to the Ministry of Education, while other activities and railway shops went to the Ministry or Trade. In effect TDY achieved this by applying directly to the President by letter to surrender these items, and the President then made an Order accordingly. Generally speaking up to now the impetus to reduce staff comes from the Presidential or Senior Government level. TDY has however achieved a 50% reduction in its management staff in the last two

years by reorganising and reducing the number of Deputy General Directors. There is now only one Deputy General Director and he is the head of the very important traffic region of Chardjev.

# 2.6 Freight

The freight volumes for the various categories of traffic is set out in Table 2.6.1 below:

**Table 2.6.1** 

# Main Statistical Indicators - Turkmenistan Railways

		1995	1996	8	8
Description	Unit	Full	Full	Months	Months
	of Measure	Year	Year	1996	1997
Passengers Passenger Kilometres  Freight Total Freight - Tonnage including: - Oil - Building Materials - Chemicals & Minerals - Cement - Grain	Thousands MI. P. Kms MI. T.Kms Thousands Thousands Thousands Thousands Thousands Thousands Thousands	5,242 1,876 9,147 10,068 2,963 4,705 104 297 412	7,237 2,103 7,003 8,000 2,101 3,328 103 286 194	4,974 1,513 4,801 5,416 380 2,197 60 193 102	1 '
- Chemical	Thousands	117	111	63	24
- Cotton	Thousands	223	7 <b>4</b>	39	69
- Other	Thousands	1,247	1,803	2,382	505
Unloading	Wagons	530	443	446	465
Statistical Loading	Tonnes	55.6	56.7	56.3	57.4
Passenger Trains - % of planned services operated	%	94%	85%	85%	91%

As can be seen from the table the continuing decline in freight traffic over the past few years appears to have bottomed out, and a small increase is shown in the return for August 1997. TDY Commercial Department are confident that further increases in freight can be expected. The growth in freight traffic on the new line connecting Tedzhen to Sarakh and Iran has been very significant with a traffic volume in the first six months of 1997 being more than the entire freight volume in 1996, as shown in Table 2.6.2 below:



**Table 2.6.2** 

		T =		
	Millions Manats	245.1	3731.1	3976.2
Revenue	Millions US\$	2.135	3.215	5.35
Overloading	from/to TRK	120		120
Replacement Overloading Revenue	Wagons to IRI	1,729	2,416	4,145
Shipment Replacement	Wagons to TRK	757	3,932	4,689
Shipment	to Other States	429	304	733
Shipment	to TRK	311	5 61	316
Received	from	740	309 16,275	1,049
Shipment Shipment Received Shipment s	to IRAN	1,026 45,754	1,492	2,518
Shipment s	to TRK	720	2,416	3,136
Sent	to	1,746	3,908	5,654
Unit of	Measure	Wagons Tonnes	Wagons Tonnes	Wagons Tonnes
Period		1996	6 months 1997	Total to 1st July 1997

An approximate breakdown of the freight by commodity is as follows:

•	Oil Products	30%	
•	Construction Materials	40%	sand, aggregates, and reinforced concrete products.
•	Cement	3%	bulk in tanks bags in covered wagons
•	Fertilisers	1.5%-2%	
•	Grain	1.5%-2%	
•	Flour	1.5%-2%	
•	Livestock Feed	1.5%-2%	

Origin - destination information is kept by commodity type, (for example oil, quarry products etc.). There has not however been a need to keep this information by line section, but TDY has some data on traffic density by line section.

### 2.7. Passenger Services

TDY provides passenger services on all lines on its system, and has a published timetable for each station giving arrival and departure times of trains. The Chardjev region with twelve pairs of passenger including suburban trains is the busiest on the TDY system. The essential statistics of passenger traffic are shown on Table 2.6.1, while the revenue and expenditure annually is shown on Table 2.2.1.

Detailed records are kept on two types of passenger traffic internal and interstate. Settlement payments between railways in respect of interstate trains is made in Swiss Francs. Due to fuel price increases and the high cost of spare parts passenger tariffs were increased by a factor of eight in December 1996 leading to a drop in passenger volumes of 50% in the first six months of 1997, indicating that the passenger market is, as can be expected, very price sensitive.

The First Deputy Prime Minister with responsibility for Transport has indicated to the Consultants that he wishes to see a much improved passenger service being provided by TDY with present journey times being halved, improved track conditions and better train facilities for passengers. The Passenger Services Department has adopted these objectives and recently ran very successfully an experimental express train from Ashgabat / Turkmenbashi, covering the 582km in seven hours. The Caspian Sea area is an attractive resort, and there may be a market for a branded express service. TDY has recently reached agreement with the German Company Deutsch Wagon Bau to purchase fifteen new modern air conditioned coaches at a cost or 10.6 million DM for delivery in Jan/Feb 1998. The passenger coaching fleet consists of 300 coaches, 192 being required to run the daily passenger services, while 108 are docked and being repaired.

### 2.7.1 Passenger Service Operations

The operating schedule and passenger train timetable arises from the liaison between the passenger Service Department with a special unit in the Locomotive Department and the Track Service Department in agreeing and preparing the Timetable and Operating Schedule, which is then agreed with the heads of all Departments and the General Director. Each Service then complies with the requirements of the Timetable , the Passenger Service Manager controls the coaching stock maintenance, the train crews and the water supply and the coal for heating , while the Locomotive Dept. is responsible for the crew of the locomotive.

# 2.8 Rolling Stock

### 2.8.1. Locomotive Services

Locomotive services of TDY includes four independent locomotive workshops: Ashgabat, Chardzhev (including two subsidiaries of Dashkhouz-station and Amudariya-station), Mary (including two subsidiaries Kushka-station and Serakhs-station), Gazandzhik (including one subsidiary of Turkmenbashi-station).

Locomotive fleet of the network contains 222 main-line locomotives and 98 shunting locomotives.

Main-line locomotives.

### **Shunting locomotives**

Type	Number	Type	Number
2 TE 10 L	170	ChME3	90
TE 10M	14	TEM3	8
TE 10B	4		
2 TE 10U	33		
2 M 62U	1		
TOTAL	222		98

Currently 73 locomotives are out of service on a permanent basis but if the need arose 40 of these could be mobilised. About 80% of the locomotives in the fleet have worked for more than 18 years and can be regarded as close to being life expired. The rather short life allocated to these locomotives is to a large extent due to the climatic conditions in which they operate, with frequent dust storms off the desert, and extremes of heat. The locomotives operate on a ring system out of their depots over a length of about 300 km with three crews covering the 24 hour period. The Ashkabad depot serves 320km while the Mary depot serves 410km. The average daily distance worked by locomotives is 490km. The daily operating requirement for main line locomotives is 47, and for shunting locomotives is 42.

### 2.8.2 Rolling Stock Wagons

The following is the TDY wagon fleet:

• Covered Wagons 2,082

• Tank Cars 3,261 for gas, oil, acid, and chemical

100 of these are eight axle bogie cars

with a payload of 120 tonnes

The balance are four axle bogie cars with a payload capacity of 50 to 80 tonnes. 100 tank cars are specifically for bitumen

Flat Cars 2,360Open Top High Side Wagons 1,600

• Other Wagons 620 for containers, grain, automobile

transport

Cement in bags and in bulk, side

dumping

• Refrigerated Wagons \_\_\_680

Total 10,602

There are currently 3,500 wagons out of service awaiting major overhaul. The major overhaul of wagons which was formerly carried out in Russia and Ukraine, and occurred each seven to ten years, is not now being carried out due to lack of finance and shortage of spares and material for maintenance. Routine maintenance of wagons is carried out on a two year cyclic basis at Turkmenbashi, while repair of tank cars only is carried out in Kizil-Arrat. Due to the increasing number of wagons being taken out of service on a progressive basis TDY is worried that a critical situation may arise in the future particularly if a demand for more wagons arises as a result of the success of the new line to Iran, or growth of freight traffic in future, and considers that an immediate need exists for a new specialised wagon workshop capable of carrying out major overhauls to be established

### 2.9 Infrastructure

### 2.9.1 Track Service Department

The following are the main statistics relating to the Track Service Dept.:

Operating length of TDY 2,313 km including 33 km of double track

Total track km 2,349.5km

Total length of receiving and

dispatching sidings 544.2km Station and special track 492.7km Loops and sidings 168.1km

Rail type R 75	54.6 km
Rail type R 65	2,573.27km
Rail type R50	917.8 km
Rail type R43	542.85 km

#### 2.9.2 **Mainlines**

Welded track	1,737.7 km
Concrete Sleepers	1,798.8 km
Timber Sleepers	386.7 km
Defeative Timber Sleeners	183.3 thousands

183.3 thousands Defective Timber Sleepers

Point and Crossings	764	units
Defective switches	179	units
Defective crossings	338	units

TDY estimate that to overtake arrears of track renewals, it will be necessary to renew 120 km on an annual basis, and to renew 200 point and crossing units, together with replacing about 40,000 timber sleepers.

#### 2.9.3 **Bridges and Tunnels**

Number of Steel bridges	8
Number of Steel/ Concrete bridges	16
Number of RC bridges on piers	52
Number of RC bridges	639
Number of Footbridges	10

#### Signalling and Telecommunications 2.9.4

Centralised Traffic Control with full auto block working is operational on the main lines extending from Dashrhowuz/Gazodzhak/Cherdzhev, Cherdzhev /Mary, Mary/Dushsk, Dushak /Ashgabat/Bami/Nebitag/Krasnovodsk and Turkmenbashi. On all sections, with the exception of sections Mary /Kushka and Sapamurat Turkmenbashi, centralised dispatching is operated. Semi auto block working is in operation on the line Mary/Kuska. The block sections between stations are controlled by the auto block system in which coded track circuits are used throughout, providing train detection, block signalling controls, and locomotive cab signalling.

There are 250 level crossings protected automatically, 53 being protected by automatic half barriers (AHB), while the balance are protected by warning signs and flashing lights

There are 60 Hot Box Detectors on the TDY system.

#### 2.10 Project Start

The project start up coincided with the arrival in Ashgabat of the Project Manager and

the Financial Expert on 29th August 1997, and meeting with Dr. Mukhamedberd Berdyev the Cabinet of Ministers Co-ordinator of Tacis Projects in Turkmenistan. Interpreters, car and driver were quickly arranged, and a preliminary meeting was held with the General Director of TDY Mr. Kutliev. A meeting was held with Mr. Halikov Deputy Prime Minister with responsibility for transport, who is very supportive of the project, and is interested in obtaining investment funding, and sees the upgrading of the railway, increasing line speeds, reducing journey times as priority items in the railway agenda. Mr. Bayramov Annanur was nominated as the liaison man in the Ministry, and Mr. Halmurad Berdiev was nominated 1st Deputy General Director as the liaison man who would arrange all meetings both in the Ministry and in the Railway.

The Project Director Mr. J F Higgins visited the project team to give overall direction to the project.

# 2.11 Counterparts

Mr. Halmurad Berdiev introduced the Consultants to the Heads of the Railway Departments as Counterparts at a meeting on Tuesday 2nd September and a series of meetings with the Counterparts ensued at which summary information on the present status of the Railway in respect of each Department was received.

TDY provided office accommodation and the agreed items of office equipment were ordered and purchased.

# 2.12 Project Implementation

The project will be executed by the team of thirteen well qualified and experienced experts, and will be completed in three phases. An Inception Report will be presented in early October 1997. The next phase of the project will be completed at the end of November 1997, when a Draft Final Report will be presented. After discussion with interested parties the Final Report will be presented at the end of January 1998.

# 2.13 Steering Committee

A Steering Committee has been set up consisting of the following members:

Mr. Oraz Allakeliev Chairman Head of Transport and Communications at the

**Ministry** 

Mr. Bayramov Annanur Railway Consultant of Transportation Dept at

the Ministry

Mr. M. Kutliev Director General of TDY

Mr. Patrick Jennings Project Manager CIE Consult / SYSTRA

# 2.14 Review of Existing TRACECA Reports

A listing of all of the relevant TRACECA reports relevant to Turkmenistan has been received from the Tacis office in Ashgabat and the following reports will be reviewed by the Consultants and relevant data and information in them will be extracted for use in the restructuring study.

Rail Maintenance Central Asia: Infrastructure 2
Legal and Regulatory Framework - Turkmenistan
Trade Facilitation, Customs Procedures and Freight Forwarding Project
New Railway Project Yeralievo - Turkmenbashi
Railways Inter State Tariff and Timetable Structures
Rolling Stock Maintenance Railways
Implementation of a Rail Freight Traffic
Management of a Rail Traffic Management & Information System

Due to the limited timescale for the restructuring project in Turkmenistan, any available information and data on traffic forecasting, rolling stock future requirements, Infrastructure costing will be extracted and used as source material in order to save time.



# 3. Project Planning

The present study is part of the TACIS programme for the Restructuring of Central Asian Railways. The project is financed by TACIS and is part of the technical assistance programme for the CIS States. The project was tendered in March 1997 and was awarded to CIE Consult / Systra in July 1997. DE Consult act as subcontractor for portion of the work.

A draft final report will be presented at the end of November, after which a joint meeting of representatives of the three Central Asian States will be held either in Brussels or London.

This project is part of the TACIS-TRACECA PROGRAMME for the restructuring of the railways in the Central Asian States. The work is being carried out in close collaboration with the European Bank for Reconstruction and Development (EBRD). The object of this report is essentially to assist TDY and the Government in the detailed planning of restructuring to transform the railway into a commercially driven and self sustaining enterprise.

The Consultants will also assist the railway in setting up a Restructuring Implementation Task Force which will give effect to the transition from the existing to the future organisation. The Consultants would like to thank the Deputy Prime Minister and his people in the Ministry for the kindness and courtesy of their reception. The Consultants would also like to thank TDY for currently providing office accommodation in their headquarters office, and for the co-operation they have received since arriving in Ashgabat.

# 3.1 Project Approach

In order to get a clear understanding of the railway, its problems and aspirations, the interviews which have already commenced will continue with key Ministry and Railway officials. The heads of the various departments in the railway are the counterpart staff, and this will facilitate the transfer of information and technology where appropriate. In effect the approach of the consultants will be very much a partnership approach.

On receipt of the necessary information the following steps will ensue:

- 1. Definition of the problems
- 2. Analysis of the problems
- 3. Development of solutions

Each of the experts will examine the problems within their own areas of responsibility

and where there is overlapping with colleagues, will discuss and reach agreement. The next step in the process is to implement and finally to measure the progress.

## 3.2 Workplan

The proposed timetable for the completion of the project is in Annex No.4.2. The Institutional Expert and the Operations Expert are in Ashgabat at the time of drafting this report and will already have commenced their work. The Project Manager together with the other experts will resume in early October to begin the next phase of the project. They will continue with the collection of information in their particular area of expertise, and will visit railway installations throughout the country.

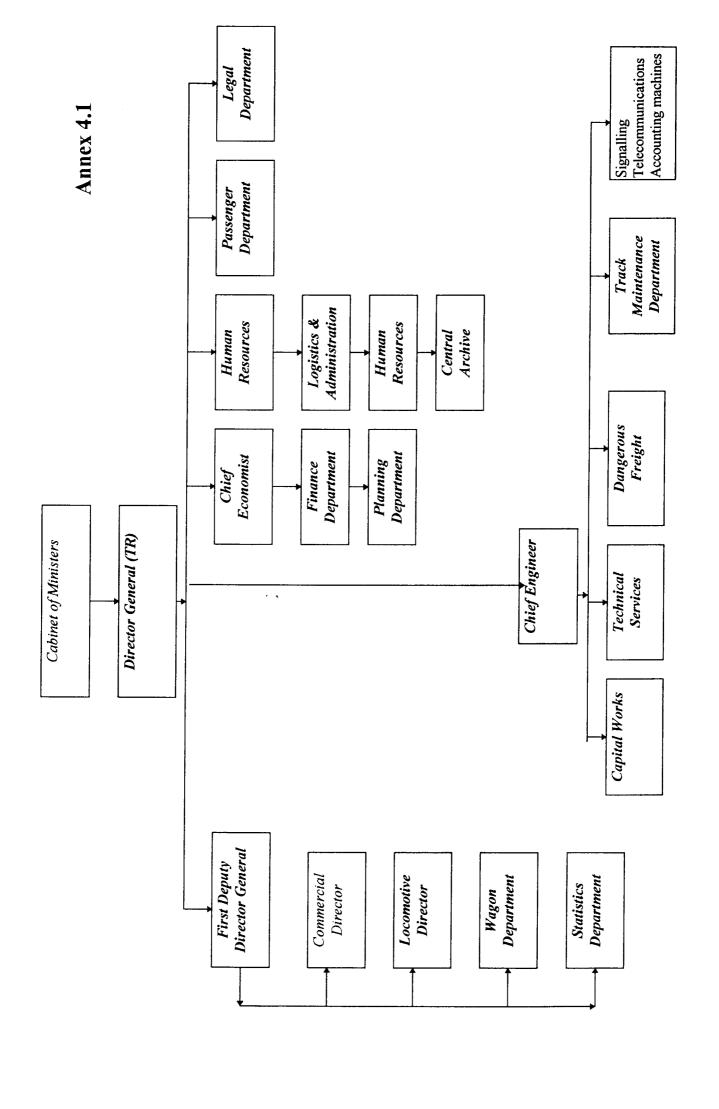
During this phase the project team will collect all the available data on:

- The national economy with particular reference to the transport sector
- Current organisation and staffing
- Railway financial performance and accounting procedures
- Costing systems
- Revenue protection
- Railway operations
- Rolling stock including maintenance
- Infrastructure including track maintenance
- Communications
- Relationship with neighbouring railways
- Proposed railway code
- Proposed institutional arrangements
- MIS systems
- Environmental law
- Privatisation proposals
- Traffic patterns and forecasts
- Commercial evaluation of traffic
- Strategic investment programme
- Customer appreciation of the railway
- Computer facilities
- Electrification Proposals

The project team will assess the information and prepare recommendations for discussion with the railway and the Ministry. The Consultants will assist TDY in the development of a Restructuring Implementation Task Force The draft final report will be available at the end of November after which a Regional Collaboration Meeting will be held with heads or the three main Central Asian States railways and the relevant ministers responsible for policy making. This meeting will be held either in London or in Brussels.

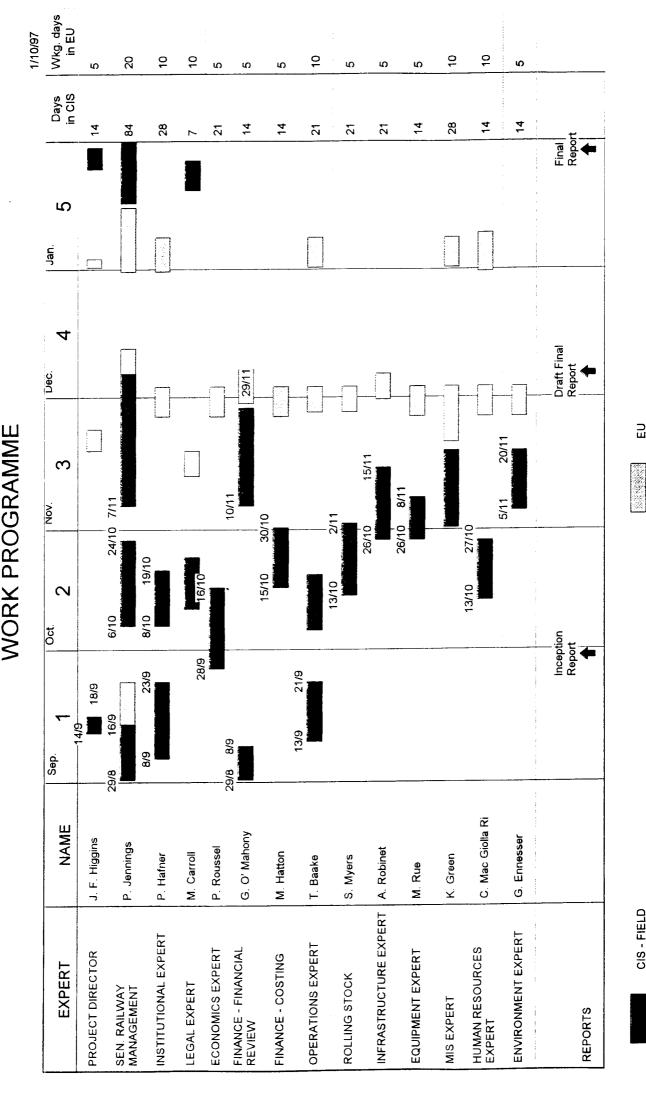
### 3.3 Deliverables

- Recommendations on the legal and institutional framework within which should the railway will operate in the future
- Outline of public service contracts
- Comment on the regulation of monopolies and price control
- Outline of the relationship between the Ministry and TDY and privatised railway companies.
- Proposals for corporatisation
- Proposals for regulatory framework
- Organisational framework for the core TDY
- Identification of the data requirements for the control of various enterprises
- Proposals for new accounting rules and procedures
- Assessment of current performance of the railway
- Financial position of the railway
- Specification of MIS for infrastructure, operations, rolling stock, accounting and human resources
- Comment on the communications system
- Comment on computer hardware
- Recommendations for computer architecture and upgrading of the communication system
- Traffic forecasts
- Traffic costing
- Commercial evaluation of traffics
- Review of railway operations
- Proposals for improved efficiency in railway operations and cost reductions
- Comment on present timetable and possible revision to address the market
- Vision of possible railway operation of the future
- Viability of operating block trains for more commodities
- Recommendations for improved maintenance procedures for locomotives, coaches and wagons
- Recommendations in relation to the number of locomotive depots and on investment proposals for locomotives and rolling stock
- Recommendations for improved efficiency in the maintenance and renewal of the infrastructure
- Recommendations for mechanising track maintenance on the TDY system
- Comment on the possibility of privatising track maintenance and production facilities
- Review of human resources in TDY
- Comment on the training needs of TDY staff
- Review of environmental law in Turkmenistan and its impact on the railway
- Develop investment proposals
- Provide financial and economic assessment of investment proposals
- Prepare outline Business Plan for the years 1999/2003

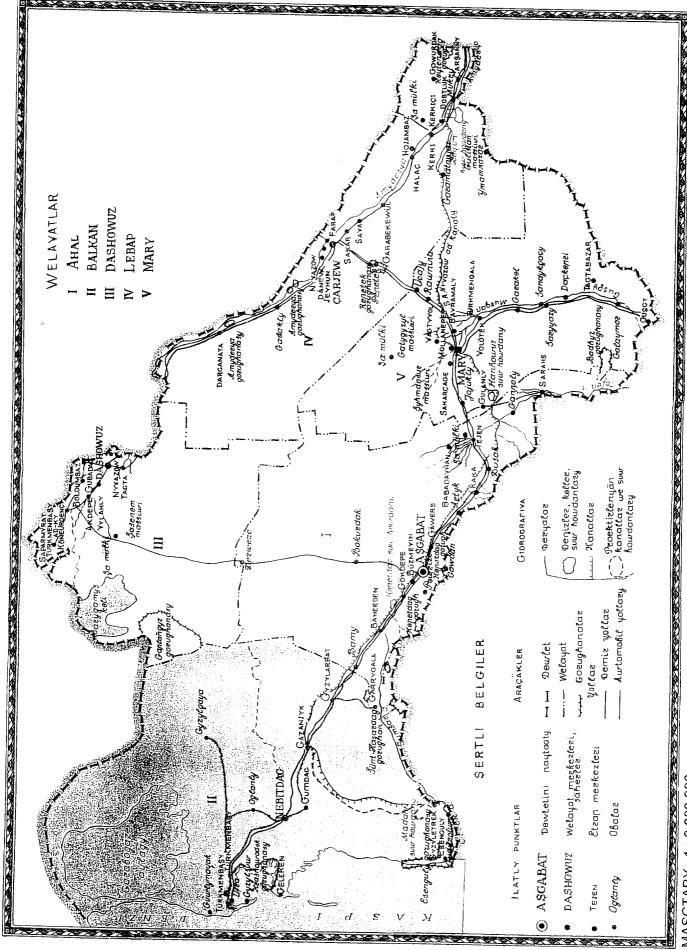


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**MODULE C: Turkmenistan Railway Restructuring Study** TRACECA: CENTRAL ASIAN RAILWAYS RESTRUCTURING



EU



Nyskmenistanyn, ezden neydalanmak, ez girelisygy ye ez zeformasyny gecikmek baradaky dowlet komiteti

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