17th Transport Sector Coordinating Committee (TSCC) Meeting
18–20 April 2018 | Istanbul, Turkey

17-е заседание Координационного комитета по транспортному сектору (ККТС)
18–20 апреля 2018 года | Стамбул, Турция

CAREC Corridor Implementation Progress, Actions Planned and Support Needs

Republic of Kazakhstan
Ministry for Investment and Development

CONSTRUCTION AND RECONSTRUCTION OF ROADS UNDER NURLY ZHOL

Results for 2017

Budget- 316.4 billion tenges

Length covered – 4.4 thousand km

Completed – 602 km, including

Center –South – 16 km, Aktau-Schetpe – 170 km, Aktau-Beineu – 60 km;
Center – East – 216 km, Almaty-Taldykorgan - 24,
Aktobe-Makat – 26 km, Uralsk-Kamenka – 65 km,
Astana-Petropavlovsk – 5 km, Kordai bypass road – 21 km;

Plans for 2018

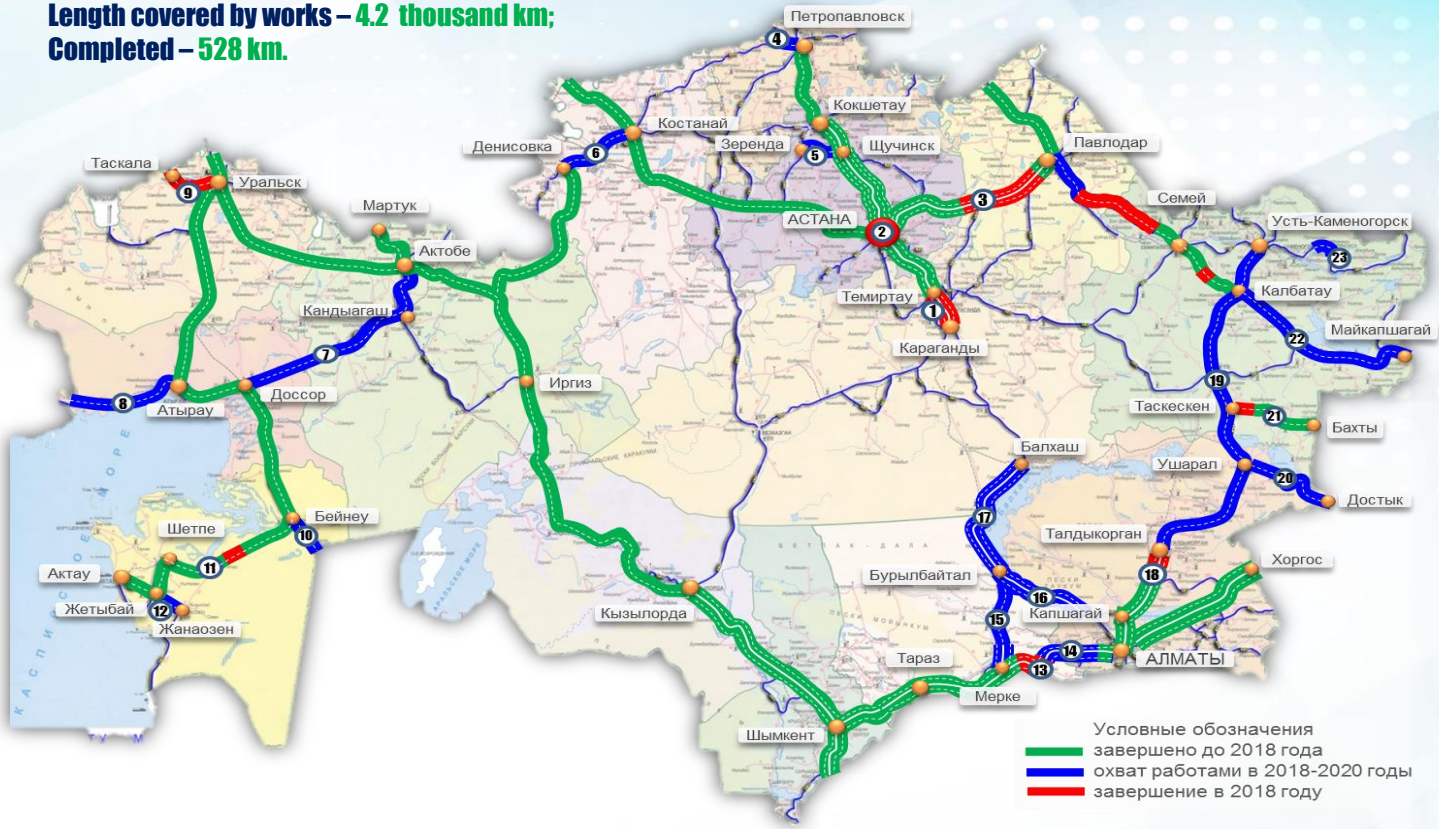
Budget – 269.4 billion tenges

Length covered by works – 4,2 thousand km

Completed – 528 km, including

CONSTRUCTION AND RECONSTRUCTION OF ROADS IN 2018

Budget – 269.4 billion tenges;
Length covered by works – 4.2 thousand km;
Completed – 528 km.



1, Temirtau-Karaganda–61km
Including Karganda bypass, toll road
Cost – 64 billion tenges.
Budget 2018 – 13,8 billion tenges.
Implementation period: 2017-2020

2. South-West Astana bypass road – 33 km
Cost – 60.2 billion tenges.
Budget 2018 – 26,8 billion tenges.
Implementation period: 2017-2019

3. Astana-Pavlodar-Semei – Kalbatau – 914 km
Cost – 305 billion tenges.
Budget 2018 – 48 billion tenges,
Implementation period: 2010-2019

4. Astana-Petropavlovsk-RF border – 61 km
Including access road to Kokshetau
Cost – 44,2 billion tenges.
Budget 2018 – 12,9 billion tenges,
Completed в 2019

5. Щучинск-Зеренда – 80 km
Cost – 15,2 billion tenges,
Budget 2018 – 3,3 billion tenges.
Implementation period: 2017-2019

6. Kostanai-Denisovka – 114 km
Cost – 36,2 billion tenges.
Budget 2018 - 3,5 billion tenges.
Implementation period: 2017-2020

7. Aktobe-Makat – 458 km
Cost – 178,9 billion tenges (
Budget 2018 - 51,3 billion tenges,.
Implementation period: 2017-2020

8. Atyrau-Astrakhan – 274 km
Cost – 134,3 billion tenges
Budget 2018 – 25,6 billion tenges.
Implementation period: 2017-2020

9. Uralsk-Taskala – 100 km
Cost – 27 billion tenges.
Budget 2018 – 4,9 billion tenges,
Implementation period: 2015-2018

10. Beineu-Akzhigit – 84 km
Cost – 20,1 billion tenges.
Budget 2018 – 7,9 billion tenges.
Implementation period: 2017-2019.

11. Beineu-Aktau – 60 km
Cost – 12,4 billion tenges.
Budget 2018 – 0,4 billion tenges,
Implementation period: 2011-2018.

12. Zhetybai-Zhanaozen – 73 km
Cost – 29,6 billion tenges
Budget 2018 – 7,7 billion tenges.
Implementation period: 2017-2019

13, Kordai bypass road – 80 km
Cost – 25,5 billion tenges,
Budget 2018 – 11,5 billion tenges.
Implementation period: 2015-2018

14. West Europe – West China, including Uzynagash-Otar section (96 km)
Cost – 18,6 billion tenges
Budget 2018 – 18,6 billion tenges.
Implementation period: 2017-2020

15. Merke-Burylbaital – 266 km
Cost – 101,8 billion tenges
Budget 2018 – 13,3 billion tenges.
Implementation period: 2017-2020

16. Burybaital-Kurty – 228 km
Cost – 112,6 billion tenges.
Budget 2018 – 22,9 billion tenges,.
Implementation period: 2017-2021.

17. Balkhash-Burylbaital – 297 km
Cost – 200billion tenges.
Budget 2018 – 14,9 billion tenges.

18. Kapshagai-Taldykorgan – 40 km
Cost – 8,9 billion tenges.
Budget 2018 – 1 billion tenges,
Implementation period: 2012-2018.

19 .Taldykorgan – Ust-Kamengorsk– 763 km
Cost – 291 billion tenges
Budget 2018 – 30 billion tenges,
Implementation period: 2017-2021.

20. Usharal-Dostyk– 180 km
Cost – 41,2 billion tenges.
Budget 2018 - 7 billion tenges.
Implementation period: 2017-2020

21. Taskesken-Bakhty– 20 km
Cost – 3,8 billion tenges.
Budget 2018 - 3,5 billion tenges.
Implementation period: 2017-2018

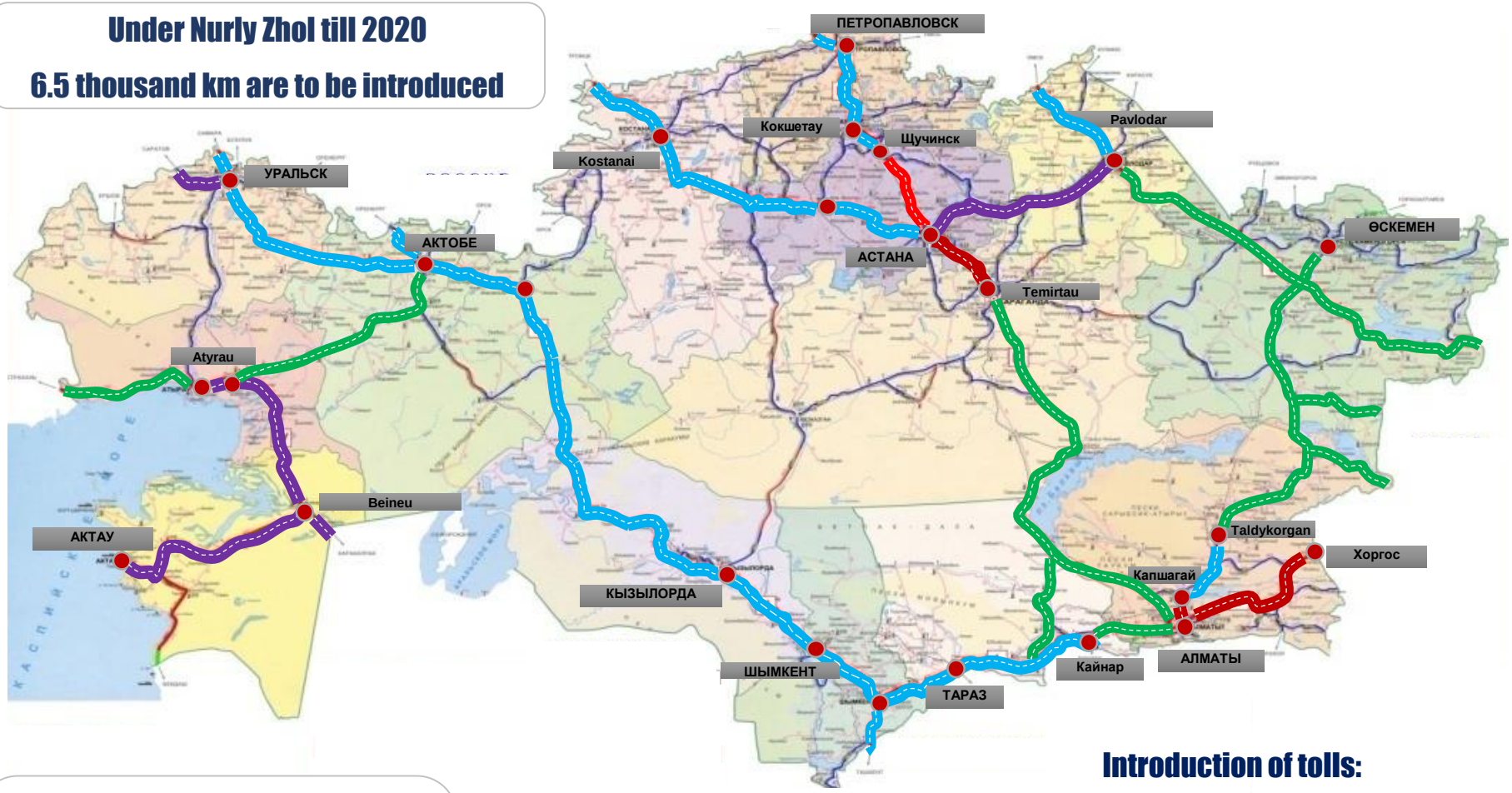
22. Kalbatau-Maikapshagai– 415 km
Cost – 159 billion tenges,
Budget 2018 – 20,4 billion tenges.
Implementation period: 2017-2021

23. Osinovskyi pass – 32 km
Cost – 16,1 billion tenges.
Budget 2018 – 4,4 billion tenges.
Implementation period: 2017-2019

INTRODUCTION OF ROAD TOLLS AT REPUBLICAN ROADS

Under Nurly Zhol till 2020

6.5 thousand km are to be introduced



Installation of road toll system:

2017 – 469 km

2018 – 4 226 km

2019 – 1 414 km

ANNUAL TOLL COLLECTION :

2020 – 30 billion tenges

2022 – more than 40 billion tenges

Introduction of tolls:

- 2018 – 469 km
- 2019 – 4,226 km
- 2020 – 1,414 km
- after 2020 – 4,100 km

ONGOING PROJECTS
ROAD TOLL SYSTEM

Hardware to automate road toll collections

The road toll system components will be installed at toll road section following a phased approach:

- A mobile application, account replenishment, information for drivers;
- Non-stop traveling for vehicles with RFID for contact-free withdrawal of funds when traveling;
- Cameras recognizing plate numbers for identification.

Since 2013 it is operational at Astana-Schuchinsk section, annual collections about to **1.2 billion tenges,** which fully cover maintenance costs.

In 2017 a system is being constructed at 3 sections (Astana-Temirtau, Almaty-Kapshagai and Almaty-Khorgos)

In 2019-2020 – construction of toll systems at 13 sections along main road corridors

Investment

Construction and commissioning: **86 billion tenges**

Impact

- ✓ Annual collection from 3 sections: **4 billion tenges.**
- ✓ Annual collections from 17 sections: **30 billion tenges.**
- ✓ New jobs: **1,689 people**

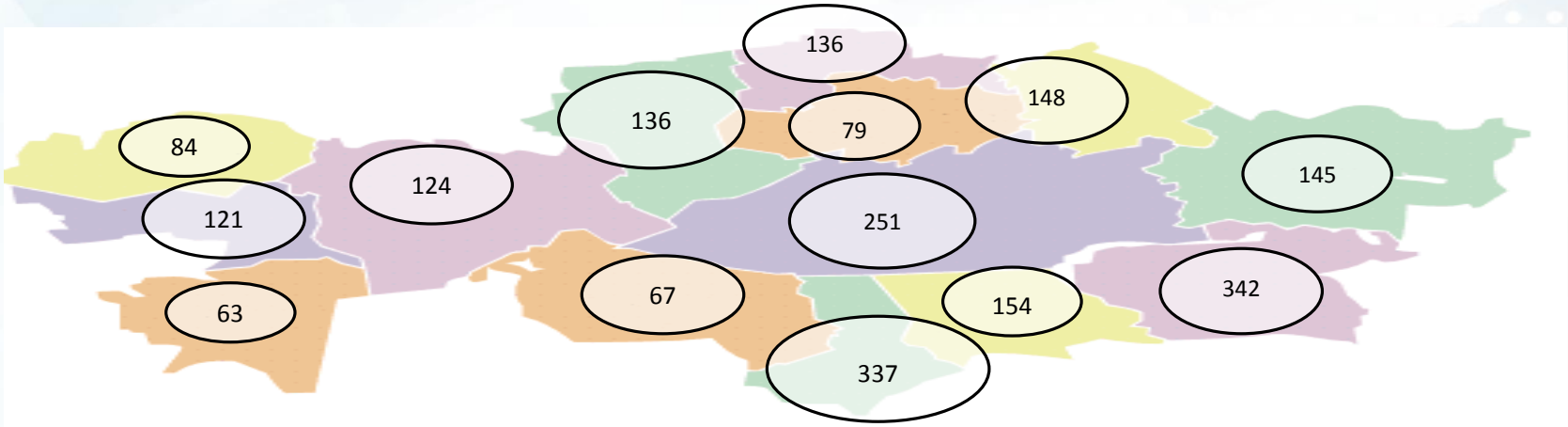
Development of roadside facilities

In 2015 the National Standard for roadside facilities was approved

CURRENT STATUS

2.1 thousand roadside service facilities are operational

70% are not in line with the National Standard



STATE INFRASTRUCTURE DEVELOPMENT PROGRAM "NURLY ZHOL"

Under the Program, **260 roadside service facilities** are planned to be constructed and upgraded along major international corridors **by 2020**

Category «A»

A filling station; a motel; a service station, a car wash; a health post; a refreshment point; toilets, shower rooms, retail shops, a shopping and leisure area.

Category «B»

A filling station; a motel; a service station, a car wash; parking; a health post; a refreshment point; toilets, shower rooms, retail shop.

Category «C»

Parking; a refreshment point; a retail shop.

Category «D»

A filling station; a retail shop.

The intellectual transport system will consist of video monitoring, road traffic management systems, systems to inform drivers about road conditions and to collect e-payments for transport services

Systemic integration of vehicles, infrastructure, users and ICT.

Implementation period: 2017-2022
Number of components: 11

INTELLECTUAL TRANSPORT COMPONENTS TO BE IMPLEMENTED

	System for road operation and road construction project management *System to simulate road construction*	2018 **PPP Concept**	2019-21 . **Awarding, implementation**
	Road traffic management system *Providing traffic information to drivers*	2019 **PPP Concept**	2020-22 . **Awarding, implementation**
	System to analyze and forecast climate conditions A network of weather stations along roads	2018 **PPP Concept**	2019-22 . **Awarding, implementation**
	System for video monitoring and identification of traffic rules violations A network of cameras for video and photo-registration	2018-19 . **PPP Concept**	2019-22 . **Awarding, implementation**
	Decision-making support system *System to analyze big data*	2018 **Architecture**	2018 - continuously **Awarding, implementation**
	Digitalization of road transport operations *Single platform for transport process participants to ensure transparency and accessibility of services*	2019 **Marketing**	20-21. **Implementation**
	Roadside service management system *System to promote roadside services*	2019 **Marketing**	20-21. **Implementation**
	Road construction portal *Single platform for participants of road construction works to ensure transparency and accessibility of services*	2019 **Marketing**	20-21. **Implementation**
	Integration with a single vehicle unit *Single vehicle unit for navigation and SOS button*	2021 **Technical requirements**	2022 **Implementation**

ONGOING PROJECTS
ROAD ASSETS MANAGEMENT SYSTEM

The road assets management system (RAMS) on the basis of detailed road condition data will enable to optimize financing allocated for road maintenance and repairs:

- An objective road condition assessment ;
- Savings from road repairs due to optimization of costs for their life cycle;
- Transition to the performance-based budget concept.

In 2017 – pilot implementation of 2 modules of the road assets management system (RAMS)

In 2018 – establishment of the National Center for Road Assets Quality

In 2018-2020 – expansion and updating the road data base (for the republican road network)

Investment

Project cost: **0.485 billion tenges**

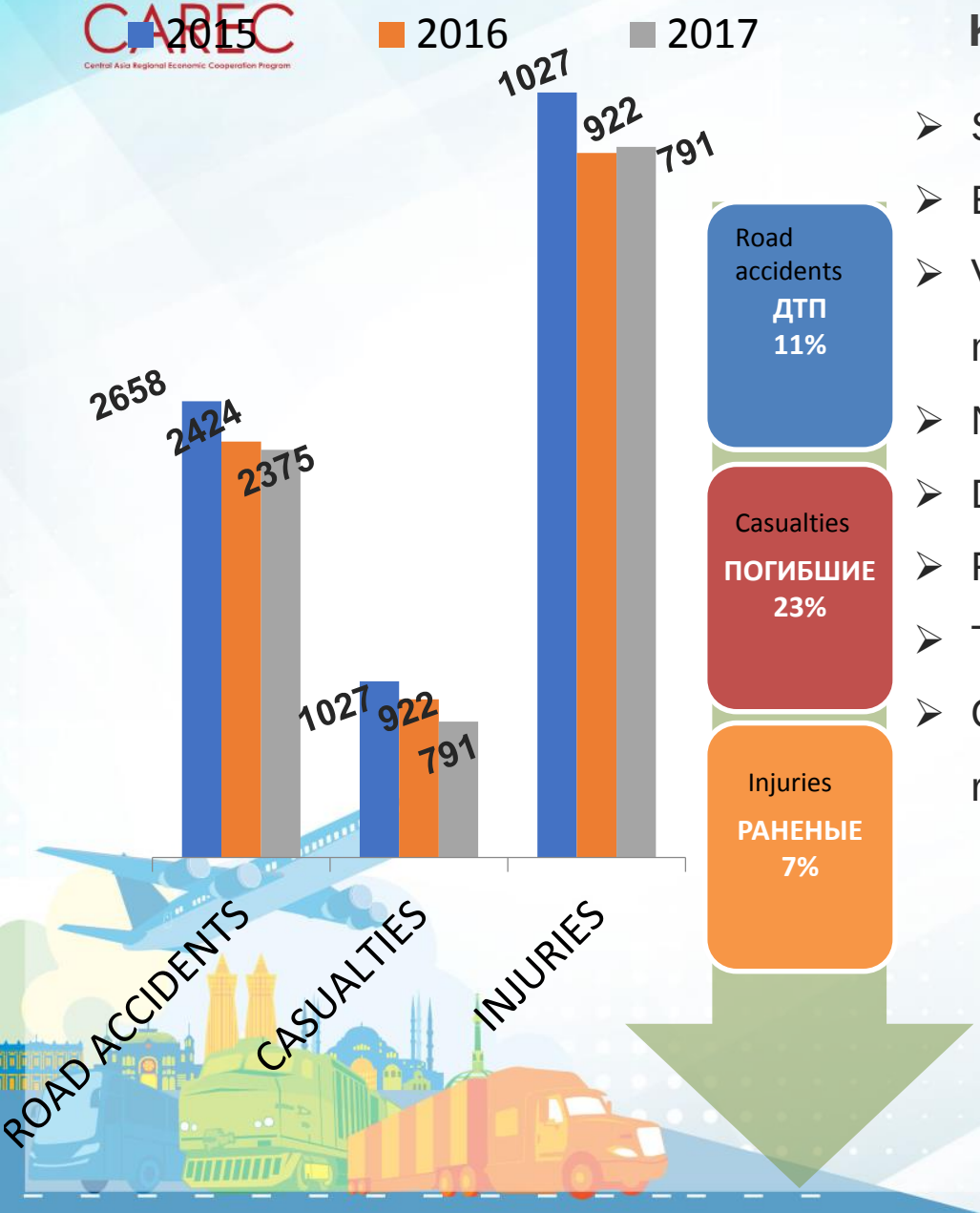
Impact

- ✓ Saving from repairs of the republican road network by 2025: **110.1 billion tenges**
- ✓ New jobs – **158 people**
- ✓ Including in the area of digitalization (IT-administrators, engineers) – **63 people**

Information on road accidents along the republican roads for 2016/2017

№	Oblast	Road accidents				Casualties				Injuries			
		2016	2017	+/-	%	2016	2017	+/-	%	2016	2017	+/-	%
1	Almaty	688	549	-139	-20	277	171	-106	-38	1016	862	-154	-15
2	Akmola	175	190	15	9	75	80	5	7	320	373	53	17
3	Aktyubinsk	105	108	3	3	32	45	13	41	182	200	18	10
4	Atyrau	34	31	-3	-9	26	12	-14	-54	66	61	-5	-8
5	East Kazakhstan	199	183	-16	-8	66	41	-25	-38	345	308	-37	-11
6	Zhambyl	302	356	54	18	83	89	6	7	617	772	155	25
7	West Kazakhstan	91	74	-17	-19	40	44	4	10	135	138	3	2
8	Karaganda	194	161	-33	-17	53	74	21	40	323	270	-53	-16
9	Kyzylorda	42	57	15	36	33	34	1	3	67	79	12	18
10	Kostanai	86	72	-14	-16	29	23	-6	-21	171	122	-49	-29
11	Mangistau	58	54	-4	-7	45	31	-14	-31	108	76	-32	-30
12	Pavlodar	94	105	11	12	28	13	-15	-54	195	198	15	8
13	North Kazakhstan	46	42	-4	-9	28	20	-8	-29	61	42	-19	-31
14	South Kazakhstan	310	393	83	27	107	114	7	7	499	641	142	28
Total:		2 424	2 375	-49	-2	922	791	-131	-14	4105	4142	49	1

ANALYSIS OF ROAD ACCIDENTS FOR 2015-2017



Road accidents
ДТП
11%

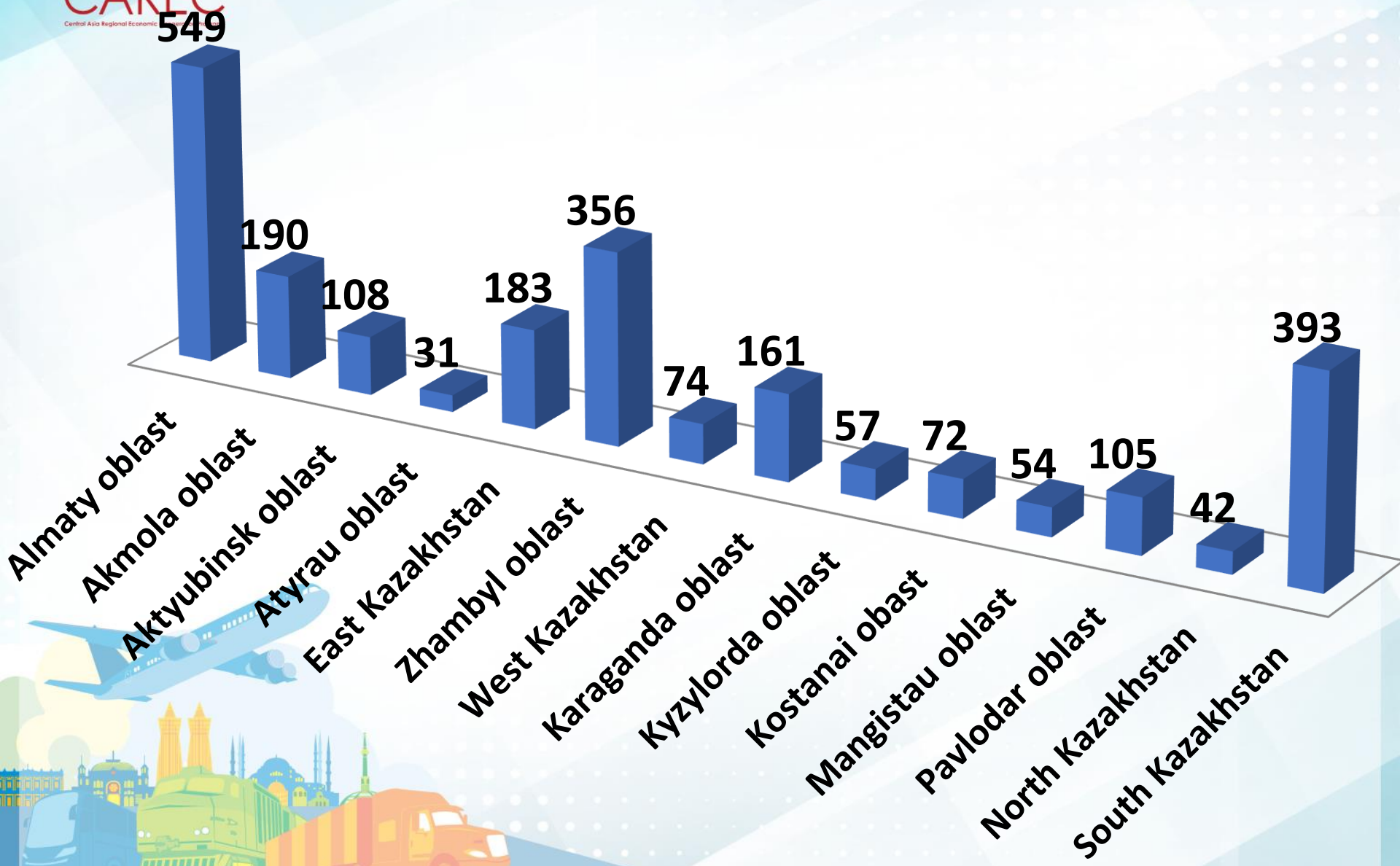
Casualties
ПОГИБШИЕ
23%

Injuries
РАНЕНЫЕ
7%

Key causes of road accidents in 2017

- Speeding – 40.7%;
- Exit into oncoming traffic lane – 12.6%;
- Violating rules of vehicle control (poor maneuvering) – 7.5%;
- Non-observance of distance – 6.7%;
- Driving under the influence of alcohol – 1.6%;
- Falling asleep while driving (fatigue) – 1.5%;
- Technical malfunction of a vehicle – 1.3%
- Other causes as a result of violating traffic rules – 27.2%.

ANALYSIS OF ROAD ACCIDENTS BY OBLAST, 2017



PLANNED ACTIVITIES

Arrangement of road crossings: total- 23 crossings

Financed by the republican budget – 17, on which:
- **Almaty oblast- 5;**
- **Zhambyl oblast – 3;**
- **Kyzylorda oblast – 3;**
- **South Kazakhstan oblast – 6.**

Financed by loans – 6, of which:
- **Almaty oblast - 2;**
- **Kyzylorda oblast – 2;**
- **South Kazakhstan oblast – 2.**

Arrangement of noise strips

In 2017 – 5,519.4 m2 arranged

Installation of LED road signs

In 2017 - 116 units installed

Installation of speed measuring units with radar boards

In the current year speed measuring units with information radar boards are planned to be installed in 4 oblasts (*Atyrau, Mangistau, South Kazakhstan, Kyzylorda oblasts*)

Thank you for attention!