



**REPUBLIC OF TURKEY
MINISTRY OF TRANSPORT, MARITIME
AFFAIRS & COMMUNICATIONS
GENERAL DIRECTORATE OF HIGHWAYS**



PRIORITY ROAD INFRASTRUCTURE PROJECTS OF TURKEY

GENEVA, 10 Sep 2013



GENERAL DIRECTORATE OF HIGHWAYS

OUTLINE

GENERAL OVERVIEW of ROAD
NETWORK



ROAD INFRASTRUCTURE INVESTMENTS



VISION 2023 PPP PROJECTS



PPP PROJECTS ON TEM & EATL
NETWORKS



GENERAL OVERVIEW of ROAD NETWORK



GENERAL DIRECTORATE OF TURKISH HIGHWAYS

Type: Village and Forest roads
Responsibility: Special Provincial Administration

Type: Urban roads
Responsibility: Municipal Authorities

Public Roads in Turkey

Type: Motorways, State & Provincial roads
Responsibility: General Directorate of Turkish Highways

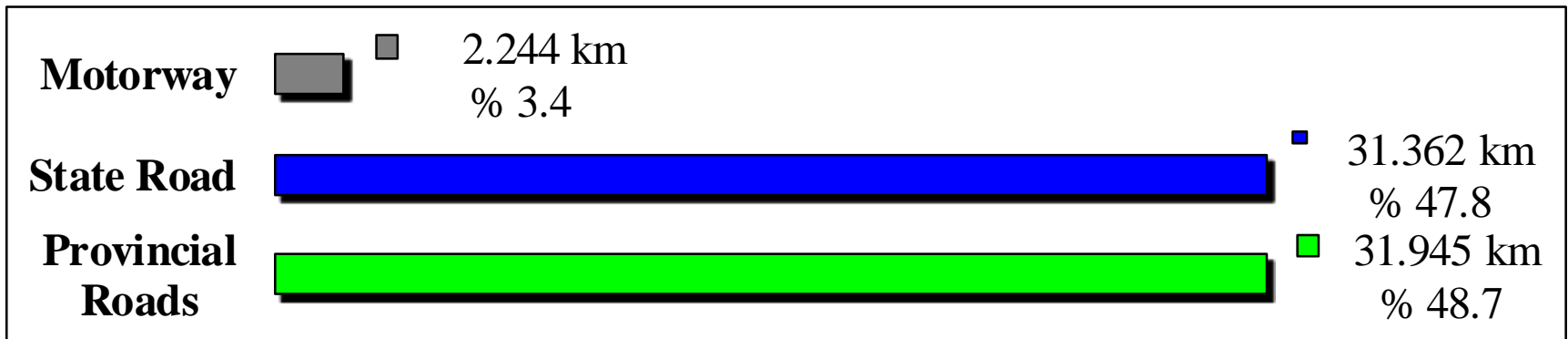
The road network excluding urban roads is about 385.000 km in length



GENERAL OVERVIEW of ROAD NETWORK



NATIONAL ROAD NETWORK



- The density of road network excluding urban roads is close to **50 km / 100 km²**
- Total asset value of Motorway, State & Provincial Roads is approximately **62 Billion €**
- The density of motorways per 1000 km² is **2.85**
- EU 15 average of 17 and the new EU members average of 2.7.

TOTAL NATIONAL ROAD NETWORK (KM): 65.551

ROAD NETWORK WITH DUAL CARRIAGEWAY (KM)

TOTAL

22.396



GENERAL OVERVIEW of ROAD NETWORK



NATIONAL ROAD NETWORK

Turkish Road Network under General Directorate of Turkish Highways' responsibility.





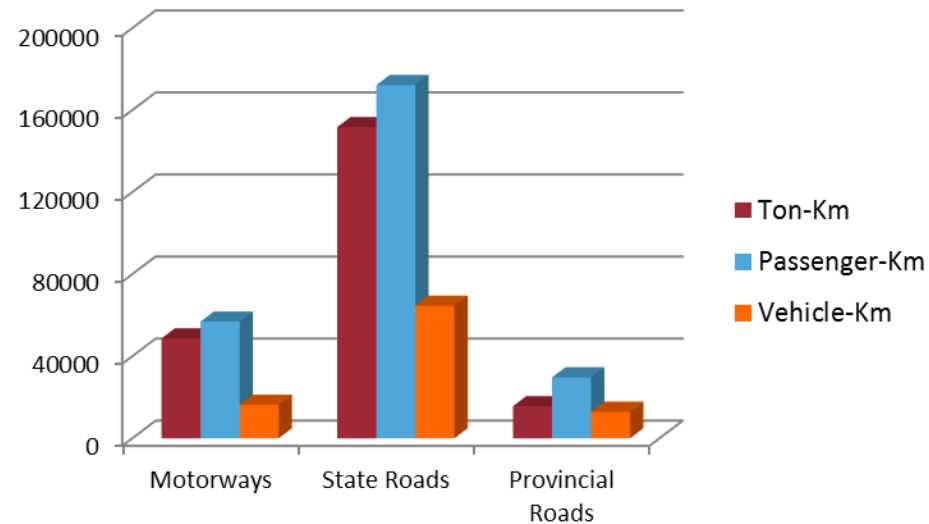
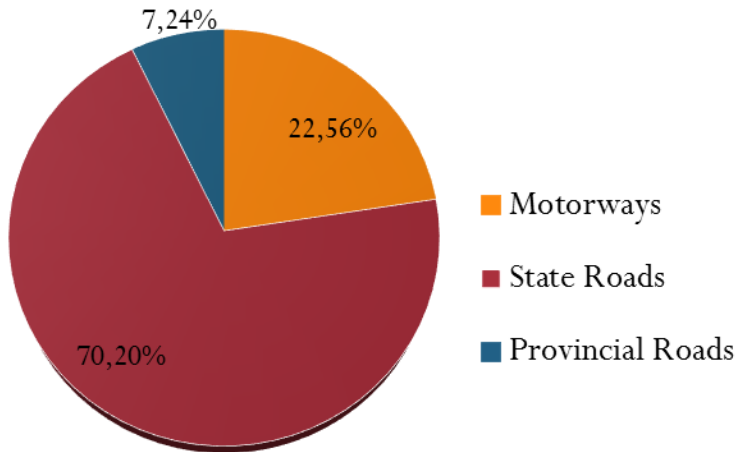
GENERAL OVERVIEW of ROAD NETWORK



DOMESTIC PASSENGER AND FREIGHT ROAD TRANSPORT

Passenger and Freight Road Transport-2012								
	Motorways		State Roads		Provincial Roads		TOTAL	
	(Million)	%	(Million)	%	(Million)	%	(Million)	%
Ton-Km	48 751	22,56	151 722	70,20	15650	7,24	216 123	100
Passenger-Km	56 923	21,99	172 226	66,53	29725	11,48	258 874	100
Vehicle-Km	16 379	17,42	64 661	68,80	12949	13,78	93 989	100

Freight Road Transport in 2012 (Ton-Km)



- Total 79 % increase in vehicle-km in the period of 2003 and 2012

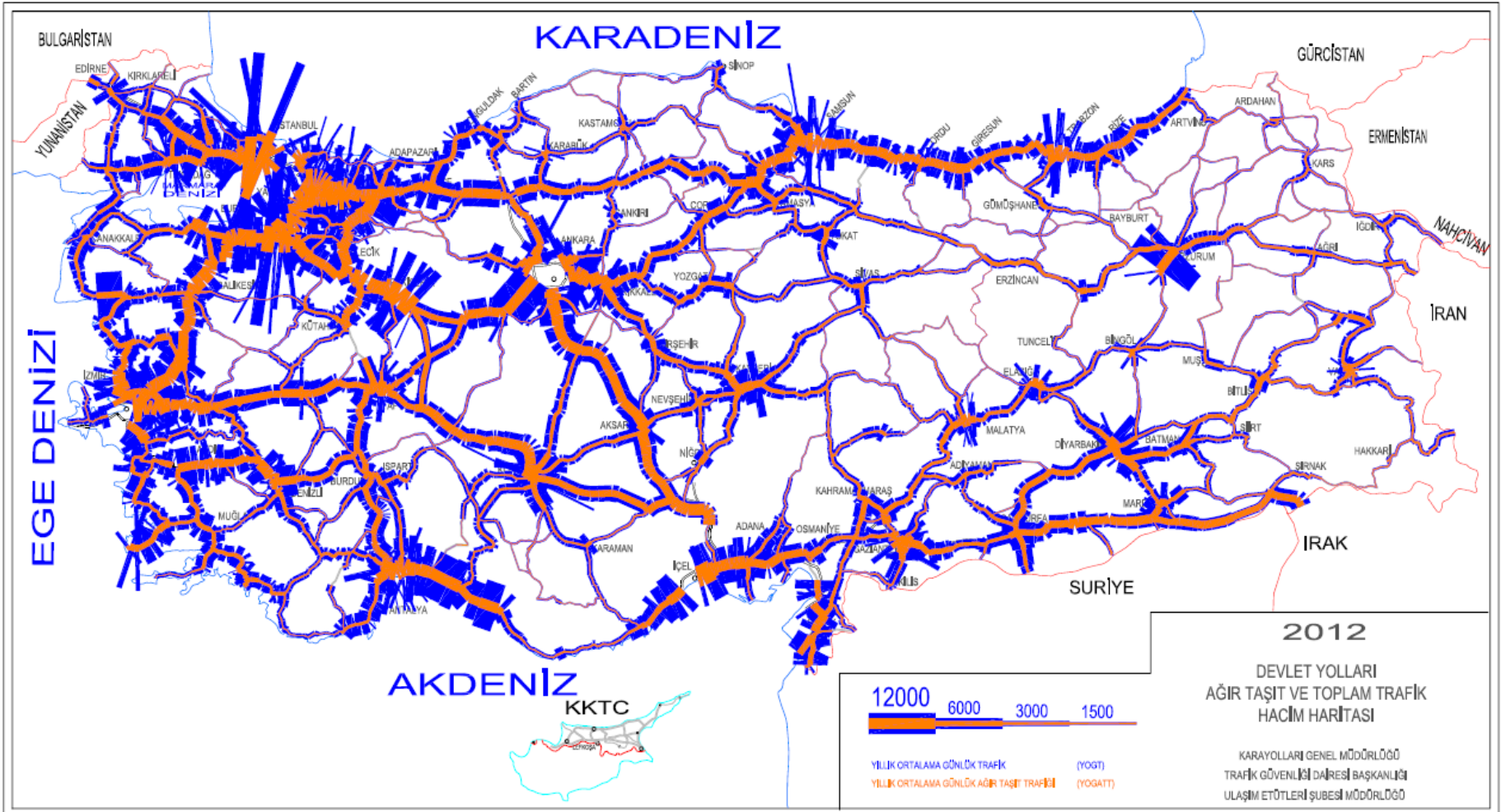


GENERAL OVERVIEW of ROAD NETWORK

TRAFFIC VOLUMES ON TURKISH ROAD NETWORK



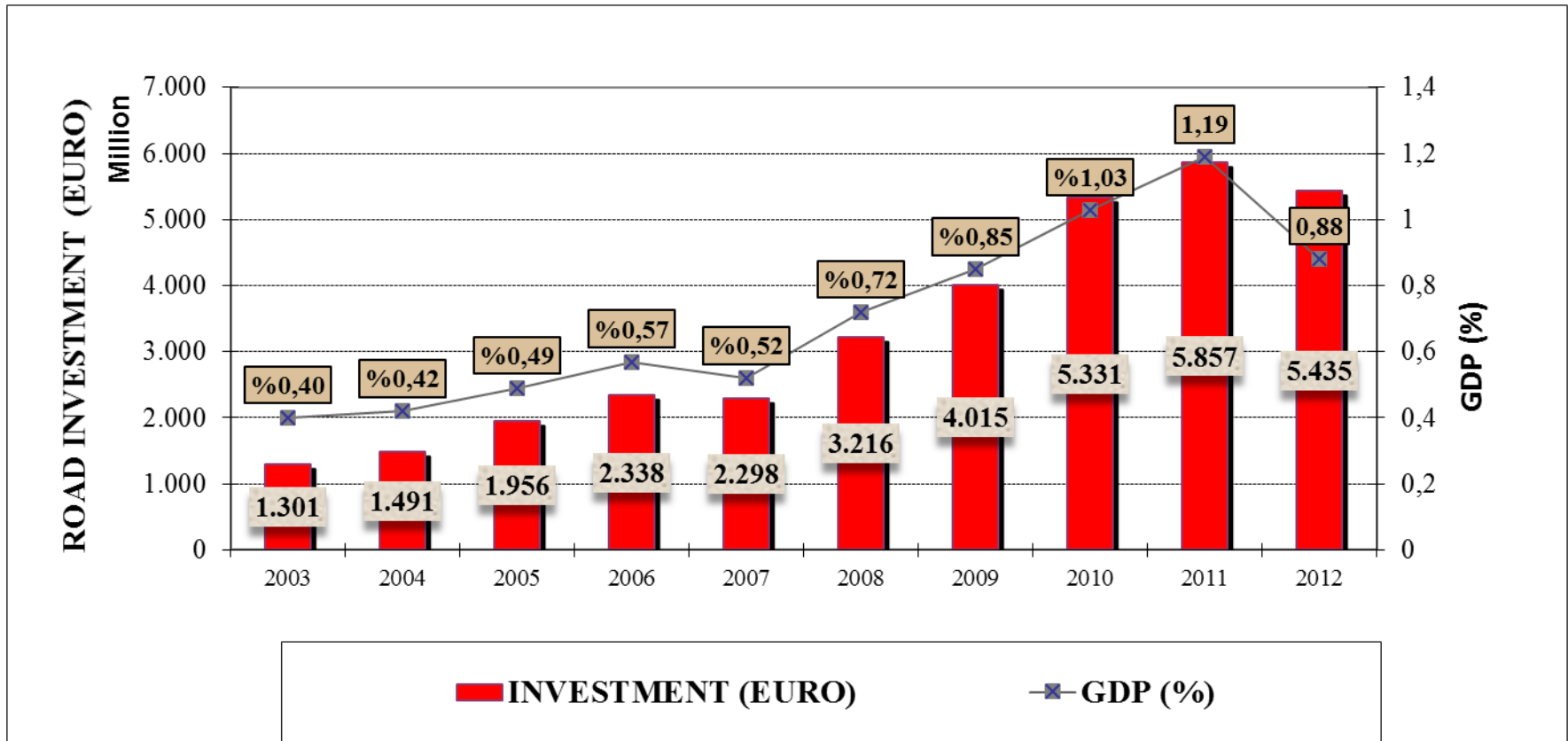
The percentage of heavy vehicles varies from 25 % to 50 % on Turkish Roads





ROAD INFRASTRUCTURE INVESTMENTS

PERCENTAGE OF GDP USED FOR ROAD INFRASTRUCTURE INVESTMENT





NATIONAL ROAD PROGRAM



1

Staying competitive by reducing travel times and transport costs

2

Providing uninterrupted and safe road transportation

3

The improvement of mobility and road user comfort

4

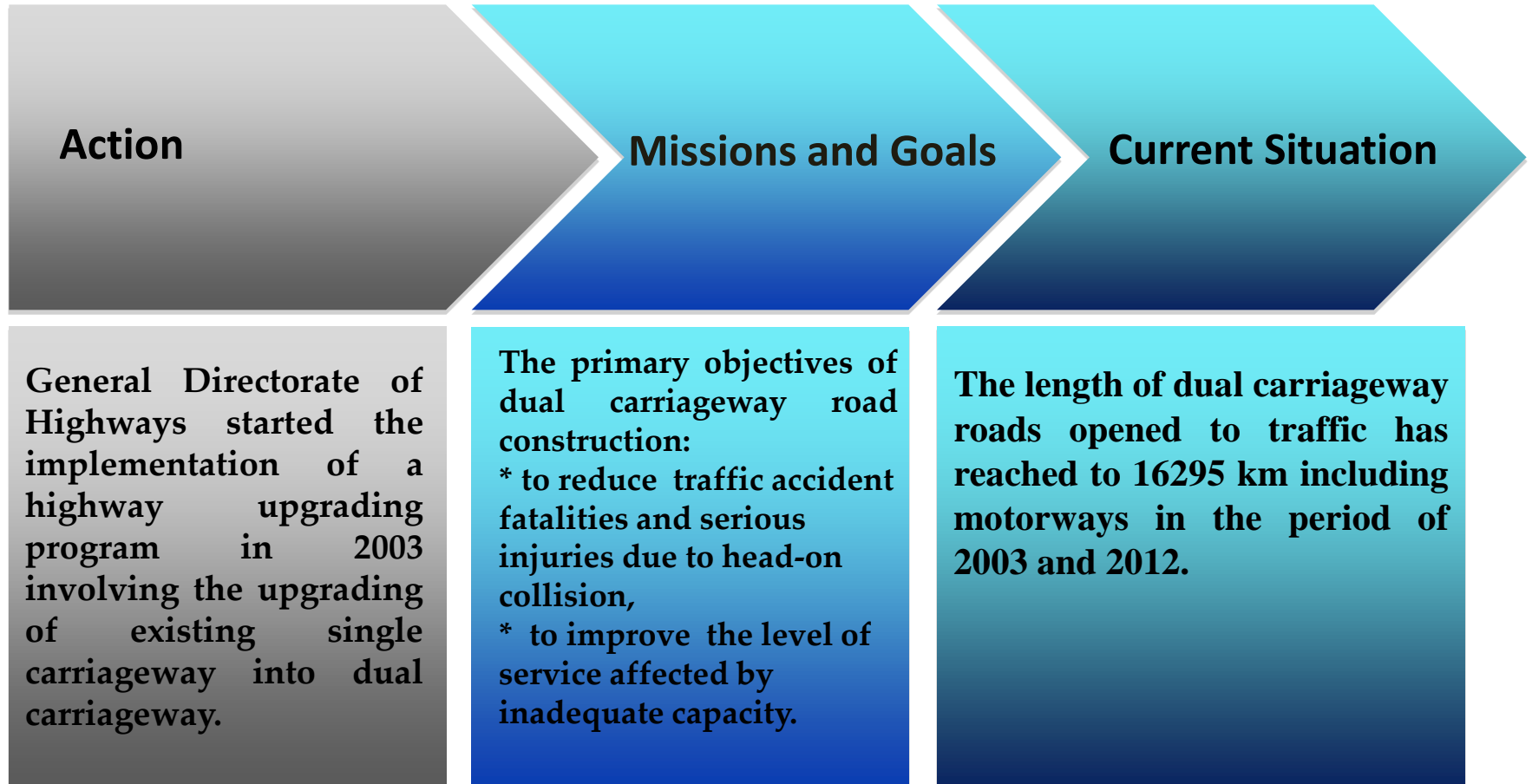
Facilitating the distribution of economic prosperity to all regions of the country



ROAD INFRASTRUCTURE INVESTMENTS



CONVERSION OF SINGLE CARRIAGEWAY ROADS INTO DUAL CARRIAGEWAY

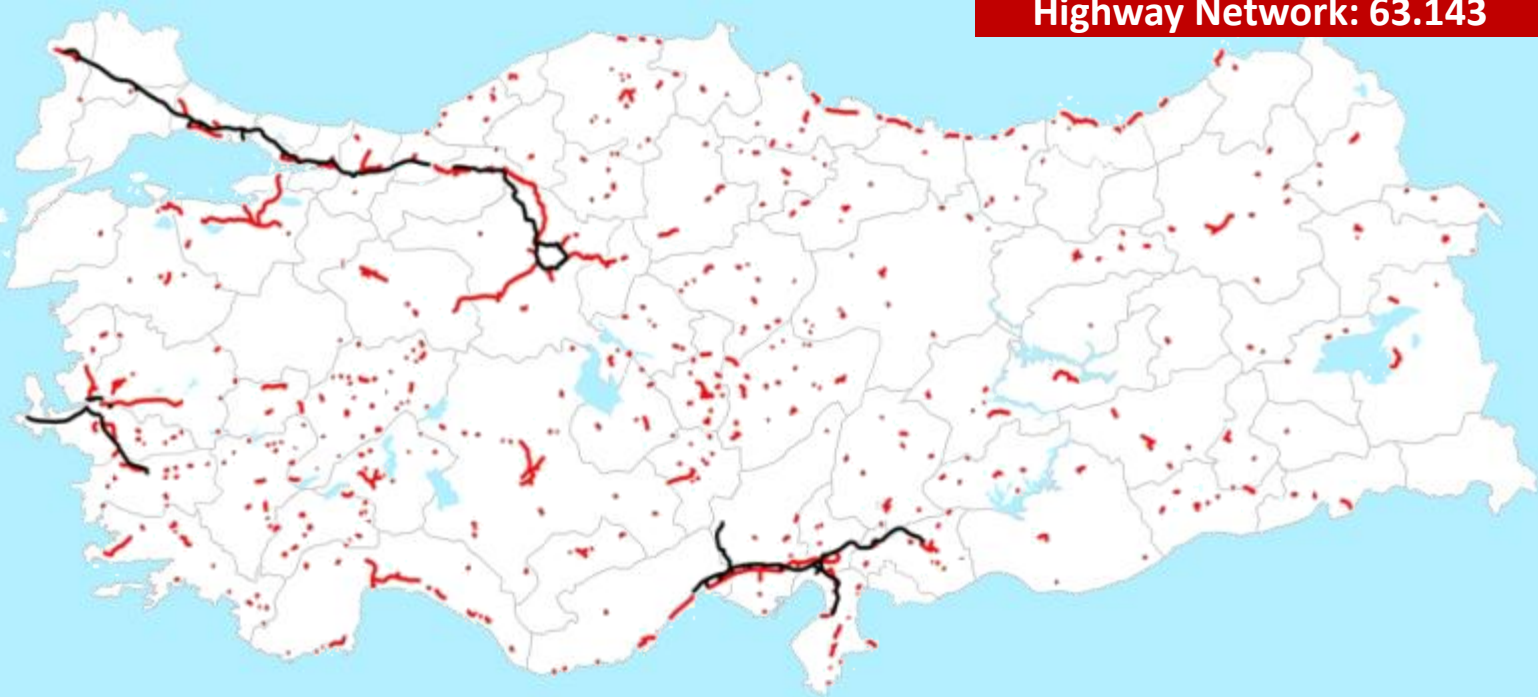


**DUAL
CARRIAGEWAY
NETWORK
(01 Jan 2003)**

1.714 Km
Total Motorway

4.387 Km
Dual Carriageway
State and Provincial
Roads

6.101 Km
TOTAL



Highway Network: 63.143

**DUAL
CARRIAGEWAY
NETWORK
(01 July 2013)**

2.244 Km
Total Motorway

20.152 Km
Dual Carriageway
State and Provincial
Roads

22.396 Km
TOTAL



Highway Network :65.551



ROAD INFRASTRUCTURE INVESTMENTS



D 100 HIGHWAY: *Kapıkule Border Gate (Bulgaria)-Edirne-İstanbul-Gerede-Amasya-Erzincan-Erzurum-Ağrı-Gürbulak Border Gate (Iran)*

Total Length: 1792 km



D 300 HIGHWAY: *Çeşme-İzmir-Afyon-Konya-Nevşehir-Kayseri-Malatya-Elazığ-Bingöl-Muş-Bitlis-Van-Kapıköy Border Gate*

Total Length : 1920 km



ROAD INFRASTRUCTURE INVESTMENTS

DEVELOPMENT OF NORTH-SOUTH AXES (BLACK SEA-MEDITERRAN)



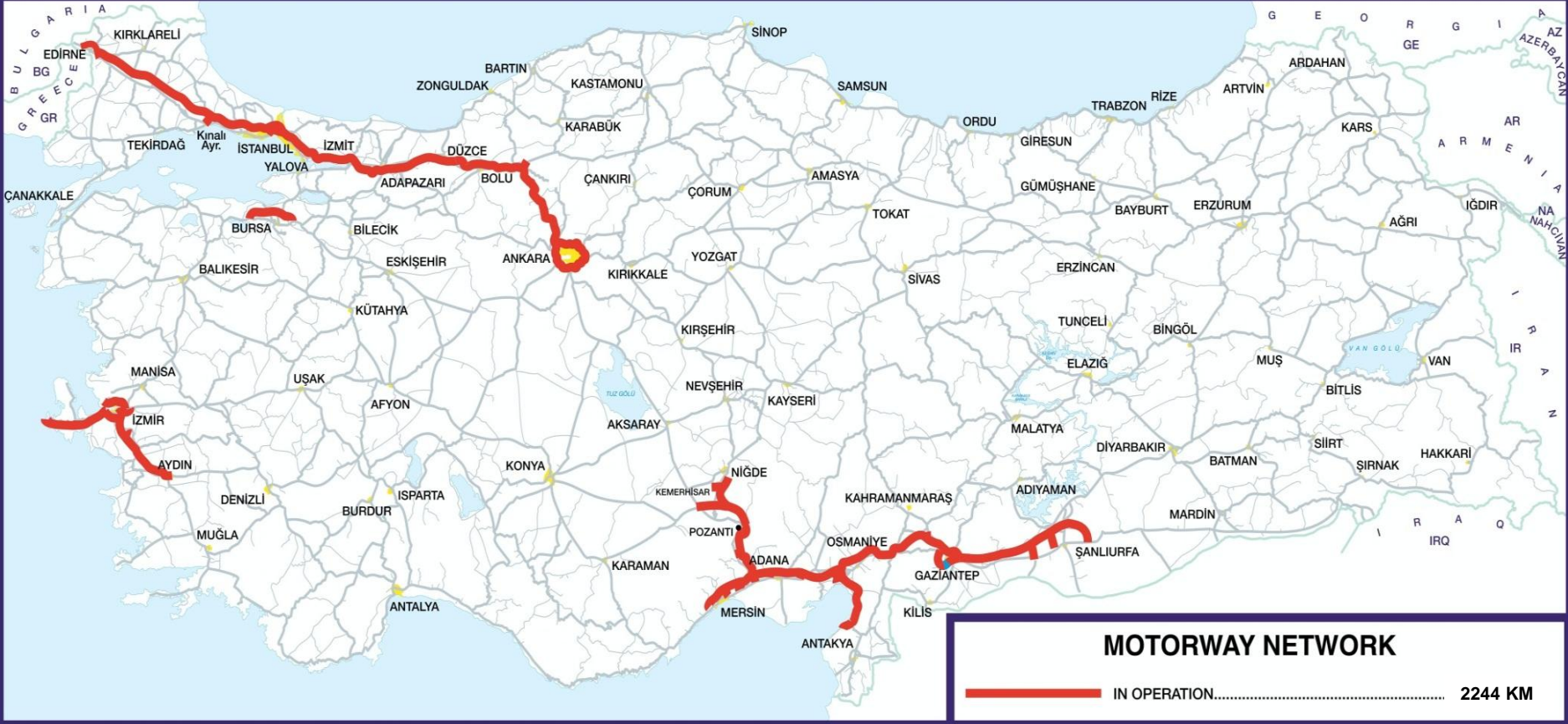
	DUAL CARRIAGEWAY	SINGLE CARRIAGEWAY	TOTAL
IN OPERATION	8.299	524	8.823
UNDER CONSTRUCTION	1.251	224	1.475
WILL BE TENDERED	1.163	288	1.451
TOTAL	10.713	1.036	11.749



ROAD INFRASTRUCTURE INVESTMENTS



MOTORWAYS





ROAD INFRASTRUCTURE INVESTMENTS

MOTORWAYS





2023 VISION IN 100TH ANNIVERSARY OF THE FOUNDATION OF TURKISH REPUBLIC.



Population: 85 Million

GDP per Capita : 25.000 \$

The world's 10th largest economy : GDP 2 Trillion \$

500 Billion US \$ Export

2023

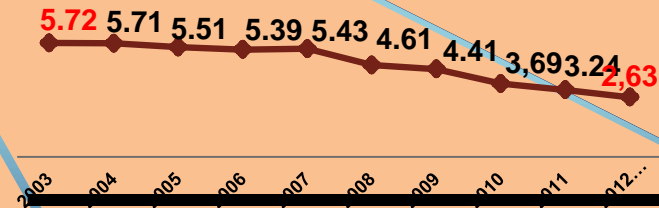
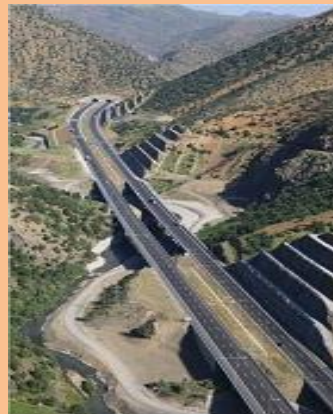
Mobility

378 Billion passenger x km
422 Billion ton x km

70 000 Km
Road Network
paved by BHM

Traffic Safety
Fatality per
100 Million Vehicle x Km < 1

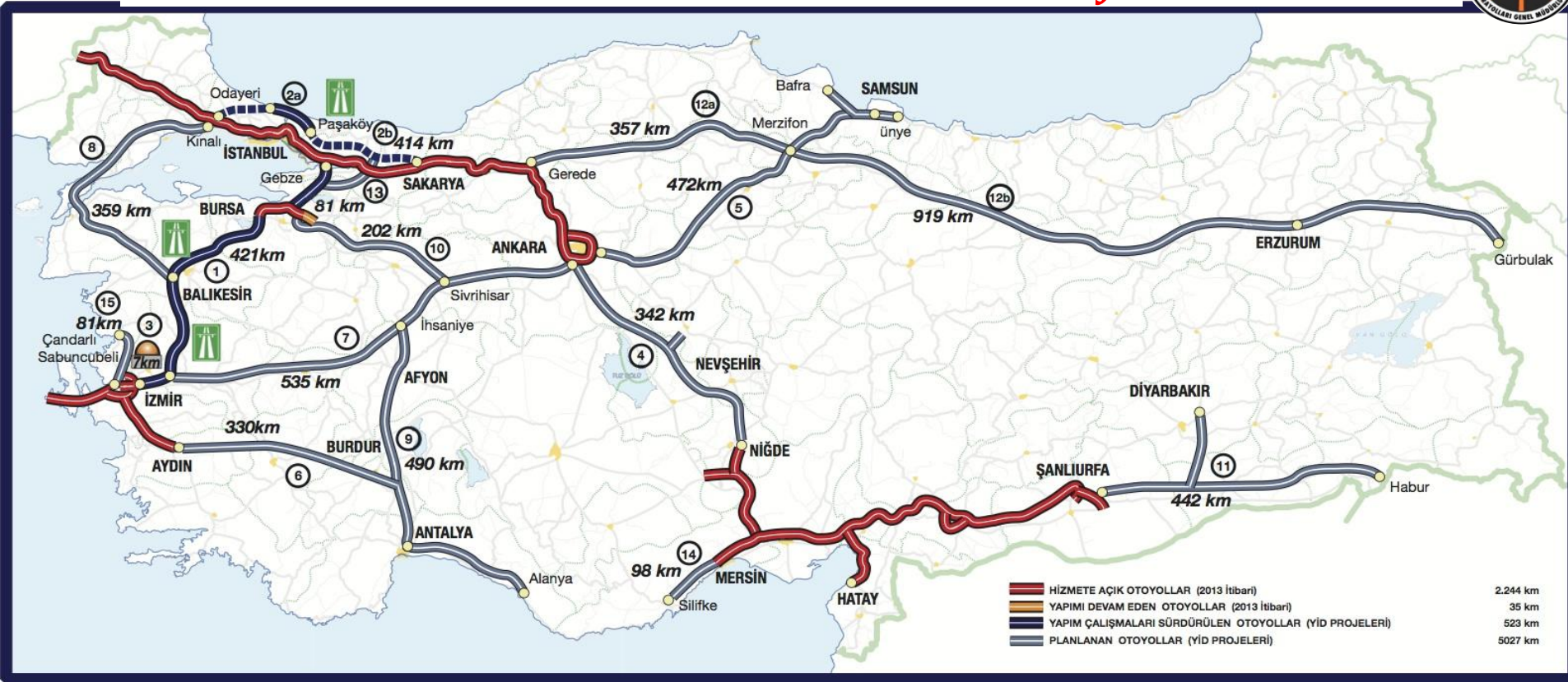
5 550 Km New Motorway by BOT
Motorway Network 7 827 km
1000 Km² 10.1 Km



Dual Carriageway
Road Network with a
length of 36 827 Km



BUILD-OPERATE-TRANSFER PROJECTS 2023



YİD PROJELERİ KAPSAMINDA YAPIM ÇALIŞMALARINA BAŞLANAN PROJELER (KM)

1 - Gebze-Orhangazi-İzmir Otoyolu .	421
2/a - Kuzey Marmara Otoyolu /Odayeri-Paşaköy Kesimi (3.Bogaz Köp.Dahil)	95
3 - Sabuncubeli Tüneli	7
523	

YİD PROJELERİ KAPSAMINDA PLANLANAN PROJELER

4 - Ankara-Niğde Otoyolu	342
5 - Ankara-Kırıkkale-Delice-Samsun Otoyolu	472
6 - Aydın-Denizli-Burdur Otoyolu	330
7 - Ankara-İzmir Otoyolu	535
2/b - Kuzey Marmara Otoyolu	319

8 - Kınalı-Tekirdağ-Çanakkale-Balıkesir Otoyolu	359
9 - Afyonkarahisar-Antalya-Alanya Otoyolu	490
10 - Sivrihisar-Bursa Otoyolu	202
11 - Şanlıurfa-Habur Otoyolu (Diyarbakır Bağlantısı Dahil)	442
12a- Gerede-Merzifon-Gürbulak Otoyolu Projesi,Gerede-Merzifon Kesimi	357
12b- Gerede-Merzifon-Gürbulak Otoyolu Projesi,Merzifon-Gürbulak Kesimi	919
4.767	

MİLLİ BÜTÇEYLE YAPILMASI PLANLANAN PROJELER

13 - Yalova -İzmit Otoyolu	81
14 - Mersin-Silifke (Taşucu) Otoyolu	98
15 - Çiğli-Aliağa-Çandarlı Otoyolu	81
260	

YİD OTOYOL PROJELERİ
MİLLİ BÜTÇEYLE YAPILMASI PLANLANAN PROJELER

5.290 KM
260 KM

TOPLAM

5.550 KM



ONGOING PPP PROJECTS



- ❖ İSTANBUL -İZMİR MOTORWAY (INCLUDING İZMİT BAY CROSSING AND CONNECTING ROADS)
 - ❖ Investment Cost is **6.3 Billion** US \$

- ❖ NORTHERN MARMARA MOTORWAY, ODAYERİ PAŞAKÖY SECTION (INCLUDING 3. SUSPENSION BRIDGE) PROJECT
 - ❖ Investment Cost is **2.5 Billion** US \$

- ❖ SABUNCUBELİ TUNNEL PROJECT
 - ❖ Investment Cost is **55 Million** US \$



İSTANBUL -İZMİR MOTORWAY (421 Km)

(INCLUDING İZMİT BAY CROSSING AND CONNECTING ROADS)



- ✓ İstanbul-İzmir Motorway is one of the biggest Build Operate Transfer (BOT) projects in the world which includes World 4th suspension bridge (İzmit Bay Bridge) with a longest central mid span 1550 m.
- ✓ Project consists of 2682 m suspension bridge, 377 km motorway + 44 km connecting roads,
- ✓ Total investment cost of the project is about 6,3 billion USD)
- ✓ The BOT Contract was signed at 27.09.2010. According to contract , the contractor will build the project in 7 years, and operate the motorway for 15 years and 4 months.
- ✓ Length of the road between Gebze-İzmir will be shorten by 90 km. Travel time from İstanbul to İzmir will decrease from 8 hours to 4 hours



GEBZE-ORHANGAZI-İZMİR MOTORWAY

(INCLUDING İZMİT BAY CROSSING AND CONNECTING ROADS)



Motorway Length	377 km
Connecting Road Length	44 km
Suspension Bridge Length	2 682 m
Mid Span	1 550 m
Approach Viaduct	1 378 m
Number of Viaducts	30
Total Viaduct Length	18 212 m
Number of Tunnels	2
Total Tunnel Length	5 142 m
Number of Bridges	199
Toll Plazas	20
Service Facilities	11
Parking Lots	7
Interchanges	25



NORTH MARMARA MOTORWAY

(including 3rd suspension bridge, Yavuz Sultan Selim Bridge)



- 3rd Strait Suspension Bridge :1875 meter long with a mid span 1408 m.
- 59 m platform width (2x4 lane highway and 2x1 lane railway) and 322 m tower height.

NORTH MARMARA MOTORWAY

(including 3rd suspension bridge, Yavuz Sultan Selim Bridge)

SOME INFORMATION OF IMPLEMENTATION CONTRACT



- **The longest suspension motorway bridge with railway in the world.**
- **Signed at 20.04.2012.**
- **Start :May 2013 Finish: 2015.**
- **Construction & Operation:10 years 2 months 20 days.**
- **Construction period: 2 years and 6 months**
- **Operation period :7 years, 8 months and 20 days**
- **Total Investment Amount: 2.5 billion \$**
- **Bridge Toll Price for car : 3 \$**
- **Motorway Toll Price for car :0.08 \$/km**



ROAD INFRASTRUCTURE INVESTMENTS



TEM NETWORK 2013



- Total length of TEM road network 6941 km composing of 28 % of TEM Network
- Almost all TEM network is in dual carriageway standards with Bituminous Asphalt Hot Mix. (2013)
- İstanbul-İzmir Motorway with a length of 421 Km and section having a length of 95 km of North Marmara Motorway (incl. 3rd strait bridge) are under construction by BOT



EATL ROUTES IN TURKEY



TÜRKİYEDEKİ AVRASYA YOLLARI EURO-ASIAN ROADS IN TURKEY

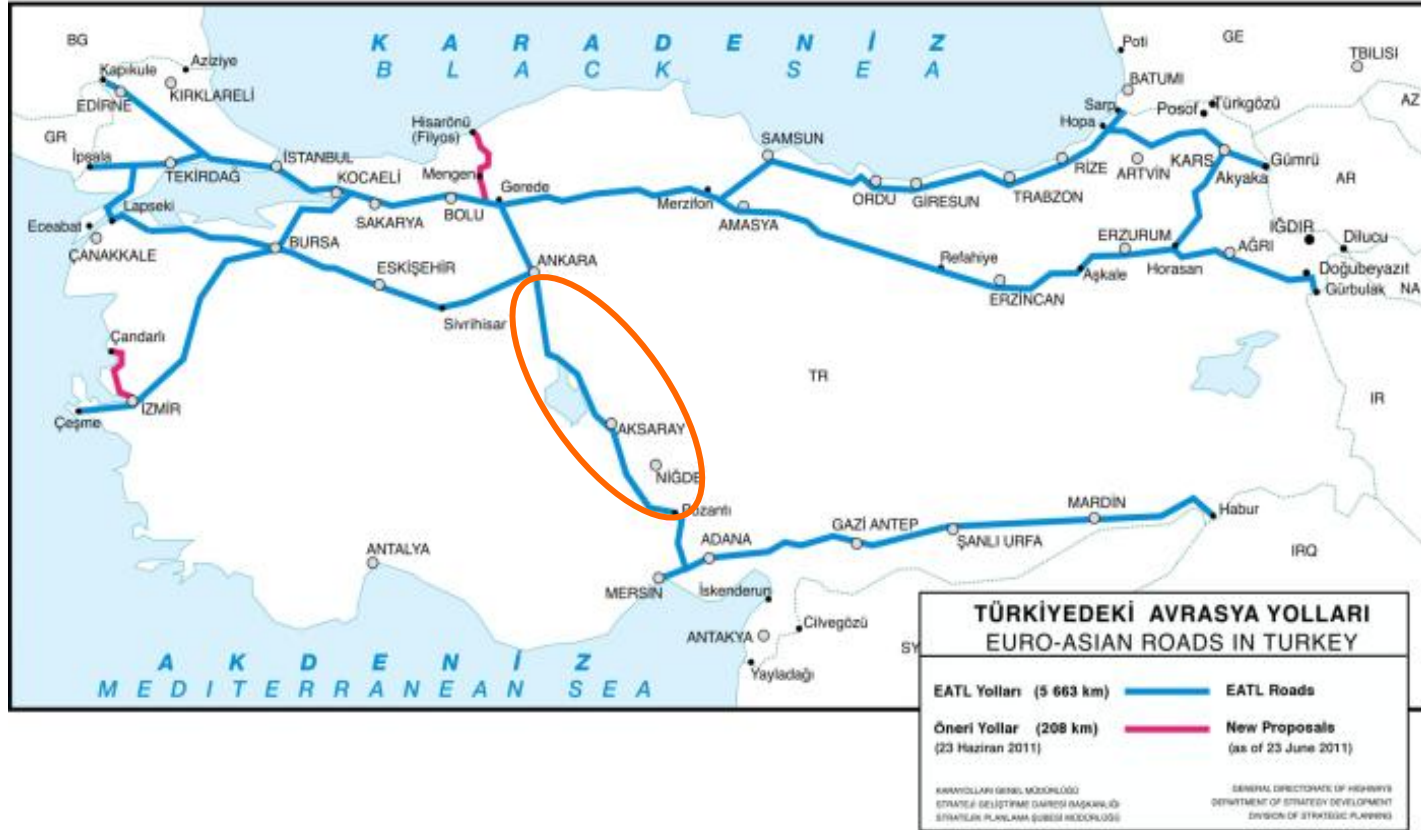
- EATL Yolları (5 663 km) — EATL Roads
- Öneri Yollar (208 km) — New Proposals
(23 Haziran 2011) (as of 23 June 2011)

KARAYOLLARI GENEL MÜDÜRLÜĞÜ
STRATEJİ GELİŞTİRME DAİRESİ BAŞKANLIĞI
STRATEJİK PLANLAMA ŞUBESİ MÜDÜRLÜĞÜ

GENERAL DIRECTORATE OF HIGHWAYS
DEPARTMENT OF STRATEGY DEVELOPMENT
DIVISION OF STRATEGIC PLANNING



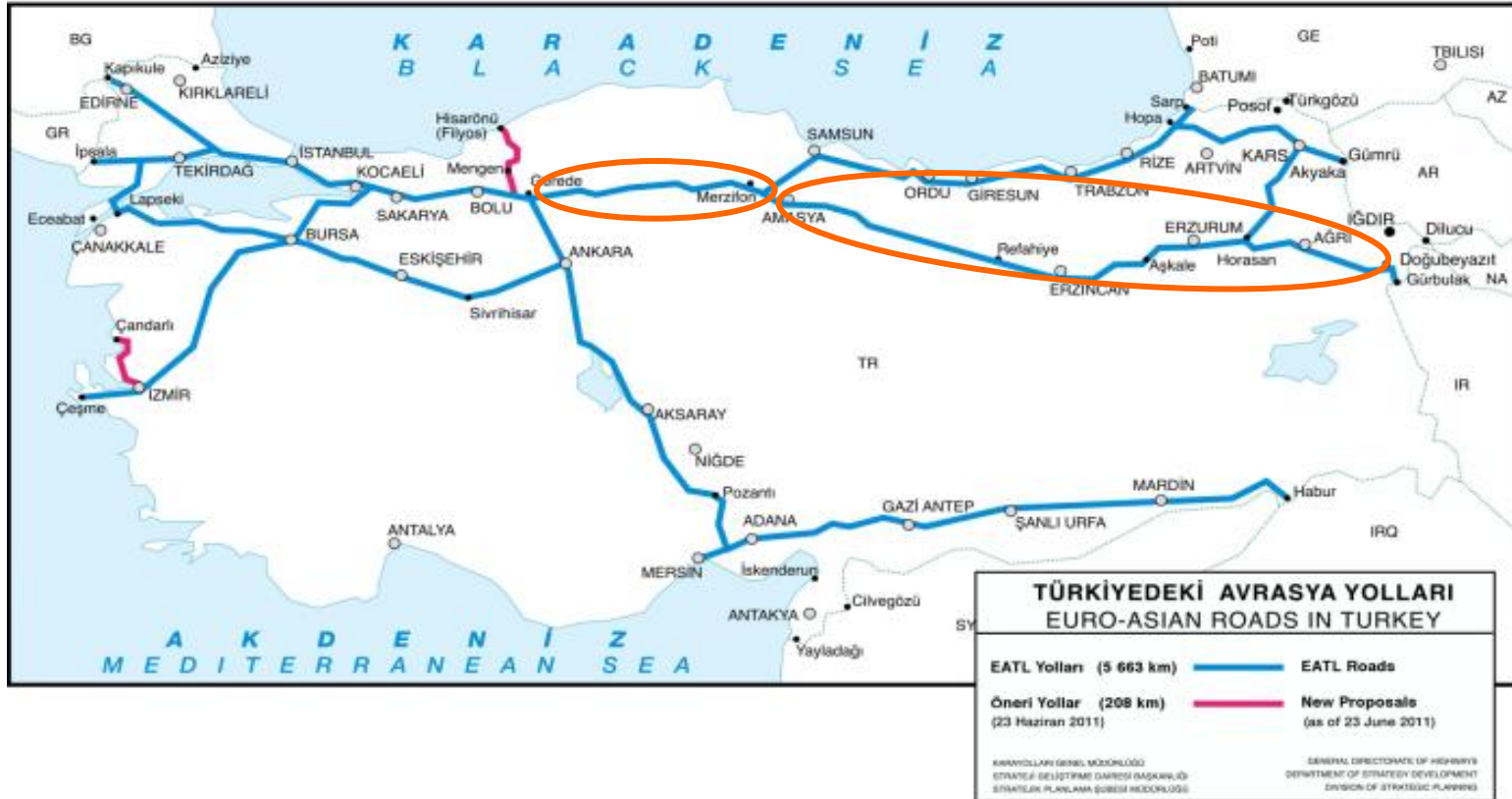
ANKARA-NİĞDE MOTORWAY PROJECT



- Part of TEM network & EATL Routes.
- 285 km motorway (2x3 lanes) + 57 km connecting roads (2x2 lanes),
- Total Length:342 km.
- Cost: 1.7 Billion USD
- Feasibility and design works were completed.
- Finish: 2016.



GEREDE-MERZIFON-GÜRBULAK MOTORWAY PROJECT



➤ Consist of two sections : Gerede-Merzifon & Merzifon-Gürbulak.

➤ Gerede-Merzifon: 357 km, 2,6 Billion US \$

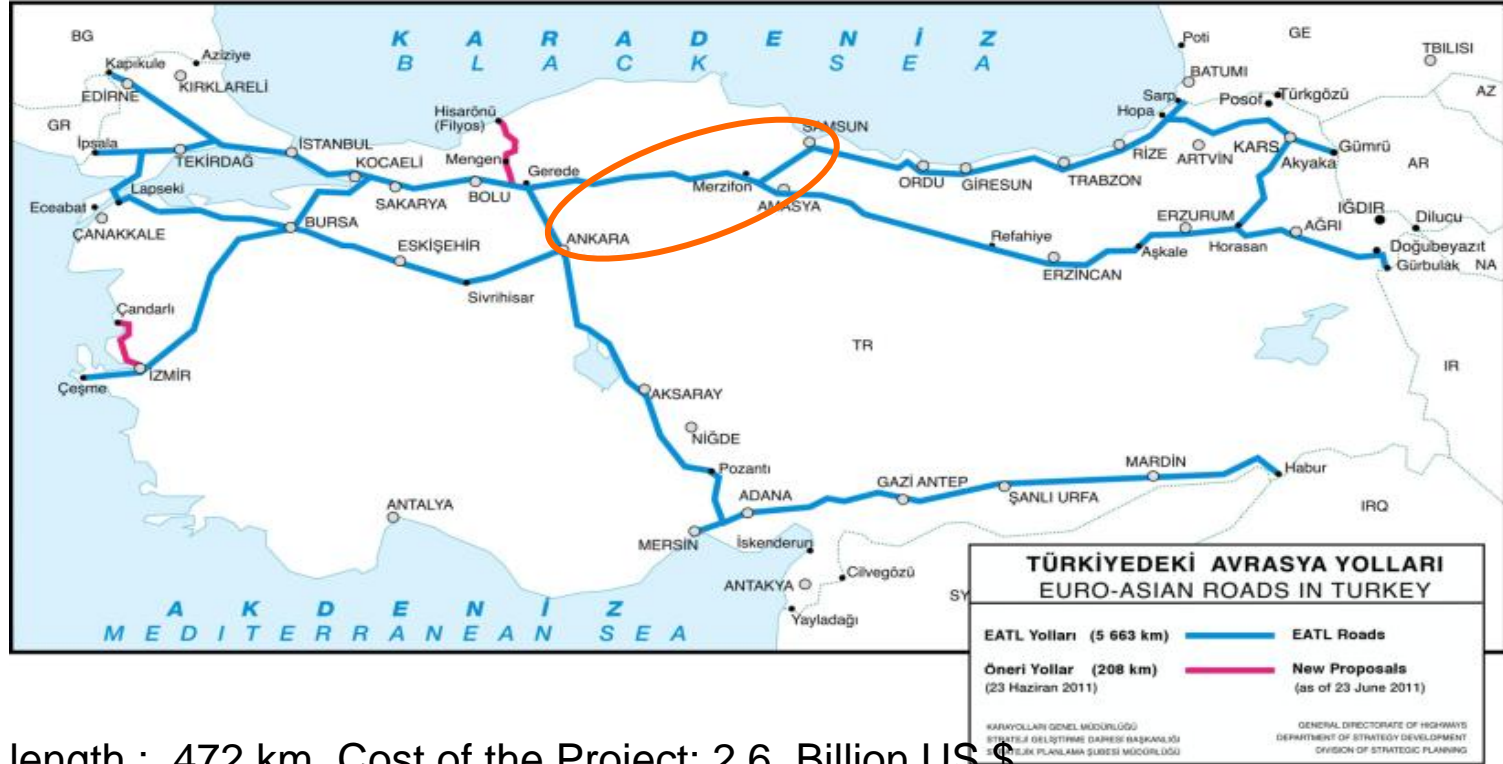
➤ Merzifon-Gürbulak: 919 km, 7,1 Billion US \$

➤ Design of the project is still continuing.

➤ Finish: Gerede-Merzifon 2018 Merzifon-Gürbulak 2023



ANKARA-KIRIKKALE-DELİCE-SAMSUN MOTORWAY PROJECT



- Total length : 472 km, Cost of the Project: 2.6 Billion US \$
- Consist of two sections Ankara-Kırıkkale-Delice & Delice-Samsun
- Feasibility studies are continuing within the framework of project consultancy contract.
- Finish: 2018.

A nighttime photograph of the Bosphorus Bridge in Istanbul, Turkey. The bridge's towers are illuminated with purple light, and the suspension cables are strung with small lights. In the foreground, the Ortaköy Mosque is brightly lit with green and white lights, reflecting on the water. A few boats are visible on the Bosphorus. The sky is a deep blue.

**THANK YOU VERY MUCH
FOR YOUR ATTENTION**

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