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Logistics determinants of the port of Gaženica in the context of tourism development

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ABSTRACT

The Zadar County has an important role in traffic, connecting the north and south of the Republic of Croatia. Zadar is the centre of the region, easily reached by the state roads and the modern highway A1 Zagreb-Split, air connections, ferry, shipping lines and railway. Based on the above mentioned, the city of Zadar should be seen as an important traffic centre of Croatia focused on the Gaženica port and its importance for the development of tourism as a crucial sector of the Croatian economy. The subject of this research is to identify and analyse all characteristics of the tourist destinations supply and demand, their traffic connections as well as the development of ports and port system of Croatia and their effect on the development of the new passenger port Gaženica in order to become one of the leading Mediterranean ports. The correlation between the issues of traffic connection in the Zadar County (road, sea, air and railway traffic) and the main characteristics of tourist supply and demand in the city of Zadar, as well as the impact of development of the port Gaženica on the tourist offer of the city, are interrelated objects of this research. Therefore, external transport accessibility plays an important role in it, which means if the accessibility is bad, it is an obstacle to the desired tourism development. The influence of a bad transport accessibility on the development of the destination is usually solved by investing into new transport solutions such as the construction of a new traffic infrastructure, introduction of new lines of all types of traffic, construction of larger parking lots in tourist destinations and the improvement of traffic and tourist signalling as well as the connection to the main traffic corridors. In order to increase the number of tourists in the above mentioned region, it is necessary to recognize current problems, as well as predict the future ones that may appear as a consequences of inadequate external transport accessibility on tourist development and to encourage their optimal solving.

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1 Introduction

An important indicator of the condition and development of the traffic infrastructure and the competitiveness of a particular traffic route is the importance of spatial component, i.e. the distance between certain points. Valorisation and competitiveness of traffic route depend on many different factors and some of the most important are: geographical position, traffic corridors, traffic flows, condition and investment in the traffic infrastructure as well as the modernization of the suprastructure, the use of modern transport technologies, gravitation area, existence of competition, introduction of a higher level in business informatization, traffic policy, tariff policy and numerous

other factors. The development of the traffic sector and its integration into European structures is achieved by the Transport Development Strategy of Croatia. The basic guidelines of the Strategy are overall goals of economic and social development of Croatia, protection of the environment, regional development, as well as the restriction of the negative effects and stimulation of further progress. In this context, the City of Zadar, with its corresponding region, represents a good example of a harmonized supply and demand relations of traffic resources and satisfaction of tourist needs. Due to its exceptional historical, traffic and economic factors, the Zadar region has an important position on the Croatian map in relation to the tourist offer. The County covers 3,643.33 km² and is situated in the

heart of the Adriatic coast. It includes the seacoast and the islands of northern Dalmatia, the area of Ravni kotari, the area of Bukovica, a part of the mountainous area of Lika with the Pounje, the area of the Velebit Channel and of the mountainous area of Velebit as a natural border with the continental Croatia and Lika. The Zadar County has the longest coastline (1300 km) of all Adriatic counties thus having a positive impact on the development of the economy and especially of tourism. Situated in the heart of the Adriatic, Zadar is the urban centre of the County and an administrative, economic, cultural and political centre of the region. The population of 75,062 inhabitants makes Zadar the fifth largest city in the country (after Zagreb, Split, Rijeka and Osijek) and the third along the Adriatic coast (after Rijeka and Split). Since the independence of Croatia up to today, Zadar has been one of the Croatian cities with the highest rate of economic growth. It represents a city with an outstanding potential for further progress and it is of crucial importance to define a local development policy and focus well on the future development of strategies and investments. The particularity of the city is in its historical monuments and cultural heritage. Numerous churches and cultural monuments have been preserved from all historical periods, as well as the historical city nucleus and many tourist attractions. Therefore, Zadar is considered as one of the most popular Croatian tourist destination. The London Times named Zadar as the centre of entertainment on the Adriatic, and in 2016 was chosen as the best European destination in competition with many famous European cities. The City of Zadar has an area of 194.02 km², of which the landside accounts for 5.26% while the sea comprises an area of 300

km² or 9% of the whole sea area of the Zadar County with its corresponding submarine world. The total length of the coastline is 312.54 km (landside occupies 28.57 km or 9.1 % and the islands 283.97 km or 90.9% of the area), which has a positive effect on the economic and especially on the tourist development.

2 Transport accessibility of the City of Zadar

Due to its position in the heart of the Adriatic Sea, the Zadar County represents an important traffic hub that connects the north and the south of the Croatian coast and the Dalmatia region with other parts of Croatia as well as with other countries of the European Union and wider. Thanks to the highway A1 Zagreb – Zadar – Split – Dubrovnik, as a part of the Adriatic and Ionian traffic route with a connection to Zadar (Port of Gaženica), and to other state, county and local roads, air links (regular, low-cost and charter flights to a numerous foreign and domestic centres), sea links (ferries, ships, cruisers, etc.) and railway traffic, the area of the City of Zadar has become recognized as an easily reached destination with a numerous interesting sites in the city and its surroundings. A rich cultural heritage, areas of natural beauty with national and nature parks located nearby the city classify the City of Zadar at the very top of the Croatian tourist offer. The City of Zadar is a destination easily reached either by land, sea or air. It has a good traffic infrastructure through which it is directly connected to other larger Croatian cities like Zagreb, Rijeka, Split and Dubrovnik, with outstanding capacities and contemporary service of numerous marinas. The ferry port as well as the new cruiser port are located in the new spa-



Figure 1 The Port of Gaženica

cious Port of Gaženica, only 3 km away from the centre of the city. The small but contemporary airport, only 9 km far from the centre, Zadar is connected with large cities in Croatia and some European capitals as well (London, Paris, Berlin, Stockholm, Bruxelles, Marseille, Frankfurt, München, Dublin, Manchester, Oslo, Hamburg, Zürich, Stuttgart, Köln, Düsseldorf, Bratislava, Karlsruhe, Warsaw, Göteborg, Haugesund, Billund, Wrocław, Gdansk; Poznan i Friedrichshafen). From Zagreb, Rijeka or Split, it is only a couple hours' drive through the modern A1 highway from where it is easy to be connected to the European road network.

2.1 Maritime transport

The role of maritime transport in the development of the Zadar region is very significant. Maritime activities are considered as a traditional activity of the population of these areas and the basis of economic and social development. As a part of the economy, maritime activities are specific in comparison to other transport sectors and they take place through seaports for public transport and ports for specific purposes. The Zadar City Port, which is located in the western part of the Peninsula, is of special international interest. The Port of Zadar is opened for international, national and local transport. It ranks second per number of passengers on the Adriatic, after the Port of Split and disposes with ten berths for passenger ferries. Two of them are for international traffic with a capacity of 150 to 200 metres in length and draft depths from 7.5 to 8 metres. Other berths receive ships from 50 to 70 metres in length and 5 to 7 meters of draft. The island part of the Zadar region is connected to the city with local ferries and passenger boats. The voyage from Zadar to the surrounding islands is very attractive because of the gorgeous nature and picturesque archipelago. Ferries from Zadar operate on the following lines: Zadar-Preko, Zadar-Dugi otok (Zaglav, Brbinj), Zadar-Iž, Zadar-other islands (Molat, Ist, Premuda, Silba, Olib), Zadar-Silba-Lošinj-Pula and on the international line Zadar-Ancona (Italy).

The Port of Gaženica is connected to the modern highway as a part of an important traffic route Baltic-central Europe-Zadar-Ancona-middle Italy and has a direct and rapid access to the Zadar Airport (more than 0,5 million passengers per year). International and local ferries, passenger and especially cruise lines (2.5 million passengers per year in the Port of Zadar), air and road traffic, with necessary better rail connections in the future, are of great importance in connecting the surrounding areas (Krka, Šibenik, Vodice, Kornati, Plitvice Lakes, Zrmanja, Velebit, Pag, Novalja, Lika, Karlobag, Nin, Biograd, Ugljan/Pašman, Dugi otok, etc.) with the areas of tourist demand right across the traffic infrastructure of the City of Zadar. The local traffic ensures a direct connection of the islands by ferry and passenger boat lines to the Zadar city ports: the Old City Port located on the Peninsula and the New Ferry and Cruise Port of Gaženica. The ferry port causes an intense car traffic jam which is inappropriate for a very valu-

able and historical area of the Peninsula, mostly intended for pedestrians. The basic model of connecting the islands with the mainland is based on the separation of the ferry and passenger traffic. Therefore, daily services of passenger boat lines have to include good quality crafts able to transport not only passengers, but small quantities of cargo as well. Furthermore, it is necessary to establish an interconnection among islands with smaller crafts thus offering to tourists a high quality links. The largest part in the total passenger traffic is effected by local lines, especially by the Zadar-Preko ferry line, which is also the busiest ferry line on the Adriatic with 1,645,921 passengers in 2014 as compared to the year 2013 with 1,642,286 passengers. That is about 75% of the total number of passengers in the Port of Zadar. Apart from domestic ferry lines, Zadar is connected to the Italian city of Ancona with the international ferry line. Since July 2015, the international ferry line Zadar-Ancona, together with other domestic ferry lines, has been moved to the new ferry and cruise port of Gaženica, while the other ferry lines have remained in the Old City Port in the centre of the city. In the circle of less than 10 km, the new port has quite perfectly integrated the sea, railway, road and air traffic. The backbone of this connection is a four-lane access road Zadar 2-Gaženica which directly connects the port with the highway Zagreb-Split, the airport in Zemunik and the future economic zone of Crno.

2.2 Road transport

Zadar is one of the best traffic related cities in Croatia because of its favourable geographical position, good connections with national traffic corridors, as well as continuous investments in the road infrastructure and positioning the City on the national traffic map. However, the transport system inside the urban area is not on a satisfactory level, despite the fact that Zadar has good connections with national traffic corridors. The basic road network of the City is characterized by insufficient throughput capacity in peak loads periods (especially during summer), as well as by the lack of integrated traffic light systems. Within the City area, the following roads are classified as national ones:

- Zadar 2 – Gaženica (D424)
- D8 Rijeka – Zadar – Split,
- D306 Vir – Nin – Zadar (D8),
- D407 Zadar (ferry port) – Zadar (D8)
- D422 Babindub (D424) – Zadar Airport.

According to the 2012 Act (Official Gazette of the Republic of Croatia No.44/12), all other roads are classified as unclassified roads. Currently, there is an intensively regulation of registering the unclassified roads and according to the rough estimation, the length of the roads in the area of Zadar are around 500 km. The most intense traffic takes place on the national road D8 (JTC)-Zadar-Zeleni Hrast. The reconstruction of the road through Zadar from Crno to the crossroad "Industrial Zone 2", are signifi-

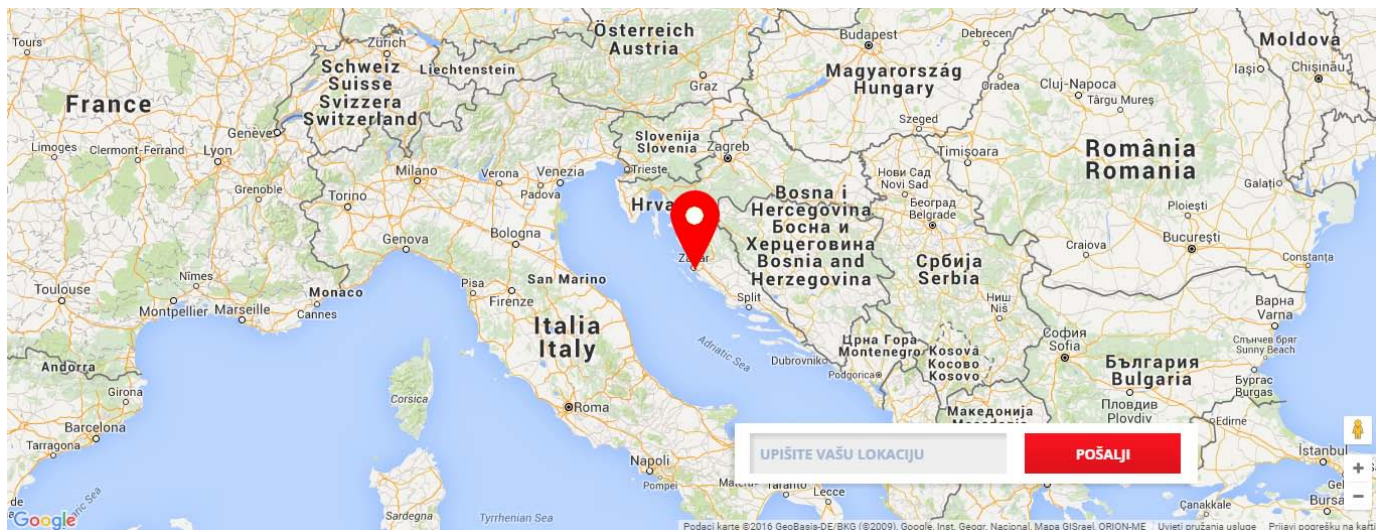


Figure 2 Road Access and the Connection of the Port of Gaženica with Middle Europe

Source: <http://www.luka-zadar.hr/hr/povezanost/cestovna>, 5th May 2016

cantly repaired traffic components and, therefore, considered as safe to traffic. The existing bus station is equipped with modern technology and offers quality services to passengers on intercity and suburban lines. It is located right next to the railway station. A geographically adequate position and good transport connections are good conditions for a future entrepreneurship development as Zadar is very well connected with the national and international transport routes: to the Zadar Airport some 9 km, the A1 Highway at a distance of 7 km and only 1 km to reach the Port of Gaženica.

Public transport is characterized by a process of introducing modern buses while the company's fleet of vehicles is solidly equipped. Bus transport in Zadar is managed by the company Liburnija d.o.o., whose majority owner is the City of Zadar. All public areas in Zadar marked as chargeable parking lots are regulated by the concession holder company "Obale luke i lučice d.o.o.". There are no public garages operated by the City of Zadar. Garages are in private ownership and are entirely or partially used as public ones. Public garages in the City centre are placed in the TIZ building (650 parking spaces) and in the City Galleria (400 parking spaces). Other public garages are usually available as a part of shopping centres in different parts of the City. In the historical City nucleus, the number of parking spaces is limited, since most of the City streets and areas are intended for pedestrians. With a constant parking spaces control, the number of illegally parked vehicles on pedestrian and green areas could be reduced. In the same way, traffic jams in the centre of the City could be reduced, especially in the high season. The solution of the transport system in the City of Zadar is based on the Spatial Development Strategy of the Republic of Croatia and on the Transport Development Strategy of the Republic of Croatia, according to which among the first group of priorities lies the construction of the Zagreb-Split-Dubrovnik Adriatic Highway with connections to the fast roads

Zadar1-Zadar and Zadar2-Gaženica. The Highway corridor Zadar1-Zadar follows the route of the existing section of the D8 Highway, ie. JTC. The route of the fast road Zadar2-Gaženica is built and located on a new corridor, that provides the easiest access of the port of Gaženica to the A1 Highway.

2.3 Rail transport

The port of Zadar is connected with its hinterland with two railway tracks, the one from Lika and Una and the other from Zagreb, being in this way also connected with all European neighbouring countries as well.

- Lika's railway track: Zadar-Knin-Gospić-Karlovac-Zagreb. Length of the track 424 km, axial pressure 18 Mp, maximum height 794 m.
- Una's railway track: Zadar-Knin-Bihać-Sisak-Zagreb. Length of the track 418 km, axial pressure 20 Mp, max. height 674 m. The Una's railway track is electrified.

The principal railway track which passes through the Zadar County is the Lika's railway track and connects the largest urban centres of Dalmatia with central Croatia via Knin. This railway track has a character of an auxiliary track, as well as the railway track Knin-Zadar. The technical condition of the railways is unsatisfactory, mostly because of damages caused by war, its being out of function and due to the lack of maintenance and many years of disinvestment in the development and modernization. Because of the bad conditions of the railway tracks, unfavourable length of travelling time and due to the improvement of road connections, establishment of frequent bus lines and because of the general increase in the use of motor vehicles, railway transport has become absolutely uncompetitive. There is a huge delay in the maintenance and renovation of railway tracks. The journey to Zagreb takes 10 hours. The result is a noticeable decline of explo-



Figure 3 The Railway Connection of the City of Zadar on the Network of HŽ (the Croatian Railways)

Source: <http://www.hznet.hr/> / 5th May 2016

tation capabilities, primarily due to speed and the level of safety and reliability, and thus of transport capabilities as well, which make rail transport not a competitive one. The number of passengers transported in the last fifteen years is in decline as the result of a less use of the rail transport by domestic users and of the reduced number of tourists arriving by train.

Croatian Railways (HŽ) currently do not have a plan for the reconstruction, improvement or electrification of the Zadar-Knin tracks due to financial limits and can barely carry out the minimum necessary maintenance work along these tracks. The only project that is not a long-term project is the construction of a 7 km long new section which bypasses city area of the City of Zadar, including the construction of a new cargo terminal in Gaženica. Croatian Railways do not plan to start working before the long term period (2025) along the tracks other than those that follow the European Vb and X corridor.

2.4 Air transport

The Zadar Airport is located in Zemunik Donji, only 12 km away from the City of Zadar, in the vicinity of the Zagreb-Split A1 highway Zadar 2 connection. The airport is of the 4E category and is able to receive any kind of

planes, mostly passenger planes, but has also an increasing role in the cargo transport. With the anticipated extension of the runway, it will be equipped for accepting even the largest planes. It has a very good location in the area of northern Dalmatia, so that all surrounding areas gravitate to it. With a plenty of built-in tourist capacities, this airport plays an important role in the development of the tourist economy within the entire area of the Zadar region. With the introduction of charter flights in the tourist traffic, transport costs have been significantly reduced, travelling time has been multiply shortened and the mobility and the average travelling distance have been increased remarkably. Regardless of the economic unjustification, it is necessary to build heliports for the islands of the Zadar region on specific locations or even the areas of sport fields can be occasionally used. For the safety of local population as well as for the seasonal visitors to the islands, heliports are necessary because they will ensure interventional transport to major coastal centres.

The arrival of the low-cost airline companies to the Zadar Airport has caused a rapid development of the airport. The only problem that is present and associated with low-cost airlines is the abolition of flights related to Zadar during the winter months, namely from the end of October to the beginning of March.

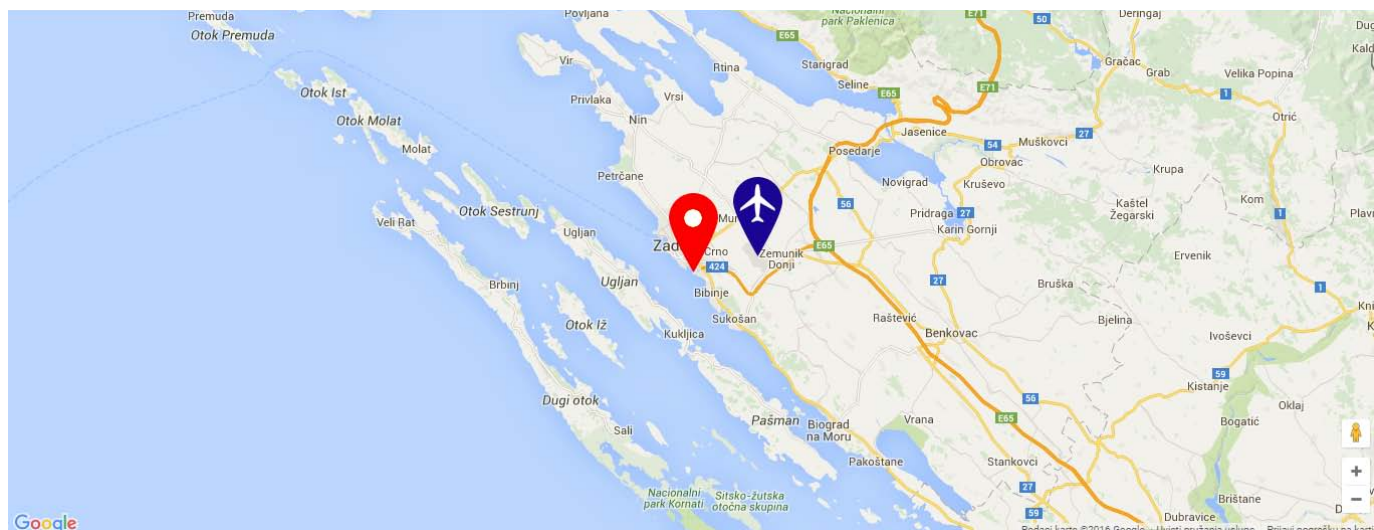


Figure 4 Position of the Zadar Airport

Source: <http://www.luka-zadar.hr/hr/povezanost/zracna>, 5th May 2016

3 The transport development policy of the City of Zadar

Good traffic connections and important geo-strategic position are the basis in the creation of the transport development policy in the future development of the City of Zadar. Primarily, it is necessary to achieve progress in the local transport network by integrating the local transport routes in order to obtain flowability, higher traffic communication and unique transport unit. The development of air transport has been conceived primarily through the development of the Zadar Airport, to which all necessary support in the realization of strategic projects (extension of the runway, construction of heliports, etc.) must be ensured. In the railway transport, it is necessary to modernize the railway network and to encourage effective participation of the City of Zadar in the national network. The development of maritime infrastructure is mostly determined by the realization of the national project Port of Gaženica and also by other investments in the maritime infrastructure in the City, in order to strengthen the position of the City of Zadar in the international maritime frameworks. A further efficient development of the overall transport system of the City requires the intermodality of traffic routes that involves the routing of the traffic from road to rail, coastal and inland waterways, and, therefore, the reduction of road traffic burdens and their negative impact on the environment. Regarding the improvement of the public infrastructure and services that affect the development of tourism, the most important thing is to develop and improve the public utility tourism and transport infrastructure. High quality and competitive destination must have developed a quality public tourism infrastructure. Customizing traffic flows from the mainland towards the islands, in accordance with the development needs, contributes to the improvement of conditions and increase in the quality of life on the islands. Furthermore, one

of the strategic goals is to strengthen the international integration of Zadar through air, sea and railway transport. From the above mentioned facts, it can be concluded that the precondition for the development of the destination is its connection with emissive markets.

Creating preconditions for the development of the new cruise port of Gaženica is of extreme importance for the City of Zadar. With cruise ships, the port would have fully utilized capacities and encouragement of accelerating and multiplicative effects that home port carries with. The holders of this project are the City of Zadar, the Port of Zadar Authority, the Port of Zadar, public and private sectors, while the beneficiaries are the City of Zadar, the Zadar County, the Zadar Tourists Board, the Port of Zadar Authority, the Port of Zadar, public and private sectors, population, tourists and others. Activities which are needed are the complete construction of the Port of Gaženica, design of marketing activities in order to attract large cruise companies, development and usage of the infrastructure and services intended for cruisers and others. By following the indicators such as the number of berths for cruise ships, the number of passengers, the number of services provided, the number of ships to whom Zadar is a home port, etc. it would be possible to recognize the results of progress of the Port of Gaženica and its competitiveness on the global market. With a complete implementation of the Port of Gaženica project, the City of Zadar should become one of the most significant ports on the Mediterranean. Therefore, it is necessary to remove all development limitations in the field of maritime infrastructure, to strengthen the international maritime routes, but also to ensure the preconditions for the operation of coastal and international lines as well as for the regulation of all local ports. What follows is a review of the traffic statistics in the port of Zadar; the number of domestic and international ferry traffic statistics, as well as the forecast for the future period from 2005 to 2019.

Table 1 SWOT Analysis of the Transport Accessibility of the City of Zadar in the Context of Tourism Offer

STRENGTHS	WEAKNESSES
<ul style="list-style-type: none"> - long and rich tourist tradition - good transport connections and geographical position - high level of development of air transport with the existence of low-cost airlines - favourable geostrategic position in the relation to national parks and other tourist destinations - rich and complete tourist offer in high season - great logistic potential of the Port of Gaženica - integration of rural areas as agricultural, ecological and tourist potentials in the wider area of the City of Zadar 	<ul style="list-style-type: none"> - lack of quality personnel in tourism - relatively short tourist season - lack of basic infrastructure (areas and objects) for events throughout the whole year, ie. for great concerts, conferences and other - bad infrastructure of the beach, access roads and signalization - incoordination of ferry lines towards the islands and its bad transport connections - insufficient use of the existing capacity due to weak coordination of tourism stakeholders, private and public sector - inadequately stimulated tourist agencies in articulating tourist programmes in the tourist policy of the City of Zadar - lack of parking places and the lack of public garages
OPPORTUNITIES	THREATS
<ul style="list-style-type: none"> - better connection of tourism with other tertiary sectors - construction of public garages at the entrance of the city, construction of bicycle paths, improvement of quality and informatization of public transport - networking of institutions and joint start of projects financed from EU funds - development of the marina in the city centre (after the relocation of ships in the Port of Gaženica) - natural potential for the utilization of renewable energy sources - expansion of the tourist market, expansion of the tourist offer of the Zadar islands - design and promotion of tourist offer for guests from cruisers, improvement of excursion offers 	<ul style="list-style-type: none"> - decline of tourism demands due to the economic situation or for other reasons - political turmoil at the level of national and local authorities - insufficient support of competent institutions for the improvement of tourism - high taxes, charges and non-permanent tax policy - lack of criteria according to which the tourist offer is created and supported - undeveloped rail traffic in Croatia, high tolls on highways - dependence on weather conditions, exposure to natural disasters (wind, rain) - global economic crisis, the refugee crisis - emigration of population due to unemployment

Table 2 Domestic Ferry Traffic Statistics (Passengers and Vehicles) for the 2005-2019 Period

Year	Passengers	Vehicles
2005	2,064,505	293,587
2006	2,164,896	300,628
2007	2,253,487	332,639
2008	2,392,364	349,342
2009	2,333,544	332,052
2010	2,362,054	312,939
2011	2,349,575	314,828
2012	2,321,836	312,908
2013	2,217,215	319,251
2014	2,080,811	339,758
2015	2,156,480	360,474
2016	2,200,000	370,000
2017	2,270,000	380,000
2018	2,350,000	390,000
2019	2,450,000	405,000

Source: The Port of Zadar Authority

According to the statistics, the number of passengers towards the islands in domestic traffic is increasing continuously. The real situation is discovered by apparent and significant increase of vehicles in the domestic lines. The cancellation of the whole year's line and the constant reduction in the frequency of arrivals by the national ship-

Table 3 International Ferry Traffic Statistics (Passengers and Vehicles) for the 2005-2019 Period

Year	Passengers	Vehicles
2005	77,334	22,843
2006	68,852	21,920
2007	64,669	19,331
2008	59,410	17,842
2009	62,742	17,370
2010	56,723	14,319
2011	61,112	15,174
2012	47,434	9,623
2013	38,626	6,658
2014	42,406	7,354
2015	33,215	5,580
2016	35,000	5,800
2017	40,000	6,400
2018	45,000	7,000
2019	55,000	8,500

Source: The Port of Zadar Authority

ping company in the international passenger and vehicle liner traffic, has caused a decline in the turnover in this segment of traffic. As respected, the segment of cruise traffic is increasing dramatically due to new infrastructure capacities. Tourist offer is very significantly expanding in the field of cruises over the world's seas. Large investments

Table 4 Cruise Traffic Statistics for the 2012-2019 Period

Year	2012	2013	2014	2015	2016	2017	2018	2019
Calls	57	69	77	96	120	130	140	150
Passengers	20,958	33,647	53,791	74,660	125,000	145,000	165,000	190,000

Source: The Port of Zadar Authority

point to a trend of building new ships with accommodation facilities from 2500 to 5000 passengers, of gravitating towards the extension of the cruising season on more than eight months a year and to the diversity of offer. Cruise companies are defined in accordance with special offers, interests of the company and duration of the voyage. All of this has a direct impact on the expansion and reconstruction of port facilities in order to satisfy the requirements and market conditions. In this way, new opportunities are opening up for income achievement in the port, even in periods when there are just a few or even a single cruise ship in the port due to seasonal factors or unexpected drop in business. It is obvious that investment in the port infrastructure and suprastructure can become a part of the ongoing development process of the port. The analysis of the contemporary international fleet of cruise ships indicates that, today, an average ship is longer than 230 metres and transports around 1700 passengers with a constant increase in the length of ships. It is very likely that in the next decade, cruise ships with an average length between 250 and 330 metres, will become standard ships.

The dynamics of the monthly traffic of ships and passengers on a cruise, indicates that the culmination of the season for this type of tourism is in the period from May to October, while there is remarkably less traffic from November to March. Considering the favourable climatic and other conditions, the extension of the season is one of the strategic goals of tourism in the City of Zadar.

In the past two years, the Port of Zadar Authority has invested considerable efforts in the development and implementation of the overall system of concessions in their area. Beginning with the extension of the primary concession in the cargo port of Gaženica in 2014, on an additional 25 years (until 2039) with significantly better financial conditions of the concession, and then, in 2015, with the release of the passenger port of Gaženica in operational traffic and placing a newly created port area in the function of development and increasing incomes, completely new and very commercial concessions have been created, the number of identical concessions have increased (for example, fuel supply, travel agency), a control of the coming-in concessionaries has been introduced (especially in the international traffic) as well as a regular submission of reports (quarterly, semiannual) from the realized incomes of concessionaires. The planned income from the concessions in 2016 should be observed with some reserve since the public bidding procedures are still in progress. The Marketing Plan of the Port Authority for the 2016-2019 period highlights more the main goals, as for example the

affirmation of the port of Gaženica, ie. the City of Zadar, on the cruise market famous for its large ships (more than 300 metres in length and of a gross tonnage of over 100,000), construction of port suprastructure, complete construction of the passenger terminal structure and other objects based on the city's urban plan. To achieve these goals, it is necessary to start with a number of activities in order to create the major preconditions to achieve the planned results. These activities include:

- reassess and adaptation of existing tariffs
- adaptation of operational tasks to the new mode of work with improvements and efficiency of human resources,
- elaboration of the plan of concessions with a new concessions; one for the management of the international part of the terminal structure and the others for the domestic part of the structure,
- promotional activities,
- coordination with relevant public services in order to design and implement sustainable development policy,
- according to the Marketing Plan of the Port of Zadar Authority for the 2016-2019 period, it would be desirable to present Zadar and other Croatian ports as a popular destination for cruisers on international destinations like London (World Travel Market), Madrid (FITUR trade fair), Berlin (international fair of tourism ITB).

The promotion of the destination, timely information and continuous improvement of its offer is the most important part of the marketing of the Port of Zadar Authority, as well as of the Zadar Tourist Board and of various maritime and travel agencies.

4 Conclusion

The City of Zadar with the corresponding microregion is a good example of a harmonized relation between the supply and demand of traffic resources in order to satisfy the tourist needs. The area of the Zadar County has an important position on the map of Croatian tourist offer due to its outstanding historical, transport and economic factors. The focus on the tourist valorization of the Zadar microregion is the completion of the Zadar New Port Project – Gaženica. In the circle of less than 10 km, the newly built port integrates quite perfect the sea, rail, road and air traffic. The backbone of this connection makes the four-lane access road Zadar 2-Gaženica which directly connects the port with the Zagreb-Split highway, the airport in Zemunik and the future economic zone of Crno. This project will reduce the pressure of receiving passenger

ships and the largest passenger cruise ships. The maritime transport system will ultimately transverse the old city port on the Peninsula into a new ferry, cruise and cargo port of Gaženica. Each of these ports will be partly equipped with specialized facilities that will be operating for both the idomestic and the international traffic. A special attention should be paid to the promotion of contents (infrastructural and suprastructural) towards interest groups depending on the form of the activities for which it is planned to announce concessions. With the support of the Port of Zadar Authority together with the Zadar Tourist Board and all relevant stakeholders, passenger services on the one-day visit to the City and its surroundings, are a presumption for a quality offer and satisfaction of passengers and shipping companies and high positioning of the Port of Zadar on the global cruises market.

Empowerment of Zadar as an important international port and ensuring all the necessary conditions (human resources, infrastructure, etc.) will create conditions and encourage the formation of networks with much faster and more frequent connections of the lines with the Adriatic and Mediterranean ports. One of the aims would be also the separation of the ferry and shipping lines transporting road vehicles from fast tourist passenger lines which would reduce the pressure of passenger ships to the historic nucleus of Zadar. The Port of Gaženica has been established in order to increase the number of passengers, tons of cargo, number of new and renovated ports and small ports as well as more frequent connections to the lines with international and Mediterranean ports.

Since this is a very complex project in a formal and legal sense, it is necessary to make significant efforts in order to harmonize the basic elements, to reach an agreement with all relevant subjects and to create a model for investments that will satisfy legal and economic aspects of the project. In 2016, started the construction of the passenger terminal structure as a part of the new Port of Gaženica, and financial resources are ensured through a loan from KFW. The terminal structur will include a domestic terminal traffic, a terminal for the international ferry traffic and cruiser traffic, but also a space for public services as a part of international transitions (permanent border crossing for the Zadar maritime transport). By the end of the year 2017, the construction of the passenger terminal structure and the opening of a new commercial centre is expected to be completed.

References

- [1] Baričević, H., *Promet u turizmu*, Visoka škola za turizam Šibenik, Šibenik, 2003.
- [2] Erlić Š., et al.: *Strategija razvoja grada Zadra 2013 – 2020*, Razvojna agencija Zadarske županije, ZADRA d.o.o. , Zadar, 2013. Online: <http://www.grad-zadar.hr/repos/doc/Strategija%20razvoja%20grada%20Zadra.pdf>.
- [3] Kesić, B., Jugović, A., *Menadžment pomorskoputničkih luka*, Pomorski fakultet Sveučilišta u Rijeci, Liber d.o.o. Rijeka, Rijeka, 2006.
- [4] Kuzman, Z., Baričević, H., Bistričić, A.: *Contribution to Traffic Planning Methodology Improvement*, Znanost i razvitak prometa, FPZ, Zagreb, 2012.
- [5] Turpin, F.M., et al.: *Consultancy services for technical assistance for an overall project management of new ferry port at Gaženica, Feasibility study for a container terminal at Gaženica – Final feasibility report*, Zadar, 2012.
- [6] Vidučić, V.: *Pomorski turizam – prometne, razvojne i ekološke dileme*, Sveučilište u Splitu, Pomorski fakultet Split, Split, 2007.
- [7] *Strategija prometnog razvoja RH za razdoblje od 2014. do 2030. godine*, Ministarstvo pomorstva, prometa i infrastrukture, Zagreb, 2014., *Strategija razvoja turizma grada Zadra za razdoblje 2016.–2026. godine*, Sveučilište u Zadru, Zadar, 2016.
- [8] *Strategija razvoja grada Zadra 2013.–2020.*, Razvojna agencija Zadarske županije, ZADRA d.o.o., Zadar, 2013., <http://www.zadar.hr/stratesko-planiranje/strategija-razvoja-grada-Zadra/>.
- [9] *Strategija pomorskog razvitka i integralne pomorske politike RH za razdoblje od 2014.do2020.*Zagreb,2014., http://www.mppi.hr/UserDocsImages/POMORSKA%20STRATEGIJA%20VRH%202207201%20web%2026-7_14.pdf.
- [10] Podaci iz Turističke zajednica Grada Zadra, <http://www.zadar.travel/>.
- [11] Podaci iz Lučke uprava Zadar, <http://www.port-authority-zadar.hr/index.php>.
- [12] Podaci iz Županijska lučke uprava Zadar, <http://www.cpa-zadar.hr/>.
- [13] Podaci iz Grada Zadra, Gradska uprava, <http://www.grad-zadar.hr/>.
- [14] Podaci iz Lučke uprave Zadar (Marketing plan Lučke uprave Zadar).
- [15] http://www.agencija-zolpp.hr/Portals/12/download/Putnici_Vozila_.
- [16] <http://www.grad-zadar.hr/repos/doc/ID%20UPU%20Crno%20-%20elaborat.pdf>.