

Analysis of the Current State of Population Growth and Level of Vehicle Ownership

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Abstract. As a result of the growth and development of the world's population, the needs of each person are increasing more and more. For example, in the 1980s, the average need of a person was 80, by the 2000s, this indicator increased to 200, and by now it is more than 400. This indicates the development of humanity. Also, the level of automobileization is increasing year by year. These indicators, on the one hand, ease the problem of humanity, on the other hand, they cause great damage to the environment. This article analyzes population growth and carization rates over the years.

Key words. Population, Motorization, Globe, world population.

Introduction. This article analyzes the influence of the growth of the world population and the process of carization on the Republic of Uzbekistan and its appearance in these figures. Accurate statistics on population growth and the process of automobileization in each region of our republic are presented.

The main part. The increase in the number of people and the level of car ownership are indicators that directly affect the issue we are studying. The population is very sparse on the land. About 70% of the entire population lives on 7% of the land. 15% of the entire land (149 million km²) (22.4 km²) is not permanently inhabited. Such places include the island of Greenland, the north of the Canadian-Arctic archipelago, the Sahara desert, and similar uninhabitable places. The population is expected to reach **8,046,949,318** by the end of 2022. The natural growth of the population is positive and this year amounts to 98,415,064 people

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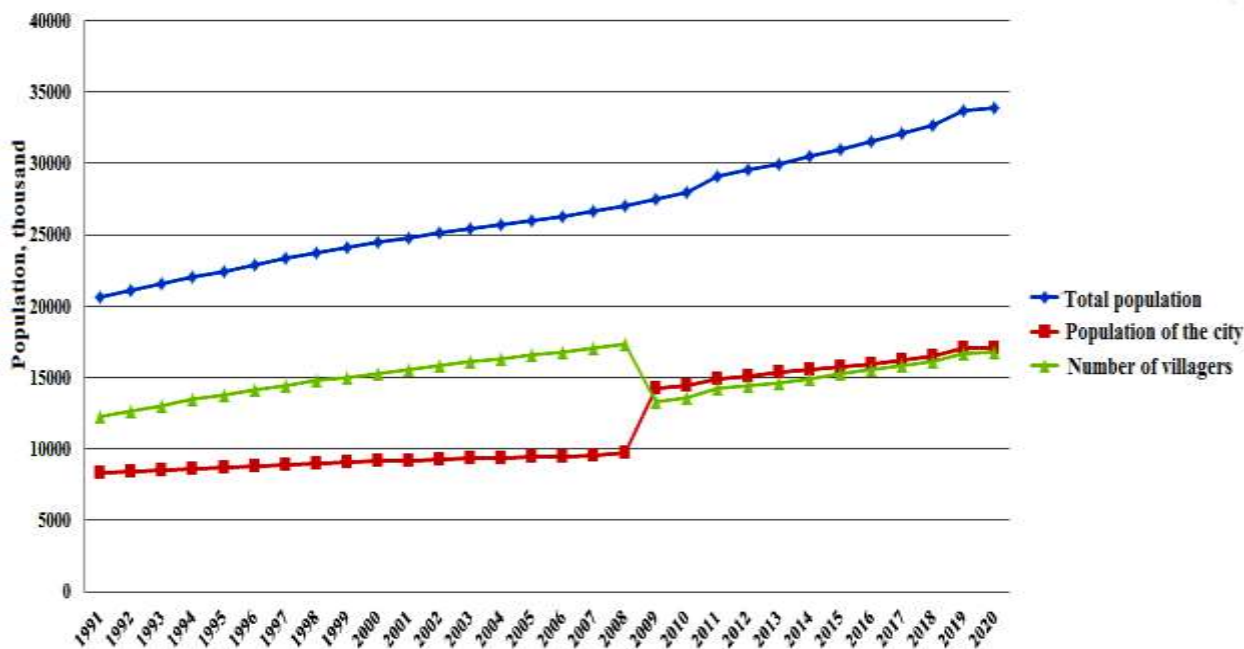
World population growth rate

Year	World population	Annual change	Density (Population/km ²)	City dwellers	City population %
2019	7 674 314 922	1.09%	52	4 370 991 213	50.3%
2020	7 7 56 041 003	1.0 6 %	52	4 378 993 944	5 0.6 %
2021	7 851 163 856	1.23 %	52	4 299 438 618	5 0.9 %

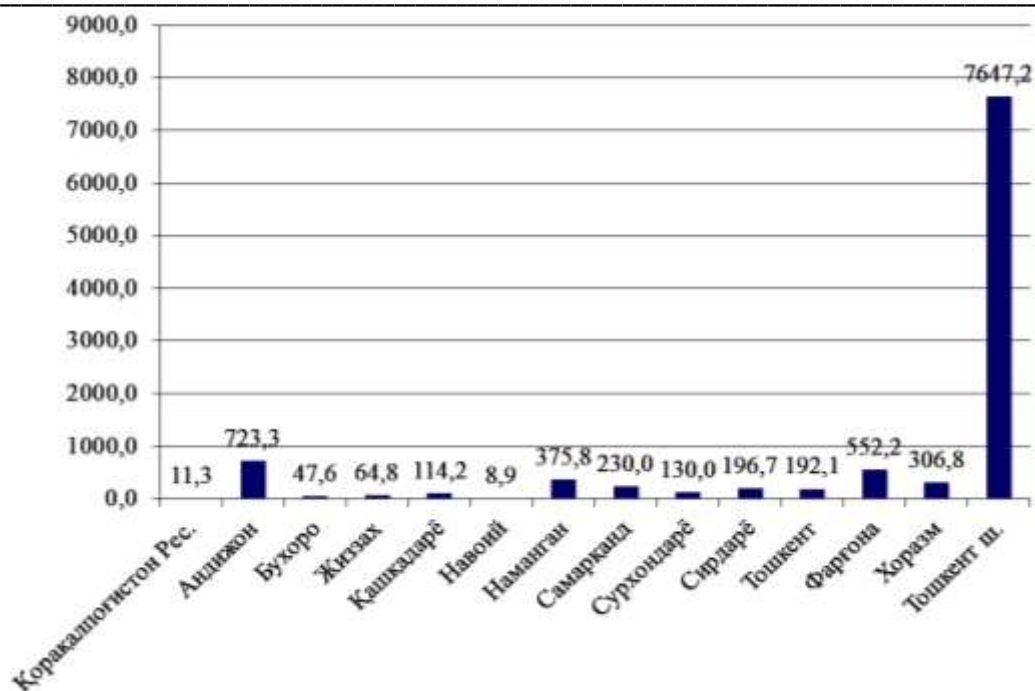
The permanent population of the Republic of Uzbekistan today is 35,821,029 people as of October 1, 2022, and the growth rate of the permanent population has increased by 0.9% since the beginning of the year. Since the beginning of the year, the population of our country has increased by an average of 55,300 people every month. of which 18,232.9 thousand are urban residents (50.9 percent of the total population), 17,588.1 thousand are rural residents

Number of permanent population of the Republic
 of Uzbekistan as of January 1 , 2022

Republic of Uzbekistan	Total population mln
Republic of Karakalpakstan	1, 9
Regions:	
Andijan	3, 2
Bukhara	1, 9
Jizzakh	1, 4
Kashkadarya	3, 4
Navoi	1 , 03
Namangan	2, 9
Samarkand	4 , 0
Surkhandarya	2, 7
Syr Darya	0 , 8
Tashkent	2, 9
Ferghana	3, 9
Khorezm	1, 9
Tashkent city	2, 8



1.1 - Figure. The graph of changes in the permanent population of the Republic of Uzbekistan in 1991-2020



1.2 - Figure. 20 Histogram of changes in population density in regions as of January 1 , 2022
 1.3

Analyzes of the regions of the republic show that as of January 1, 2022, Samarkand region has the largest population of 4.0 million people (11.4% of the population of the republic), followed by Fergana region with 3.9 million people (11.0 %), 3.4 million people (9.7%) in Kashkadarya region, 3.2 million people (9.2%) in Andijan region. As of January 1, 2022, the population is 3 million. the number of regions with more than one person was 4 [4] .

As of January 1, 2022, the number of permanent residents of Tashkent, the capital of the Republic of Uzbekistan, was 2.8 million people, an increase of 9% compared to 2020 [1] .

From the graph above, we can see that the population of Uzbekistan is increasing rapidly. In particular, we can see that the number of urban residents has started to grow sharply since 2009, as shown in Figure 1.1.

automobileization is increasing rapidly among the countries of the world. In Table 1.3 below, we can see how many vehicles per 1,000 people per person in cities around the world [2 , 3] . If we look at the figures in this table, it can be seen that the level of automobileization in Tashkent is slightly higher (4.2%) than in other cities.

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Applicable to individuals in cities around the world number of cars

Cities	Number of cars. For every 1000 people
Liechtenstein	782
Iceland	736
Luxembourg	686
Italy	668
Poland	665
Finland	652
Belarus	342
Kazakhstan	203

Turkey	157
Azerbaijan	121
Uzbekistan	90¹

Note : 1 information as of January 1, 2022.

Of course, the increase in the level of motorization in our country is related to the development of the car manufacturing industry in the country. That is, in 1996, the first car production was launched in Uzbekistan. As a result, the level of automobileization of Uzbekistan began to grow rapidly.

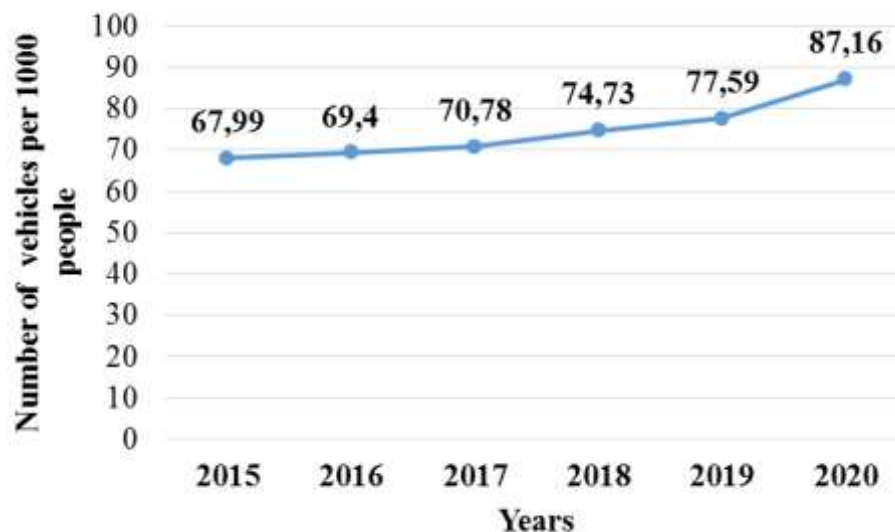
As of today (January 1, 2022), if we pay attention to the level of automobileization in Uzbekistan, the number of motor vehicles owned by individuals is 3,268,470 .

In particular :

- passenger cars - 3 051 734 ;
- trucks - 195 784 ta;
- buses - 6 854 ;
- minibuses – 8,946 ; special vehicles - 5,152 .

Including: as of January 1, 2022, the city of Tashkent is the most in the republic 's territories 525,028, Samarkand 392,475, Fergana 325,009 and Tashkent region 324 The population of 154 regions has motor vehicles [1] .

2022 In February, the Center for Economic Research and Reforms under the Presidential Administration reported that more than 3.2 million vehicles were registered in Uzbekistan , 89 percent of which were passenger cars [2] .



1.3 – Figure. The number of motor vehicles belonging to individuals in the Republic of Uzbekistan per 1000 people in years

Table 1.4
 Indicators of the level of motorization in the cross-section of years

Years	Personal car number	An increase over last year	Number of cases of A	An increase over last year	The degree of carization	An increase over last year
2018	2273419	3.75%	3 2.5	1.65 % _	70,78	1.99%
2019	2440276	7.34%	32.9	1.56 % _	74,73	5.58%
2020	2580133	5.73%	33.4	1.48 % _	77.59	3.83%
2021	2955295	14.54%	3 4.1	1.8 % _	87.16	12.33%
2022	3268470	10.6%	3 4.6	1.7%_	90	3.4%

Table 1.5
 The number of vehicles belonging to individuals in the Republic of Uzbekistan per 1,000 people, the composition of vehicles and the cross-section of regions

2018 year	General vehicles	from which :				
		Light vehicles	Trucks	Buses	Micro buses	Special cars
Republic of Uzbekistan	74	69	4	0.2	0.4	0.1
Republic of Karakalpakstan	55	50	3	0, 2	1	0.3
<i>Regions:</i>						
Andijan region	55	51	4	0.04	0.2	0.02
Bukhara region	95	87	6	0.4	1	0.3
Jizzakh region	49	43	4	0.3	1	0.1
Kashkadarya region	65	59	5	0.1	0.2	0.1
Navoi region	84	74	6	0.5	2	1
Namangan region	59	54	5	0.1	0.0	0.02
Samarkand region	79	74	4	0.1	0.2	0.1
Surkhandarya region	54	50	3	0.4	0.2	0.3
Syrdarya region	56	50	6	0.2	0.4	0.1
Tashkent region	83	78	4	0.2	1	0.04
Fergana region	66	62	4	0.2	0.4	0.1
Khorezm region	90	85	5	0.3	0.4	0.2
Tashkent city	144	139	4	0.1	0.3	0.2

to satisfy the demand of people for the service of vehicles in the society . At the same time, it also causes several problems associated with vehicles today. That is [11]:

- increase in traffic jams on the streets as the number of vehicles increases;
- increased demand for parking places of vehicles;
- reduced traffic speed on the roads;
- increased damage to the environment;
- deterioration of the psychophysiological condition of drivers and h.

If we look at the increasing demand for parking spaces alone, this is becoming a major problem today. As we know, each car requires 15 to 30 m² of parking space, and one car user uses two to five different parking spaces in one day depending on the daily usage of his car [4 , 5] .

For example, the number of cars in the UK is predicted to increase from 27 million to 39 million by 2030, with 2.8 million of these parked on the street. [6]

The above analyzes show that today the population of Uzbekistan and the level of automobileization are growing sharply. This in turn leads to many vehicle related issues such as the impact of transit parking on traffic safety which I am researching. In this regard, several solutions have been developed in many countries. However, there are enough problems in our country that need to be solved in this direction. That is, any driver who uses a personal or service car faces problems with temporary parking spaces in Tashkent city and regional centers and in many cases is forced to break the rules. As a result, traffic safety is significantly affected. For this reason, there is a need to ensure the safety of traffic in the parking areas of transit roads even in the conditions of Uzbekistan today [7-8].

Conclusion. In the second half of the 20th century, human development grew rapidly, and humanity witnessed a corresponding increase in needs. In the process of this growth, the level of car ownership of the population has also increased somewhat, which in turn causes unfortunate incidents. The number of deaths due to road traffic accidents is also increasing around the world, in our Republic alone, more than 2,000 people died as a result of road traffic accidents in 2021 alone. This is a call to increase traffic safety on the roads...

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