



Final Inception ANNEXES

JUNE 1996

DHV Consultants BV

***TRACECA - Improvement
of Road Transport
Services***

TACIS

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TECHNICAL ANNEXES A1-A7

DHV Consultants BV

***TRACECA - Improvement
of Road Transport
Services***

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1 ANNEX A.1 - OBTAINING MODERN HEAVY GOODS VEHICLES

Problem area no. 1 (Ref. Chapter 2) --obtaining suitable "Eurostandard" heavy goods vehicles (20+ ton payload HGV's) at reasonable prices-- will be addressed, in all three (3) republics, within the context of Joint Venture formation attempts.

1.1 Georgia

Road transport of goods in Georgia is now 100% privatized or at least commercialized. There are still a great number of 'private' companies in the road transport sector *for sale*; the Road Transport Department will make available a 'data base' on these companies to Consultants, for possibly interested investors.

The IRTS project will focus its Joint Venture formation attempts on the enterprises identified during the first mission:

- **CAUTREXTRANS:** Transporter, owning 35 trailers (10 from Germany; Eurostandard?) and 15 (adapted Kraz) pulling unto 28T; moreover, 90 Kamaz (ex-tippers) for 14T payload. CAUTREX handles some 70% (500) of the 700 TEU, arriving in Poti every month (SEALAND ships about 120 TEU every 2 weeks). CAUTREXTRANS transports some 50% of these; SEALAND pays (CAUTREX) 4% commission on R'dam-Poti shipping price of US\$ 7,500 (2 TEU); total price R'dam-Baku about US\$ 9,750. *Freightliner* (USA; 70% Mercedes/Iveco) has offered CAUTREX reconditioned tractors at US\$ 30,000 (US\$ 40,000 with trailer) with 1 year/100,000 km Guarantee.
- **TBILTRANSEXPEDITION:** Transporter/road transport services provider with whom a (rudimentary) Business plan preparation exercise was started (ref. IR, Annexes 1 & 2).

GIRCA (Georgian International Road Carriers Association)

GIRCA has presently 83 members, 10 of which are considered **active** members who will probably apply for Carnets TIR and who have paid the entrance fee or deposit of US\$ 7,500. The issuing of Carnets TIR is expected to start in 1996, and (active) members will have to pay the Association US\$ 150 per Carnet TIR, whereas they are procured from IRU at Sw.Fr. 52. This will help the GIRCA to sustain; annual membership fees are not established yet. Annual fee to be paid by GIRCA to IRU is (now) US\$ 5,800 (Sw.Fr. 8,200).

The Association is not a commercial organisation. It only issues Carnets TIR, arranges permissions for crossing the border, and helps the member carriers to organize their transports. Its (83) members are said to own altogether some 2,000 HGV (20 ton tractor/semi trailer combi's) but only about 115 (trailers) are of "Eurostandard". Even the latter do not (now) penetrate Europe further than Hungary (via Poti-Varna ferry).

The bilateral permits¹⁾, e.g. with Turkey -in 1995 agreed at 1,000 each- are highly imbalanced in reality: Georgia now uses maybe 100 to Turkey (1995), while Turkey is allowed at least 5,000 (1995) whereby the number exceeding the quota (of 1,000) is paying a "permission fee" on a per-km-travelled-on-Georgia-territory basis.

GIRCA foresees different problems with different (European) countries when Georgian registered HGV's and drivers start participating in road transport West Europe-Caucasus (corridor), e.g. with Austria primarily on vehicle specifications/conditions (control) and with Italy particularly on obtaining visa (in time) for the drivers (the route via Russia/Rostov-on-Don, corridor (4), may be less problematic, when open again).

Regional road transport operations

The FSU-made HGV's are not suitable for international (long) haulage, but they can still be usefully employed within the republics and within the region (corridor); the combination of an 'old' (Russian) tractor (Kamaz or adapted Kraz tipper) with modern (second-hand) container trailer can offer reasonably cheap transport within the Caucasian region (the fuel prices are still relatively low!).

An interesting concept is that of a (larger) Forwarder acquiring (owning) the trailers and working together with individual driver/owners of traction units. The Forwarder may even co-finance a new (western second-hand) tractor with the owner who services his debt with part of each trips' receipts.

For the near future, the regional (corridor) transport market, seems also a good 'training ground' for participation on international transport chains. Optimization of (container/reefer) delivery and return between the major origins and destinations in the region/corridor (Poti, Tbilisi, Yerevan, Baku, Astara) can make a significant contribution to (more competitive) multi-modal transports from America and (West-)Europe. Operations with western (older) 2nd or 3rd-hand HGV's in the region will provide the 'local' drivers/mechanics with the necessary experience. The following Tables summarize some 'characteristics' of this 'regional' market (next page).

¹⁾ The total number of bilateral agreements (quota) proposed for 1996, is 3300 with 19 different countries (e.g. Turkey 1000, Russia 500).

Table 1 Regional Road Transport Distances & Regional HGV-performance

Distance (Km)	Astari	Baku	Samoer	Gg-Az	Tbilisi	Poti	Sarphi	Leselidze
Astari (Iran-Az)	xx							
Baku	320	xx						
Samoer (Rus-Azer)	530	210	xx					
Georgia-Azerbaijan border	520	500		xx				
Tbilisi	590	565		60	xx			
Poti	940	910		410	350	xx		
Sarphi (Turk-Gg)	1030	1010		500	440	95	xx	
Leselid (Rus-Gg)	1230	1200		700	645	295	390	xx

Table 2 Regional roundtrips & distances/year

Transport O-D	Poti-Tbilisi	Poti-Yerevan	Poti-Baku	Poti-Astara
Distance (km)	350	630	910	940
RT travel (days)	2	4	6	6
Wait for Unload/trip (days)	1	1	1	1
Wait for RT load (or MT back)	3 (+1)	4 (+1)	2 (+1)	3 (+1)
RoundTrip (days)	7	10	10	11
No. of RT's per year (350 days)	50	35	35	32
Mix of 25% trips of each (no.)	12	9	9	8
Distance/yr mixed trips (km)	8,400 (+600)	11,340 (+450)	16,380 (+450)	15,040 (+400)

An 'average' HGV operating regionally would (presently) performs about 38 (round)trips per year and makes some 53,000 km per year.

This estimate supports the (locally held) opinion that second-hand HGV with remaining "reliable" lifetime of 150,000 km/3 years are very suitable for these 'regional' services.

A productivity increase is expected by the combination of the **local** driver and the modern/**Western** (2nd-hand) truck due to:

- cheap(er) local driver
- less delay 'en route' due to familiarity of local driver with local situation/problems with backing up (telephone) from his local 'head office'
- modern truck/tractor will increase (average) travel speed (reduce average travel time), including fewer breakdowns/delays 'en route'
- B/L documentation and customs procedures could be unified/harmonised --within 3 Caucasian republics-- at short notice, reducing delays at the borders significantly; but ... implementation of such unified/harmonised regulations by customs officials calls for both training and acceptable employment conditions.

1.2 A Regional Procurement-Sales Centre for Western (Second-hand) HGV's

As there are no (modern) HGV-dealers (yet), a Procurement-Sales Centre (in/near Tbilisi) could fulfil the near-future demand for modern, western type, second-hand HGV-technology in the Caucasian region. This Centre would have to create a business network with i.a. West-

European Joint Venture Transport companies providing selected Truck Makes (only) as well as with their associated Truck Manufacturer(s) who would have to be involved in Spare Parts supply systems initially to become full-fledged Dealers later on. Among the Centre's basic requirements are:

- create optimal access to 2nd-hand HGV-market information (in which countries? by which means? i.a. Internet/WWW?);
- create capability to make proper technical assessments (price-quality) of 2nd-hand market offers.

The Centre's activities would include drivers/mechanics training and after sales services (spare parts stockkeeping). It is a service to all client-road carriers, but also a highly **commercial** activity. An Association such as GIRCA (and ABADA in Azerbaijan) may be an important promoter of the Centre, but may not be the best organiser of such Centre, because the Association is not an commercial organisation.

A Holding Company bringing together leading business men from the region with selected European Truck Manufacturers may be a useful option to consider. A first step towards creation of the Centre may be taken in close coordination with a first (successful) Business Plan providing a (Caucasian) transport enterprise with a substantial western second-hand HGV-fleet.

1.3 Azerbaijan

From a road transport point of view, Azerbaijan is presently the most important of the three Caucasian republics. The West-East (Europe-Black Sea-Caspian Sea-Central Asia) and South-North (Iran-Russia) corridors join near Baku. From the 600-700 HGV's on the road section Alyat-Baku, about 2/3 travels today (early February '96) via Iran and about 1/3 via Georgia. With the reopening of the "Dagestan"-route to Russia (reportedly end of January '96) and depending on the time it will take until the (2) routes between Georgia and Russia (along the Black Sea and Rostov-Tbilisi) will be reopened, the (road) transport flow pattern will remain "in flux".

Azeravtonagliat

The State Concern Azeravtonagliat holds the remains of the Azeri State Ministry of Transport under the FSU, which used to be responsible for the domestic inter-city transport. Reportedly, it still owns about 12,500 goods vehicles (of various sizes), whereas the other "budget" ministries (more than 25) own(ed) altogether some 87,500 goods vehicles; the latter were, however, not allowed to undertake inter-city transports of any commercial nature, but were employed on "technological duties" by their own ministries (a sort of "own account" transport activities).

Some 70% of the Azeravtonagliat truck fleet (8,800) are said to be still in a working condition (or repairable?) but only some 300 belong to the largest 20 ton payload class. Since 1992, very few new vehicles were received, and only 50 (of the 8,800) are not older than 4 years (all 20 Tonners); none are suitable for long distance (international) haulage. The following table provides some statistics about this truck fleet.

Table 3

Load capacity	Number	< 4 years old	4-10 years old	> 10 years old
< 5 ton	1,900			
5-10 ton	4,800			
10-15 ton	1,800			
> 15 ton (all 20 T)	300	50		
TOTAL	8,800	50	6,100	2,650

Their total load capacity is 61,500 ton (7 ton overall average). They seem to be dispersed among 150 'enterprises', with three companies somehow involved in international transport (AZINTRANS and two others)²⁾.

The question is: Will it be worthwhile to rehabilitate/recondition say some 5,000³⁾ of the 'younger' trucks for -again- 'in-country' services? And if so, who would be prepared to make a 'Business Plan' for the concerned Repair Workshop(s)? This question was left with a group of Azeri managers of the "Zykh"- and "Alyat" repair workshops⁴⁾ who promised to make an

²⁾ A local spokesman would not give a "Kopeken" for their fleet!

³⁾ This would represent say 35,000 ton load capacity and an annual (potential) **domestic** production capability of say 500 million ton-kilometers per year.

⁴⁾ "Zykh" is located in North-Baku (not very easily accessible), has 5 ha terrain and 14,000 sq.m covered workshop area (build in 1985), and had a 'service capacity' of 80 vehicles/day. "Alyat" is more strategically located (i.e. for international transport), about 70 km South of Baku, where the roads from Iran and Georgia

inventory of the fleet able to continue operations for say 3-5 years, of the (operational) plans of the trucks' owners, of the types of maintenance/repair they would wish to be carried out, and of the prices the owners(/drivers) would be prepared to pay for specific technical services.

The Concern has the strong opinion that the remaining old "Russian vehicle fleet" is --or will in the near future-- be "useless". Consultants tend to agree, certainly with regard to international road transport.

The general strategy pursued is that of the Russian vehicles being phased out⁵⁾, i.e. cannibalized (in as far as useful) and 'dumped' (if not scrapped) and to be replaced --in the first stage-- by secondhand 'western' trucks, wherever these can be obtained at affordable prices.

There remain only two companies under Azeravtonagliat involved in international transport, i.e. to States of the Former Soviet Union (Russia, Central Asia & Georgia): *Azintrans* and *Intercity Transporters*⁶⁾.

Azintrans owns 34 Supermaz (22 from year 1990, 11 from 1991 and 1 from 1992) and 13 Kamaz (8 from year 1993 and 5 from 1991) all of the 20 Ton Payload Semi-trailer type; total load capacity of this fleet 940 Ton.

Intercity Transporters' fleet is significantly larger (240 vehicles) and older (1976-1989), with various payload categories: 101 (super)Maz 5432 with 20 T semi-trailer (from year 1988), 60 Maz 504 B (14 T from year 1976) and 79 Kamaz (2 of 8T; 16 of 10T; 61 of 14T); total load capacity of this fleet 3,890 ton.

The end of this century will almost certainly mark the end of this 'international' fleet.

Azeravtonagliat is attempting to arrange a DM 10 mln credit (in Germany), but needs an Azeri Government Guarantee for this. It expects to buy approximately 150 Mercedes Tractor-Semi Trailers (25 ton- & 40 ton combinations) for an average price of around US\$ 50,000. Procurement of (fast moving) spare parts and training of mechanics etc. would be included in the deal. Azeravtonagliat foresees to sell (on credit terms) the trucks to companies such as Azintrans & Intercity Transporters, as well as to any other interested party.

Azeravtonagliat's "feasibility" calculation is based on a monthly production of 15-20,000 vehicle-kilometers of a (1) truck (25 days x 600-800 km). This is expected to generate monthly revenues of US\$ 12,000; at 0.5 loadfactor, an average income of US\$ 0.65-0.70⁷⁾ per vehicle-kilometer would -reportedly- be obtainable, implying a monthly income of at least US\$ 9,750

join.

5) old Russian trucks are given in use (not sold) to individuals(drivers), therefore the 'de facto' ownership is debatable.

6) Intercity Transporters has 7.8 ha premises with some 7,500 sq.m of covered workshop area, and there is significantly more (repair) activity (current Mtce/Repair staff of 100) going on than at the Zyk- and Alyat workshops which have come to standstill.

7) this refers to the present Azeri private road transport market (with Russia); these 'rates' are some 30% higher for refrigerator transport.

(15,000 x 0.65).

With monthly earnings of US\$ 12,000 (per truck), Azeravtonagliat anticipates that the operator would have available US\$ 5,000 monthly to service his debt, which might then be fully repaid in about one (1) year's time. At the lower income level of US\$ 9,750 per month, the operator could only repay some US\$ 2,750 per month and would require a longer repayment period (2 years).

Consultants recommend to take a critical look at some of the assumptions underlying this calculation, in particular the one on a (sustained) monthly production of (more than) 15,000 km per month, or (more than) 180,000 km per year.

At a monthly production level of 10,000 km (120,000 km/year), for example, with a revenue level of US\$ 0.70 per vehicle-kilometer, the monthly expenditure level (total cost) per truck cannot be more than US\$ 5,000 in order to reserve US\$ 2,000 for debt servicing; it will not be easy to control the monthly total cost level per truck not exceeding this US\$ 5,000 level.

Vehicle operating costs

The TACIS project on the "Baku-Astara Road Pre-feasibility Study" has estimated current vehicle operating costs, albeit in terms of economic costs only. As far as (international) HGV's are concerned, two types are of particular interest, i.e. the 'domestic' Kamaz (53212) and the 'international' articulated (5-axle) HGV (e.g. Scania 110/39).

Typical average economic vehicle operating costs were estimated in the range of US\$ 0.35-0.48 per veh.km for a (new) Kamaz, and US\$ 0.62-0.92 per veh.km for a (new) Scania. Very roughly, this would imply for a return trip Poti-Baku (1870 km), economic costs in the order of **US\$ 800**, say for 1 TEU with empty return by a Kamaz, and of **US\$ 1,450**, say for 2 TEU with empty return by a modern (West-European) articulated truck. The current financial costs may be lower due to (very) low fuel prices and local currency undervaluation, the effect of which on the (financial) costs might be larger than the taxes and duties components that need to be added.

SovAvtoBaku

Remaining from the former Soviet Union's SOVTRANSVTO (the centralised/ monopolist **international** transporter from the FSU) branch in Azerbaijan, SOVAVTOBAKU is presently the only firm with significant international road transport experience. It is registered as a *Russian*-owned firm: all assets except two terrains continue to be owned by Russia, in spite of a bilateral agreement between both governments which reportedly exists and exchanges various assets owned by both countries on the other's territory.

Consultants noticed different interpretations about the ongoing privatization process of SovAvtoBaku.

One vision is that the deal that SovAvtoBaku management has proposed --whereby a Russian Holding Company would own 20% of the shares and the remaining 80% would be sold among the firm's (Azeri) personnel (51%) and the firm's (Azeri) management, and furthermore auctioning on the open (Azeri) market-- may continue to meet with difficulties.

The shares of the Azeri branch of (former) SOVTRANSVTO, the value of which was assessed in July 1992 in many millions of Roubles, but presently worth some US\$ 3,500, are -- said to be-- in the hands of one or more Russian **individuals**. Others say, however, that this is not the case, and that the (only) problem is that SovAvtoBaku owes "rent" to SOVTRANSVTO.

If the shares are indeed in the hands of Russian owners the **State Property Committee of Azerbaijan** would (in accordance with the adopted Privatization Law) have to first buy these shares from the present owners --the Russian 'individual(s)' who obtained them in 1992-- before they can sell them to the envisaged firm's personnel and management, and/or auction them on the Azeri, open market.

Therefore, if the negotiating parties are the Azeri State Property Committee and (a) Russian individual(s), this may take a long time and the to-be-agreed price will be much higher than US\$ 3,500. If, however, the (only) problem is that SovAvtoBaku owes "rent" to SOVTRANSVTO, then the Directors of both Companies may work out a negotiated settlement of the debts and bring their joint-proposal to the Azeri State Property Committee.

- *Who, in the Azeri State Property Committee is/are responsible for- or take part in- the negotiations?*
- *Who will make an independent assessment of the current 'true' market value of the firm's assets (and liabilities) or of the existing "debts" (of SovAvtoBaku)?*
- *If the shares are still in Russian ownership and assuming that the Russian owner(s) are clearly identified (or identifiable), can both negotiating parties agree that they will accept the independent assessment as a basis for their negotiation?*
- *If there is (already) a joint-proposal from the Directors of SovAvtoBaku and SOVTRANSVTO on how to settle the "debts" of SovAvtoBaku, what could be delaying the State Property Committee's decision?*

Consultants believe that these are the (main) questions that need to be addressed in order to resolve the prevailing impasse.

SovAvtoBaku has developed plans for a Joint Venture Transport Company with the Istanbul-based Zihni Group, and for a **BIM-TRANS Distribution Centre in Baku, for which there seems to be financial support from the EBRD**, albeit under the condition that the firm (1) should be officially registered as a private firm (which seems to be blocked so far), and (2) finds foreign investor(s) that is (are) prepared to take a majority share in a Joint Venture.

Meanwhile, privatisation 'elsewhere' in the transport sector seems to proceed and it may be recommendable that the EBRD considers (also) financial support to other project(s) if the privatisation of SovAvtoBaku continues to be blocked.

Privatization in Azerbaijan (and SovAvtoBaku)

A Worldbank-supported Azerbaijan "Institutional Building Technical Assistance" Credit (project AZPA08283) that addresses --inter alia-- privatization and enterprise reform has become effective recently (March 27, 1996). A **Law on Privatization** was adopted already in 1993, but a program ("instructions") on how to implement the law was lacking and is taking off now (sector- or companies specific). The State Property Committee headed by the Deputy of the Prime Minister (Mr. Towfiq Azizov) in particular is responsible for this. Early privatization/Azerization of SovAvtoBaku would seem one of their (many) tasks (problems).

Gate East (TIR parks)

An interesting new, private Azeri company is G.E. (Holding, founded in August 1994). It runs two T.I.R. parks -and has just opened a third one- along the Baku South (Ring)road linking the "Astara"- with the "Rostov"-road.

Practically all foreign HGV's delivering to- or transiting through Baku, park (or wait for the Caspian Sea ferry) in these T.I.R. parks. The latest (3rd) site is meant primarily for empty (returning) HGV's waiting for backload. Customs declaration facilities are in the Northern (G.E. Trans 1) and the Central T.I.R. parks and other services such as forwarding (backhaul brokerage), banking (money exchange) services, insurance and warehousing are gradually implemented.

These areas, now exclusively used by foreign HGV's including some from Georgia, are also suitable for **technical servicing** of HGV's. The areas are also optimally located for peripheral warehousing, keeping the HGV's out of Baku city. A designated route linking the areas with the port/ferry terminal via some main city roads has been defined, and concerned route permits are also issued at the T.I.R. parks.

A TACIS consultant working on a Pre-feasibility Study for the Baku-Astara road rehabilitation was found studying a new (but in fact, reportedly, already 20 year old) Ringroad alignment **just North of the existing** ringroad (with the T.I.R. parks). The new alignment would go very steeply up the escarpment (coming from the Astara side), going down again near the city. This seems an economically **unfeasible** solution (moreover with great traffic safety risks) in

comparison with a reconstruction and -where/if necessary- widening of the existing ringroad.

The Gate East (Holding) Company's business development concept or philosophy seems quite realistic, in as far as the Consultants can assess the 'Azeri situation'.

Gate East's phased implementation strategy takes the following steps:

- 1- Establish a network of TIR parks, logically distributed over the country: near the borders (Georgia, Iran, Russia), at the Baku Ringroad and in-between where needed (e.g. along the main road to Georgia). With a limited investment, G.E. creates a rapidly increasing client group --the international truckers-- looking for dependable services: security & safe parking, services (some comfort) for drivers, and administrative services (customs, etc.) where required. "Service Contracts" may be concluded with (large) transport operators whose trucks/drivers frequently call at the TIR park.
 Attempt to cooperate with (selected) neighbour countries applying the same service concept, thus extending the network of TIR parks in the Caucasian (and Central Asian) Region.
 In the capital (Baku) provide --sooner (step 1) or later (step 3)-- goods *distribution* services (incl. warehousing) for combined/container transports with destination in the Baku area.
- 2- Provide repair- and maintenance facilities tailor-made to the drivers' requirements; most drivers do their own (routine) maintenance, but may need occasionally a specialist mechanic's assistance (advice) or special tools. The service should facilitate in particular *emergency repairs* including supply of spare parts, enabling the driver to continue his journey (please refer to Appendix A for recommendations on how to elaborate and implement the establishment of this type of facilities/services). Once such facilities/services are operational, "Service Contracts" may be concluded with (large) transport operators whose trucks/drivers frequently call at the TIR park.
- 3- Provide forwarding services, i.e. assisting in acquiring backhaul shipments. This is started on a relatively small scale and/or 'informally' already in step 1. With a growing network of clients/international (TIR) transporters (and some "Service Contracts" with the largest operators resulting from steps 1 and 2) this may develop towards a professional forwarding business with the use of modern data base management and communications.
- 4- Establish a (Road Cargo) Transport Enterprise, first by forming a Joint Venture with a foreign ('Western') International Transport Operator. The foreign Joint Venture partner would be attracted primarily by the services that the TIR parks in the Caucasian & Central Asian regions (see step 1) would provide, and by the repair- and freight forwarding services provided in Azerbaijan (Baku particularly, see steps 2 and 3), and maybe elsewhere en-route. The foreign (western) partner is strongly interested in low-cost drivers, security of the cargo (insurance possible? at reasonable premium?), and back-haul cargo on the stretches Central Asia/Caucasus to Turkey/Black Sea.

1.4 Armenia

The Armenian Road (Cargo) Transport sector is not (yet) privatized, and the issue of privatization is carefully considered. The Government has a Privatization Plan incorporating some 250 companies (35 were privatized in 1995; about 21 are scheduled for privatization in 1996, etc.), but the State has so far maintained a significant share in Transport companies.

Altogether three Transport Operators are internationally active: There are two (2) --still fully State-- Transport Companies involved in international transport (mainly with the Ukraine and Russia): one is the former SOVTRANSVTO-equivalent (Armenian branch), and the other has been newly established. And there is an Armenian-Irish JV International Shipping Cy. (50% State - 50% Irish private firm).

A fourth (big) Transport Company is 40% State and 60% Private, but is only operating domestically (i.a. petroleum products distribution).

Reportedly, Georgia in particular makes it very difficult, i.e. expensive, for Armenian registered trucks to operate in or through Georgian territory. A trip to Kiev (empty) to pick up a full truck load for Yerevan may have total vehicle operating costs of about US\$ 2,000, but the current actual costs may be as high as US\$ 7,000 due to the *escort* costs to be paid in Georgia, South Osetia and (sometimes) 'elsewhere' (but 'quantity discount' seems to be negotiable).

The going rate of *escort* costs in Georgia seems to be US\$ 1,000 for a loaded truck (14-20T?) and US\$ 500 for an empty (?) truck; the 'official' Georgian (customs) rates are, reportedly, US\$ 150 (de facto road tax? at other border reported to be US\$ 300?). Of course, Armenia needs to *transit* through Georgia (mainly to Russia), whereas Georgia hardly needs (now) to transit Armenia (to Iran).

Nevertheless, at least 50% of the trucks crossing the main *Armenian-Georgian* border/customs (the total crossing per day or week --unclear!-- is in the order of 60, probably 10-15 HGV per day[?], are said to have an Armenian registration, although the Armenian share seems to be decreasing lately). At the (2) other border crossings, there are 1-2 and some 10 (smaller) trucks per day crossing the border; a military people run private transport company seems to be quite dominantly present at the Armenian-Georgian border (only a rumour?)

Relations between Armenia and Turkey may gradually improve: a first sign is an agreement on a bus service Istanbul-Yerevan (Istanbul-Yerevan v.v. with Turkish Mercedes; Yerevan-Istanbul with Ikarus). The border is closed now, but two (direct) routes seem to be under consideration; apart from some direct cargo transports through Georgia, there is transshipment at the Georgian-Turkish border (pay in Batumi for use of facilities) from Turkish to Armenian trucks.

The number of trucks crossing the Armenian-Iranian border is significantly higher, between 150 and 200 per day (two ways). There are three types of road transport: (i) Iranian trucks deliver in Armenia, (ii) Iranian trucks enter Armenia but transfer load to Armenian trucks across the border and (iii) Armenian drivers go across the border to Iran, drive the truck to Armenia and hand over the truck to another Armenian driver(?)

Inter-State Transporters (Ex-Soyus Vnes Trans/Armenia)

The remains of the Armenian branch equivalent of SOVTRANSVTO is in fact the only company with significant experience in international (Inter-FSU State) transport.

The main export products (by road) are presently: scrap metals, metal alloys and wines (cognac).

The economic depression and the blockade have decreased the Company's level of activities to 98,700 tons transported in 1995, representing some 71.7 million tonkilometres (average haulage distance 720 km); an average of 80 trucks in operable condition (out of 122 owned) made some 800 trips (average load/trip 12.4 tons). A current (typical) assignment is the transport of 300T of molybdeen to Rotterdam, which the company will, however, haul to Russia only where it will be transshipped to (larger) trucks accepted on the European roads.

Lack of good tyres (sizes 900/Kamaz, 1000/Trailer, 1100/Supermaz) is a huge problem. Both new tyres and retreads are manufactured in Yerevan, but the quality is very low; the new ones seem to last not more than 25,000 km under the prevailing condition of *bad roads* --*mainly potholes*-- and heavy (over)loading. In the case of retreads, the tyre's carcass must of course be in a good condition in order to facilitate a quality rubber cover.

International Road Transport Enterprise

This is a newly established international transport company (Manager Mr. Felix S. Hovhannissian), founded on the remains of the main Yerevan area transport company of the former State Transport Ministry. In 1989 they were transporting/distributing some 225,000 tons/year, producing about 5.5 mln tonkms (average haulage distance 24.5 km) in the Yerevan region (predominantly meat and dairy products, also vegetables in the summer); their turnover in monetary terms was Rb 3.7 mln (when the Rouble still was valued higher than the US\$), and they operated a fleet of about 300, mostly small trucks (0.5 - 5 T payload).

In 1995, they carried 14,100 tons and produced 771,400 tonkms; 11,800 tons/year carried locally (i.e. 221,000 tonkms, average haul almost 20 km) and 2,300 tons carried over longer distances (i.e. 550,000 tonkms, average distance almost 240 km). most of the longer distance haulage was to Nagora Karabagh, but there was/is also some transport to Russia or Ukraine. Not more than about 30 vehicles are involved in today's transport activities: 5 Supermaz (the 'youngest' acquired in 1990), 1 secondhand Czech (Mercedes) tractor, 22 trailers; and 6 Maz of 10T and 19 of 14-20T load capacity.

The past (disciplined) maintenance practice (TO-1 by 1 mechanic/2 manhours; TO-2 (every 10,000 km?) by brigade of 4-5 during one day/36 manhours) has completely gone, due to the combination of infrequent, irregular haulage and lack of income; inspection before/after any long trip, TO-1 treatment and (major) repairs *ad hoc* whenever needed is the current practice (including, of course, preparations for the *winter*, whereas there used to be a winter maintenance schedule). This company used to have 40-50 mechanics, now there are about 5 active.

Armenian International Shipping Company Ltd. (ARMIS)

The Irish registered Cy. UNITRANS and the Ministry of Transport established this Joint Venture (50/50%) for Shipping and Forwarding. Whereas the Arab Emirates presently are a main trade partner of Armenia (together with Iran, e.g. M & M), there is a close cooperation with United Arab Shipping Cy. which is also represented in the (5) capitals of the Central Asian Republics (ARMIS acts as a receiving agent). There is a significant container flow Bandar Abas-Armenia (border and across?).

ARMIS promotes the route between Armenia (*Yerevan*)-Turkmenistan (*Ashkabad*) through Iran by road, avoiding the Caspian Sea crossing which is time consuming and costly (US\$ 2,500 two ways), as well as the Azeri road tax; a rate of US\$ 3,800 (free on truck Yerevan) is offered, including all Iran transit expenses.

ARMIS looks forward to Transit-Armenia deals, e.g. Poti (Georgia) via Yerevan to the Central Asian states, via Iran; sofar they have handled only Armenia-originated goods. Transshipment in Armenia --of cargo brought by (West) European transporters-- would reduce their (presumed) empty back haul distance. Foreign (non-Iranian) cargo hauliers wishing to transit Iran (to Central Asia) are currently required to leave a US\$ 5,000 deposit at their Iranian point of entry.

There are two other positive developments in Yerevan which may help promote Yerevan as a "transshipment hub". One is the creation of a modern multi-modal cargo terminal at Yerevan Airport, expected to become operational by the end of 1997. The other is the opening of a Midland Bank branch (on 1 March 1996), facilitating all required international banking operations/services.

Road conditions in Armenia

A Worldbank-assisted Armenia Highway project (ID # 7ARMPA013/AMPA35765) will help rehabilitate and preserve (1131 km of) the State Highway road network (altogether 7,800 km). The project objective, also aiming at putting the Armenian Road Union (ARU) on a solid institutional footing, may be achieved by the end of the century. Only on the medium term (1998-) will the first positive effects --in terms of significantly reduced *Vehicle Operating Costs*-- be felt in practice by the road cargo haulage industry.

Simultaneously, a system of levying user charges (petroleum tax, license fees, road tax possibly) will have to be introduced and sustained (it will be difficult to be put into effect in the present depressed economic conditions) in order to secure the funding for the network preservation.

Clearly a balance need to be found between (i) spending for new/rehabilitated roads with an adequate level of maintenance expenditure (direct route Yerevan-Batumi; routes to Turkey on the somewhat longer term?), (ii) the development of effective road maintenance organizations, (iii) improvement in road (maintenance) planning and programming processes, and (iv) an adequate level of road user charges (financing).

2 ANNEX A.2 - CARNET TIR AND IRU

2.1 Azerbaijan

Problem area no. 2 --joining the Geneva Convention on T.I.R-- was discussed and approved by the Parliament and the Government has decided to join the Convention. Whether any concrete follow-up action at U.N. level (e.g. by the Azeri Ministry of Foreign Affairs) had already been taken, could not (yet) be confirmed.

Consultants advised that it usually takes (more than) a year after joining the Convention until Carnets T.I.R. will actually be available for sale in the (new member) country (inspite of 'official' statements that this period is 6 months). The Republic of Georgia, for example, signed the Convention on 24th September 1994 and only recently (since February 1996) the national association GIRCA has (200) Carnets T.I.R. available for sale. Armenia signed the Convention even earlier (on 8 June 1994), and is currently (April 1996) establishing the national association, that will then be able to sell Carnets T.I.R. to its members.

It will be important for Azerbaijan (the national association ABADA) to participate in the IRU-organized ("in-country") training sessions for familiarization of Customs (officials), Transport Enterprises, etc. with all "ins and outs" of the Carnet system.

2.2 Georgia

Considering the 3 Caucasian Republics, at present a TIR transit operation can be (officially) established only with Georgia (Armenia may follow soon). GIRCA had sold some 25 carnets TIR (of the 200 they acquired from IRU) by mid April '96.

2.3 Armenia

The "Open Shareholder Association" of International Road Cargo Transport Operators, or shortly "TIR Board Armenia", was recently established with an authorized (starting) capital of US\$ 50,000.

The State participates with 75%, notably the Ministry of Transport (35%), the Customs Department (25%), the Ministry of Internal/Home Affairs (Road Police; 5%) and the Ministries of Trade and Agriculture (also 5% each). These participants have members in the Supervising Board, while the Deputy Minister of Foreign Affairs also participates in the Government Commission creating the Association, facilitating the necessary international negotiations (IRU, Geneva, etc.).

An *Executive Committee* will carry out the day-to-day work; its (independent) Executive Director is Prof. Razmik Javachian (Dean of the Engineering Faculty of the Polytechnical Institute).

The Board/Executive Committee intends to put out a tender for parties interested in acquiring the 25% 'publicly' available shares.

The present concept reflects the (firm) grip that the State considers to maintain on the (road) transport sector, at least in the near future.

Within the Customs Department, a special group has been created already for servicing the TIR processes (being equipped with new computers, computer network and E-mail).

2.4 General

A recent development creating some tensions in the international road transport scene is the international insurers dissatisfaction with the security and efficient functioning of the TIR transit regime (concerning alcohol & tobacco in particular?); the international insurers would only be prepared to continue their insurance coverage if 'additional' short-term measures are implemented by Customs authorities.

IRU is, therefore, presently attempting to introduce a system --data collection and processing of (returned) Carnets T.I.R.-- for clarifying (first) origin and (final) destination of a (any) Carnet, which will also (some years later) provide the information on the goods carried and the countries transited with specific cargoes. (Ref. "Introduction of a Control System for TIR Carnets" - Recommendation adopted by the Administrative Committee for the TIR Convention 1975, on 20 October 1995).

This will require dedicated coordination and cooperation between Customs authorities and national (guaranteeing) associations.

The next UN Conference on Transport and Environment (to be held in autumn 1996 or in autumn 1997) is expected to approve three 'binding' documents:

- amendments to the Vienna Convention on Road Traffic: inserting provisions on environmental standards of vehicles;
- inspection of vehicles used in international traffic;
- mutual international recognition of inspection certificates.

3 ANNEX A.3 - OTHER RELATED TRACECA PROJECTS

The relation of the present IRTS-Caucasus project with (six of) the other TRACECA projects are briefly summarized hereafter.

1) TRADE FACILITATION, CUSTOMS PROCEDURES & FREIGHT FORWARDING

The former Soviet Union controlled, from Moscow, internal and external trade policy, customs administration and practices, membership of international conventions, collection of statistics, etc. Independent trade facilitation, e.g. freight forwarding and customs agencies did not exist. Freight forwarding organisations are attached to transport operating companies, and are largely unimodal. Execution of banking and insurance operations (in accordance with INCO terms) is 'new'.

Considerable congestion at some border crossings has been observed! Harmonised customs procedures/trade documentation (conventions and model contracts) needs to be set up. Promote Customs Agent/Freight Forwarding Associations.

Main tasks:

- **Design Standardised Trade Documentation package** (in coordination with Transport Legal Reform project).
- **National trade data transfer** system for Customs Service (internal operational needs initially).
- **Surface Transport Customs Control points** problem analysis and improvement proposals.
- **Design of a Regional Freight Forwarding Multi-modal Operation** as a pilot demonstration (e.g. regional transshipment of containers or groupage operations; a *business plan*).
- **Seminar(s) on international trade documentation** for i.a. freight forwarders and trainers of transport professionals. (insurance and banking will not or hardly be addressed!)

Checklist:

- relation/cooperation/contacts between customs authorities and freight forwarders?
- principal surface transport control points?
- national trade/freight forwarding association?
- customs services and modern data control methods?

2) LEGAL & REGULATORY FRAMEWORK

Legislation (inventory) includes previous USSR laws, new Russian Federation laws,

Republic laws, and International laws or conventions.

Main activities:

- **Introduction of legislative changes to national transport laws & regulations** (right to transport; terms & conditions of transport; role of various public/political regulatory bodies; rules applicable to private enterprises and private operators; relationship between national legislation and international conventions).
- **Regulation of technical components in the transport sector** (normalisation of technical equipment)?
- **Creation of Legal/Institutional Environment** (revision of customs legislation; simplifying customs -and banking- procedures; adopting harmonised international documents; encouraging private sector professional associations; updating banking & insurance activities framework).

International (ITF) and National Task Forces (NTF): (local) legal professionals and transport authorities, presenting draft legislation to legislature (incl. documentation, model legislation, computer equipment and databases). Refer to schedule on (individual republics') specific legal reform needs.

3) REGIONAL TRAFFIC FORECASTING MODEL (& REVIEW OF INTERNATIONAL ROUTE CAPACITY)

Transport demand declined, East-West transit links are little exploited and North-South links turned discontinuous at old FSU borders. Rail sector is losing market share to road transport. Interest in (preference for) developing national systems may yield restrictive regulation of cross-border transport and trade.

Main elements:

- **Common Regional Database(s), compatible with EUROSTAT and CETIR (Central European Transport Information Reporting):** transport & trade flows, transport infrastructure (characteristics), transport costs.
- **Identify best positioned centres for development of multi-modal transfer nodes** (incl. maritime links, e.g. Caspian sea, Black sea, IWT): volumes of flows through these nodes. Port traffic to be forecast by product category (Poti, Batoumi, Baku & Aktau/Krasnovodsk). Competition among corridors?

4) FORWARDING-MULTI MODAL TRANSPORT SYSTEMS

Technical assistance for intermodal (rail) transport development, particularly of container (intermodal) transport (advantages of containerisation, marketing for intermodal services).

Main activities:

- **Set up an intermodal freight transport group** (specific rail corridor, existing

intermodal platform?

- **Case study** (marketing organisation for promotion & sales of intermodal transport 'product'; market survey intermodal container moves; road feeder services [Armenia]; determination of market-based tariffs; design of terminal infrastructure, handling equipment and train/road delivery services; single documentation and waybilling systems and accounting).

5) IMMEDIATE TRAINING ACTION

For (a) senior level management and (b) sectorial training of trainers (representatives from Ministries of Transport, road & port authorities, shipping lines, haulage companies and trade facilitation organisations). Get acquainted with all phases of contracting exercised in the trade or transport sector. Visits to (EU) forwarding and logistics companies & transport/shipping operators (road/combined).

6) IMPLEMENTATION OF PAVEMENT MANAGEMENT SYSTEMS

Classified traffic counts have been (systematically) carried out in the past; coverage has possibly diminished (organisations for collection/processing of traffic data exist). Sufficient axle weight measurements must be performed (coordination with Regional Traffic Forecasting Model).

Meanwhile, Project Managers of the following, most relevant projects were met (in the field, in Tbilisi and Yerevan respectively):

- Traffic forecasting Model
- Forwarding/Multi-Modal Transport System
- Trade Facilitation, Customs Procedures & Freight Forwarding
- Legal & Regulatory Framework.

4 ANNEX A.4 - JOINT VENTURE POTENTIAL AND LEASING OF (2ND-HAND) HGV's

The (Netherlands) Truck Manufacturer (DAF) has sold some 700 HGV's on the Russian market (the largest operator has 125, but there are also many one-truck operators). Financing is a problem; it used to be on 100% down payment, but that's out of the question today. DAF can offer a "cross-border" leasing arrangement with 30% down payment and 4 years leasing (the truck is depreciated in 4 years and then transferred to the owner at a symbolic US\$ 70; and can subsequently be used normally another 4 years. The "NCM" --Netherlands Credit Insurer-- provides a 'guarantee' for 90% of the amount involved with 10% 'regress' on DAF. However, "NCM" applies a list of "eligible" countries, and the Caucasian Republics are probably NOT eligible (to be checked!), because there is **NO LEGISLATION yet ON LEASING. The concerned republics should, therefore, include the proper legislation on leasing in (perhaps) their "Law on Privatization".**

DAF deals itself in 2nd-hand trucks, most likely on a more competitive (and more client-friendly) manner than the typical 2nd-hand truck dealers (dealing in all kinds of makes). It has not yet (seriously) considered offering the 2nd-hand HGV's in leasing arrangements; DAF (of course) prefers to sell or lease new trucks, but in situations with (initially) limited purchasing power they seem willing to consider this option (but leasing has to be legally regulated in the recipient country!).

As long as leasing is not yet legally regulated, the following arrangement may be worked out: DAF supplies the (2nd-hand) HGV to "Leaseplan" who leases the HGV to the Netherlands Joint Venture partner (Truck operator) who gives the vehicle in operational use to his (Caucasian) partner.

Netherlands International Transport Firms, operating mostly with DAF Trucks --and operating for quite some time in the FSU- are i.a. "van der Wal", "Heezik", "Centrum Transport" and "Rijnaart". Some of these firms (certainly "van der Wal") may be interested to form Joint Ventures with Caucasian entrants to the international transport market and apply the 'leasing model' sketched above. In such cases, DAF seems to be prepared to invest in the technical support facilities/logistics (mobile workshop, specialised tools, satellite-communication, etc.) and associated training.

Similar arrangements may be (probably are already being) worked out in other EU member countries, linking their international transport- and truck manufacturing industries in JV arrangements with i.a. the Caucasian Republics.

A first Proposed Draft Schedule Visit "Road Cargo Haulage Operators" has been prepared, with an alternative schedule:

- Day 1: Fly Amsterdam-Istanbul (on a Sunday?)
- Day 2: Fly Istanbul-Baku, arrival approx. 15.15 hours
17.00-19.00: Presentation on relevant (road transport) Legislation: Privatisation, Leasing, etc. followed by diner (3-4 interpreters required!)
- Day 3: 9.00-13.00: Visit Transport Companies: SovAvtoBaku, Azintrans, Intercity

- Transporters & Gate East (plus ?)
 13.00 - : lunch followed by individual meetings concerning specific interests, 'business possibilities' discussions in depth (unto 4 interpreters may be required!)
- Day 4: 8.00: Departure by road vehicle to Georgia (Tbilisi), via Alyat Workshop and Gate East T.I.R. facilities along the way to the border with Georgia (to be arranged with Gate East!)
 16.00: Azeri-Georgia border crossing (pick-up by Georgian transporter at the border), proceed to Tbilisi
- Day 5: 9.00-12.00; Visit Transport Companies/Forwarders: CautrexTrans, TbilTransExpedition (plus?)
 12.00-14.00: Presentation on relevant (road transport sector) Legislation: Privatisation, Leasing, etc. followed by lunch
 15.00 - : individual meetings concerning specific interests, 'business possibilities' discussions in depth (3-4 interpreters required!)
- Day 6: If required, some time (in the morning) for follow-up discussion (or site visit)?
 Departure: Fly Tbilisi-Amsterdam or Frankfurt (or via Moscow?).

If there is serious interest from the Armenian side, an Armenian delegation may be invited to Georgia (Tbilisi) to participate on day 5/6, and possibly make individual, further arrangement with particular member(s) of visiting group.

Summary: Arrive on a Monday (afternoon) in Baku, spent 2.5 days in Azerbaijan, followed by some 2 days in Georgia; depart on Friday (midday?).

An *alternative* schedule, **including a visit to Armenia**, might be as follows (with programs in each country as indicated before):

- Day 1: Fly Amsterdam-Yerevan (on a Saturday)
 Day 2/3: Program in Armenia (Sunday/Monday)
 Afternoon Day 3: By road Yerevan-Tbilisi or
 Day 4: Fly Yerevan-Tbilisi (early Tuesday morning)
 Day 4/5: Program in Georgia (Tuesday/Wednesday)
 Day 6: Travel by road Tbilisi-Border Georgia/Azerbaijan-Baku (Thursday)
 Day 7: Program in Azerbaijan (Friday) with opportunity to extend to Day 8 (Saturday)
 Day 8/9: Fly Baku-..... (Saturday or Sunday).

5 ANNEX A.5 - ROAD (FREIGHT) TRANSPORT REGULATIONS

The *Georgian* Road Transport Department has prepared a plan for introduction of road motorvehicle licenses for professional (goods or passenger) transport operators combined with "travel cards" or "waybills". Licenses would be issued for limited periods (maximum 3 months) only, and the license with a registration number would be accompanied by numbered travel cards/waybills, whereby these latter numbers would also be printed on the license.

Every goods shipment requires its travelcard/waybill on which origin, destination, tonnage carried etc. must be noted. In order to obtain a next license, the transport entrepreneur must first go to the *Taxation (branch) Office*, show all of his travelcards/waybills (the filled out/used ones as well as the unused ones), pay his tax dues based on the assessment made of his income/turnover, and get his license officially stamped. On presentation of the stamped/certified past license at the Department of *Road Transport (branch) Office*, a new license with associated travelcards/waybills can be purchased.

The Department stated to be able to implement this licensing system (for goods road transport) within two months after approval of the scheme by the President.

As far as taxation of (private) road transporters is concerned, there is of course a range of possibilities:

- tax vehicle ownership and/or *entry* to the transport market (license);
- tax vehicle operation through road user charges (license fee, road toll, tax or surcharge on fuel price);
- tax on entrepreneur (financial) performance (tax on turnover and/or profit).

5.1 Human resources availability

Availability of skilled human resources is probably the main comparative advantage of the Caucasian republics; (senior) managers from the former SOVTRANSVTO and/or from the former State Ministry of Transport are seeking to assemble remnants from 'their' former transport enterprises-cum-workshops. They attempt to start international road transport to neighbouring countries and eventually to West Europe.

Drivers and mechanics with great experience to keep the FSU-made HGV's running are abundantly available; many are 'de facto' one-vehicle driver-owner 'companies' working for Forwarders who appreciate the sense of responsibility of the driver-owner for his vehicle. The introduction of modern HGV-technology should not be a problem, given the available technical background, but concerted training efforts (familiarization with new technology) will certainly be required.

The former State Ministry of Transport managers show a clear preference for the road transport **operations**; there seems (sofar) little interest for the policy-making and -supervising role of a (western type) Ministry of Transport. Two possible (main) reasons for this are:

- they feel that there are better chances for 'survival' in privatised transport companies, familiar as they are with the *operational* aspects of (road) transport;
- they see little perspective (and salary) as an MoT-bureaucrat (only) while being unfamiliar with transport policy-, law- and regulations-making which all used to be "Moscow"-made.

MoT Institution Building (see also the previous section) will not only require a comprehensive training-on-the-job program, but also a reasonable salary structure and career perspective in order to attract 'dedicated bureaucrats'.

5.2 Road transport demand projections

Future transport flow projections, both for 'external' goods flows to and from the Caucasian republics (imports & exports) and for 'internal' goods flows within each of the republics (domestic cargo transport), are extremely difficult to make, because

- historic economic activities and -relations are almost completely destroyed;
- new patterns of economic development and -relations are emerging (very) slowly, but -at the same time- with "shocks".

The "classic" (western style) computerized (goods) transport forecasting models are not likely to provide the required information. What seems to be needed most, are in-depth *Product Studies*, identifying new, promising products and (new) markets for them.

In the short term, the import flows of the Republic's *dual* economies (humanitarian aid for 'the poor', and the more luxury consumption goods for 'the rich') will strongly dominate, hopefully followed soon by (again mostly import) flows bringing the goods for the development/investment projects.

Among the Caucasian (road transport) *Forwarders*, there is confidence in a rapidly growing international road transport market. As already mentioned, first there is the Humanitarian Aid flow which may continue for considerable time to come (next 3 years at least?); next there is the prospect of large development projects in both the Caucasus and Central Asia, calling for significant import flows -and presumably many 'specialised' transports- during the next (10?) years. Quantification of these flows in particular, would be a useful contribution of the "Forecasting Project".

The (trans-) Caucasus cargo flows will be highly *imbalanced*, West-to-East (Black Sea/Turkey and Iran respectively to or through Baku) with initially minor return flows only (East to West and North to South). But Humanitarian Aid- and Development/Investment Projects "providers" are believed to pay good rates for long distance transports: they consider reliable (sure and safe/undamaged) and (just-)in-time arrival rather more important than obtaining the lowest possible transport rates.

Present average daily truck traffic (HGV) at the Turkish-Georgian border (Sarphi/Batumi) is reportedly in the order of 250-300 (both ways), whereas on the Iranian-Azeri border (Astara) it is about 200-250 (HGV); near Baku, however the ADT (HGV) is said to be 600-700 (incl. the HGV's from/to the West).

Data sources for import (and export?) flows during recent years (1994 & '95) are BCC (Business Communication Centre) in Georgia, while in Azerbaijan the firm(s) running the "TIR parks" near Baku collect such data; it is up to the "Forecasting Project" to see whether anything useful can be done with such (flows) data.

At the base (detailed) data level, they may be useful for analysis of current (foreign) shipment practices.

6 ANNEX A.6 - FIRST DRAFT BUSINESS PLAN PREPARED BY/WITH JOINT STOCK COMPANY T..

The company is independent (not state) and has the 'private' judicial status; 51% of the shares are owned by and the remaining 49% by

It owns about 5 ha of terrain (with some 4,000 sq.m covered technical service- and repair facilities and some 1,500 sq.m of four-storeyed office) close to the Tbilisi Ringroad at the North-Western side of the city; it also has an office near the city centre (1,200 sq.m in two-storey building).

The company has 20 Maz tractor/semi-trailer combinations and has cargo transporting experience within Georgia and the former Soviet Union (FSU).

It now seeks any opportunity to obtain and operate some 20 second-hand European-manufactured tractor/semi-trailer combinations (e.g. DAF-85 or equivalent) in order to enter the international road transport market.

A tri-partite arrangement, for example a cooperation with both one (or several) European transporter(s) using one particular truck-make, and the concerned truck manufacturer, might be an option worth considering. If the number of 20 vehicles for a start is considered too ambitious, a smaller number might be considered but the following financial exercise ('business plan') is based on 20 secondhand vehicles with a remaining lifetime of 3 years and some 250,000 km. The assumption is that these could be obtained for US\$ 32,500 per unit.

- 1) The required capital outlay for the 20 HGV's is US\$ 650,000;
- 2) In order to prepare the operational staff (20 drivers plus 5 mechanics/ engineer) an investment in training of US\$ 200,000 is estimated to be required;
- 3) For spare parts (3 years) some US\$ 300,000 (incl. US\$ 240,000 for tyres) should be reserved;
- 4) Some US\$ 50,000 may be needed for 'miscellaneous' costs, including the establishment of business relations with agents (Forwarders) in Europe.

The total capital outlay will then be US\$ 1,200,000.

The 20 HGV's are estimated to make 240 trips Caucasus-West Europe per year. HGV's are estimated to run 84,000 km/year (average) with 40,000 km/year **loaded**, carry 20 tons/trip (240 ton/year), and thus produce 800,000 ton-kilometers/year.

The estimated annual income (turnover) per HGV is estimated at US\$ 72,000 (US\$ 1.8 per loaded km).

The following expenditures (per HGV) are anticipated:

- 20% tax to be paid to the State: US\$ 14,400;
- the driver will be paid about US\$ 11,600;
- fuel consumption will be about 25,200 litres costing some US\$ 15,000 (at average diesel price?);
- oil/lubrication costs will be in the order of US\$ 1,500;
- road and other taxes to be paid (in Europe) are estimated at US\$ 6,000;
- depreciation may be taken at US\$ 6,500 (9% of annual turnover);
- overheads (incl. insurance & commission to be paid to the agents) will be some 12% of the total direct costs of US\$ 55,000, say US\$ 6,600;

This totals US\$ 61,600 plus 5% unforeseen (US\$ 3,100) = US\$ 64,700, leaving a profit (per HGV) of US\$ 7,300; there is 20% tax on profit to be paid, i.e. US\$ 1,460, leaving a net profit of US\$ 5,840 per HGV/year.

From the estimated annual revenue per HGV, there is US\$ 12,340 available from depreciation and (net) profit. The company proposes to use approximately 70% of this amount, say US\$ 8,600 per HGV per year, for repayment of debts.

For 20 HGV's, total annual debt repayment will be US\$ 172,000, implying that it will take considerable time to service the debt (US\$ 1,200,000 plus interest?).

Without a 'development grant' component and soft loan conditions, it will be almost possible to achieve a financially viable situation.

It may be possible to provide the Caucasian transporter with some 'load guarantee' by assuring a certain share in the Humanitarian Aid (road) transports and (later) in the Development Projects (road) transports; the various Donors financing the Aid/Development Programmes are in a position to assist the Caucasian international transporters in this respect, e.g. by incorporating such arrangements in the contracts with the concerned suppliers.

7 ANNEX A.7 - FIRST DRAFT BUSINESS PLAN PREPARED BY/WITH JOINT STOCK COMPANY K.....

The company is independent (not state) and has the 'private' judicial status; 51% of the shares are owned by and the remaining 49% by

The company proposes to start the exploitation of services for (foreign) HGV-drivers in combination with a "T.I.R. park" in Tbilisi. A network of facilities in Batumi/Sarphi (customs office at border of Turkey & Georgia), Poti (the main container port) and Tbilisi shall be operated in a coordinated way.

The following services will be provided:

- route information (to destinations, to TIR parks, to forwarders, etc.)
- information on latest (road transport) regulations in Republic
- documentation verification assistance
- provision of safe parking in protected area;
- vehicle washing facilities;
- HGV technical service- and repair facilities;
- provision of fuel (diesel), oil and other materials;
- lodging/bathing facilities for drivers;
- restaurant/canteen facilities for drivers;
- cloth-washing facilities for drivers;
- telecommunication services (telephone, fax, photocopying);
- medical service arrangement;
- foreign currency/money exchange;
- despatch- & warehousing (local distribution) services;
- customs clearance of import/destination Georgia/Tbilisi goods.

Contracts with interested foreign **firms** involved in regular transport to/through the Caucasus, may be concluded on a quarterly or annual basis.

The estimated investments (capital outlay) needed is estimated at US\$ 100,000, to be used as follows: (next page)

City	1. Tbilisi	2. Batumi	3. Sarphi	4. Poti	TOTAL
Computer, printer, modem	2,400	2,400	2,400	2,400	9,600
Fax	600	600	600	600	2,400
(Mini) copier	400 1,800	400	400	400	1,600 1,800
Radio telephone	220	220	220	220	880
Telephone	160	160		160	480
T.V.	400	320	250	320	1,290
Electric Generator	2,500 (5 Kw)	2,500	800 (1 Kw)	2,500	8,300
Office rehabilitation	3,200	1,800	1,800	1,800	8,600
Microbes central office	7,000		7,000		14,000
Lodging accommodation/rehab	18,000 (50 pers)	7,000 (20 pers)		7,000 (20 pers)	32,000
Canteen accommodation/rehab	4,500	2,200		2,200	8,900
Medical assist point	900	900		900	2,700
TOTAL	42,080	18,500	13,470	18,500	92,550

Incl. some 7.5% for Miscellaneous (e.g. Internet modem for Tbilisi centre), the estimated total for 'investment' is US\$ 100,000.

The annual (first year) Operation (running) costs are estimated as follows (next page):

City	1. Tbilisi	2. Batumi	3. Sarphi	4. Poti	TOTAL
Computer program & service	3,000 200	200	200	200	3,000 800
Fax/Tel. subscrip-tion/tax	3,000	3,000	3,000	3,000	12,000
Fax use	4,500	2,700	3,600	2,700	13,500
Copiers use	450	100	100	100	750
Radio tel. subscrip-tion/tax	800	800	800	800	3,200
Telephone subscription	180	180	180	180	720
Electricity bills	7,800 (120,000 KWh)	5,120 (80,000 Kwh)	1,280 (20,000 Kwh)	5,120	19,320
Water bills	4,000 (20,000 m3)	2,000 (10,000 m3)		2,000	8,000
Electric generator	800	800	800	800	3,200
Initial Fuel stock	4,000 (20,000 l)	2,000 (10,000 l)		2,000	8,000
Initial oil stock	2,000 (1,000 l)	1,000 (500 l)		1,000	4,000
Canteen start capital	1,200	500		500	2,200
Salaries	60,480 (28 pers)	23,040 (12 pers)	11,520 (6 pers)	23,040 (12 pers)	118,080
TOTAL	90,050	42,320	21,280	42,320	195,970

Incl. some 2% for Miscellaneous, the estimated total cost -excluding the (further) procurement costs of fuel/oil/spares & food/drinks- is US\$ 200,000/year. Fifty percent (50%) of this amount (US\$ 100,000) might be borrowed as 'working capital', so that the initially required amount will total US\$ 200,000.

The annual (first year) Revenues are estimated to be as follows:

City	1. Tbilisi	2. Batumi	3. Sarphi	4. Poti	TOTAL
HGV per day & per year	100 30,000	20 6,000	60 18,000	30 9,000	63,000
No. obtaining info/year at US\$ 1	21,000 21,000	4,200 4,200	12,600 12,600	6,300 6,300	44,100 Expected net profit US\$ 4,410
No. parking nights at US\$ 3	21,000 63,000	3,000 9,000		6,300 18,900	Expected net profit US\$ 18,180
No. serviced/repaired at US\$ 20	3,000 60,000	300 6,000		450 9,000	Expected net profit US\$ 15,000
No. washed at US\$ 5	9,000 45,000	1,200 6,000		1,800 9,000	Expected net profit US\$ 12,000
Fuel sales (litres) at US\$ 0.2	2,400,000 480,000	120,000 24,000		720,000 144,000	Expected net profit US\$ 64,800
Oil sales (10% of fuel sales)	48,000	2,400		14,400	Expected net profit US\$ 6,480
Lodging nights at US\$ 5	21,000 105,000	3,000 15,000		4,500 22,500	Expected net profit US\$ 28,500
No. of meals, etc. at US\$ 7	21,000 147,000	3,000 21,000		4,500 31,500	Expected net profit US\$2 29,925
No. of Telecom uses at US\$ 5	15,000 75,000	1,800 9,000	9,000 45,000	4,500 22,500	Expected net profit US\$ 15,150
No. of medical services uses at US\$ 0.5	6,300 3,150	1,200 600		1,800 900	Expected net profit US\$ 930
Miscellaneous services					
TOTAL Turnover	1,047,150	97,200	57,600	279,000	US\$ 1,480,950
Profit					US\$ 195,375

Of an expected total turnover of almost US\$ 1.5 million/year a net profit -after subtraction of the cost (US\$ 200,000, ref. previous table; and procurement cost of raw materials; and taxes)- is expected of US\$ 195,000 (13% on turnover); some 36% of the expected profits would originate from selling fuel/oil and some 30% from lodging, meals, etc.

This implies that the initial debt (US\$ 200,000 borrowed) can be repaid rather quickly, within 2 years if about 70% of the net profits is earmarked for debt servicing.

When undertaken in combination with the other project (secondhand HGV acquisition, ref. Annex A.6) -e.g. by the same holding company- this project could contribute significantly in the debt servicing of the HGV-fleet renewal project, starting in year 3.

ANNEX B

DHV Consultants BV

***TRACECA - Improvement
of Road Transport
Services***

TACIS

*file k.4249.01.001
date 10 June 1996
registration number*

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Project title: **Improvement Road Transport Services (Caucasus)**

Project no. **Traceca 94P508**

Country: Armenia, Azerbaijan & Georgia

Page 1

Planning period: January - November 1996

Prepared: April 1996

EC Consultant: DHV Consultants

Project objectives: To facilitate development of the domestic and international road transport industries within the Receiving States

No. MAIN ACTIVITIES	TIME FRAME: 1996												INPUTS PERSONNEL - Manweeks	OTHERS Trips/Flights
	January	February	March	April	May	June	July	August	September	October	November	Total		
1. General tasks													2.0	4
2. Discussions with relevant Agencies/Enterprises													10.0	5
3. Identification of potential JV - interested parties													3.5	2
4. Preparation & organisation of 'Business Group' visit													5.0	1
5. Analysis of comparative advantage of TRACECA Corridor (Caucasus)													4.0	1
6. Advising on Business Plan preparation (**)													7.0	3
7. Advising on Repair/Mice Workshops (IIR parks) modernization (**)													3.0	1
8. Advising on Road Transport Department (Re -)Organization													3.5	1
9. Advising on road transport taxation, licensing & tariffs (**)													4.0	1
10. Conclusions & reporting													4.0	1
(**) Subjects to be presented/discussed in Seminar(s)													46.0	24

STAFF ASSIGNMENT SCHEDULE

Project title: **Improvement Road Transport Services (Caucasus)**

Project no. **Traceca 94P508**

Country: Armenia, Azerbaijan & Georgia

Page 1

Planning period: January - November 1996

Prepared: April 1996

EC Consultant: DHV Consultants

Project objectives: To facilitate development of the domestic and international road transport industries within the Receiving States

No. MAIN ACTIVITIES	TIME FRAME: 1996												INPUTS PERSONNEL	OTHERS Trips/Flights	
	January	February	March	April	May	June	July	August	September	October	November	Total			
1. Project Manager (KBr)													58	35	4
2. Road Transport Operations (HdB)													55	17	4
3. Repair/Mice Truck Fleet (DH)													17	6	2
4. Researcher/Business Missions & Business Plan Coordination (Evd)													40	27	2
5. Road Transport Department (Re -)Organisation (NN)													20	10	1
EC CONSULTANT EXPERTS:													190	95	13

KBr K. Broersma
HdB H.J. de Breet
DH D.D. Hoekstra
Evd E. van Garderen
NN to be nominated

PLAN OF OPERATIONS FOR THE NEXT PERIOD (Work programme)

Project title: **Improvement of Road Transport Services (Caucasus)** Project number: **Traceca 94P508** Country: **Republics of Armenia, Azerbaijan & Georgia** Page:

Planning period: **6/1996 – 11/1996** (9/1996 – 11/1996 PROVISIONAL) Prepared on: **31.05.1996** EC Consultant: **DHIV Consultants, The Netherlands**

Project objectives: Facilitate development of the international (and domestic) road transport industries within the Recipient States. Assist viable private (to be privatized) autonomous operators in gaining a market share of international transport.

No.	ACTIVITIES	TIME FRAME: 1996 (months)					PERSONNEL		EQUIPMENT & MATERIAL	OTHER Trips/ Flights			
		6.	7.	8.	9.	10.	11.	EC Consultant (manweeks)			Counterpart (manweeks)		
1	General Tasks												
2	Liaison with Recipient Agencies/Enterprises		X-----X		X-----X								
3	Identification of potential JV-interested parties	X-----X											
4.a	Preparation of "Business Group" visit	X-----X											
4.b	Implementation of "Business Group" visit				X-----X								
5	Analysis of comparative advantages of TRACECA Corridor (Caucasus)		X-----X										
6	Business Plan preparation & dissemination (Seminar)			X-----X									
7	Advice on Repair/Mtce workshops (THR parks) modernization												
8	Advice on Road Transport Department (Re-)Organization				X-----X								
9	Advice on road transport taxation, licensing & tariffs				X-----X								
10	Reporting on findings/conclusions												
DHIV Experts:		Project Manager: Road Transport Operations Expert: Automotive/Workshop Expert: Researcher/Business Group visit organisation: Min. of Transport (Int. Freight) advisor:		K. Broersma L.J. de Bree D.D. Hockstra E. van Garderen (additional) NN (5)		KBr (6) HdB (8) DH (2) EvG (11) NN (5)		DD (2) NN (2) NN (3) KBr (1) 32 weeks		3 3 3 20		TOTAL: (remaining)	

ANNEX C

DHV Consultants BV

***TRACECA - Improvement
of Road Transport
Services***

TACIS

file k.4249.01.001

date 10 June 1996

registration number

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E. VAN GARDEREN

tours" to Western Europe for public transport managers from Uzbekistan.

1993

Israel:

Fact-finding mission for a technical proposal on a feasibility study of the construction of a light rail system in Israel (Tel Aviv).

1992-1993

The Netherlands:

Conference manager for the UITP Light Rail Conference in Amsterdam in September 1993. This conference was visited by 220 politicians and transport company directors from more than 35 different countries. Programme co-ordination and contacts with municipality, UITP and sponsors.

15. OTHERS

:

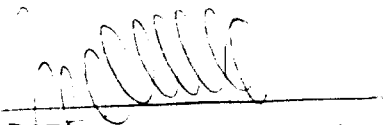
16. CERTIFICATION

:

I, the undersigned, certify that, to the best of my knowledge and belief, this biodata correctly describes myself, my qualifications and my experience. I understand that any wilful misstatement described herein may lead to my disqualification or dismissal, if employed.

SIGNATURE

:



DATE OF SIGNING:

10
Day

16
Month

1996
Year

POSITION HELD AND DESCRIPTION OF DUTIES	:	Transportation Advisor
1996		<p>The Netherlands: Backstopping for a TACIS project entitled "Institutional Reform in the Public Transport System in Medium Sized Cities" in the Russian Federation. Aim of this project is to develop an institutional framework (finance, subsidies and institutional relations) for the cities involved. The local clients are the Russian Ministry of Transport and fourteen selected cities. Ms. van Garderen wrote the technical proposal and supports the Team Leader with inter alia desk-research for the project.</p>
1996		<p>The Netherlands: Backstopping in various road (transport) projects in Africa (the Gambia, Nigeria) and Central-America (Guatemala) concerning institutional development of Road Transport Department (the Gambia, Nigeria) and road (corridor) feasibility study (Guatemala).</p>
FROM 1993	:	TO 1996
EMPLOYER	:	Amsterdam Municipal Transport Company / HTA Transport Consultants
POSITION HELD AND DESCRIPTION OF DUTIES	:	Project co-ordination, backstopping and research activities
1995-1996		<p>The Netherlands: Member of the Working Group Light Rail for the 1997 conference of the UITP (Union Internationale des Transports Publiques). Responsible for a survey among public transport companies in Europe, Asia and United States of America on the relation between light rail systems and the urban and economic development.</p>
1994-1995		<p>The Netherlands: Backstopping and research-consultant in a TACIS project entitled "Tashkent Urban Public Transportation". Aim of this project was the upgrading of the public transport system in Tashkent (Uzbekistan). Involved in the advice on the development of a Masterplan for Public Transport and assistance with reporting and desk-research.</p>
		<p>In this project Ms. van Garderen was the (sub-) project manager for the organisation of five "study</p>

Curriculum Vitae

PROPOSED POSITION IN THE PROJECT: Researcher & Business Group visit/Business Plan Coordinator

1. **FAMILY NAME** : VAN GARDEREN
2. **FIRST NAMES** : Esther
3. **DATE OF BIRTH** : 1968, April 14
4. **NATIONALITY** : Netherlands
5. **CIVIL STATUS** : Single
6. **EDUCATION** : 1987-1992 M.A. Degree Public Administration, University of Amsterdam, The Netherlands
7. **LANGUAGES SKILLS** : English 1 1 1
(1 = excellent, 5 = slight) German 2 2 2
French 3 4 4
Dutch mother tongue
8. **MEMBERSHIP OF PROFESSIONAL BODIES** :
9. **OTHER SKILLS** :
10. **PRESENT POSITION** : Transportation Advisor
DHV Consultants BV, Amersfoort, The Netherlands
11. **YEARS WITH THE FIRM** : since 1996
12. **KEY QUALIFICATIONS** : Ms. van Garderen is a specialist with an M.A. Degree in Public Administration and more than three years of experience in (public) transport projects. From 1993 till 1996 she has been working with the Amsterdam Municipal Transport Authority, responsible for the project management, coordination and backstopping of international consultancy projects.
13. **SPECIFIC EASTERN COUNTRIES EXPERIENCE** : Uzbekistan, Russian Federation.
14. **PROFESSIONAL EXPERIENCE RECORD** :
FROM 1996 : TO PRESENT
EMPLOYER : DHV Consultants BV,
Amersfoort, The Netherlands

ANNEX D

DHV Consultants BV

TRACECA - Improvement of Road Transport Services

TACIS

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BREAKDOWN OF PRICES (revision)

ITEM	Unit	Unit Rate (ECU)	No. of Units	Amount (ECU)
A. FEES				
Short term experts (on site)				
Project manager	man-day	700.00	58	40,600
Operational expert	man-day	610.00	55	33,550
Service & supply expert	man-day	610.00	17	10,370
Organisation & regulations expert	man-day	610.00	20	12,200
Researcher & business visit/plan coordinator	man-day	390.00	40	15,600
Short term experts (home office)				
Project manager	man-day	700.00	35	24,500
Operational expert	man-day	610.00	17	10,370
Service & supply expert	man-day	610.00	6	3,660
Organisation & regulations expert	man-day	610.00	10	6,100
Researcher & business visit/plan coordinator	man-day	390.00	27	10,530
Total A				167,480
B. DIRECT EXPENSES				
Per Diem	calender day	100.00	266	26,600
Local travel	day	57.00	190	10,830
Total B				37,430
Total A + B				204,910
C. REIMBURSABLE EXPENSES				
Air tickets – Russia (Y Class)	round trip	700.00	13	9,100
Reporting & translation	pages	5.00	1,000	5,000
Local subcontractors & local staff	Upon approval of CV's and local staff rates			15,000
Contingencies	Upon approval of destination of funds			590
Total C				29,690
Total A + B + C				234,600

