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> Organisation des Nations Unies pour l'éducation, la science et la culture

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ORGANISATION DES NATIONS UNIES POUR L'EDUCATION, LA SCIENCE ET LA CULTURE

CONVENTION CONCERNING THE PROTECTION OF THE WORLD CULTURAL AND NATURAL HERITAGE

CONVENTION CONCERNANT LA PROTECTION DU PATRIMOINE MONDIAL, CULTUREL ET NATUREL

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<u>Item 7 of the Provisional Agenda</u>: State of conservation of properties inscribed on the World Heritage List and/or on the List of World Heritage in Danger

<u>Point 7 de l'Ordre du jour provisoire</u>: Etat de conservation de biens inscrits sur la Liste du patrimoine mondial et/ou sur la Liste du patrimoine mondial en péril

#### MISSION REPORT / RAPPORT DE MISSION

Natural and Cultural Heritage of the Ohrid region (the former Yugoslav Republic of Macedonia) (99ter)

Patrimoine naturel et culturel de la région d'Ohrid (ex-République yougoslave de Macédoine) (99ter)

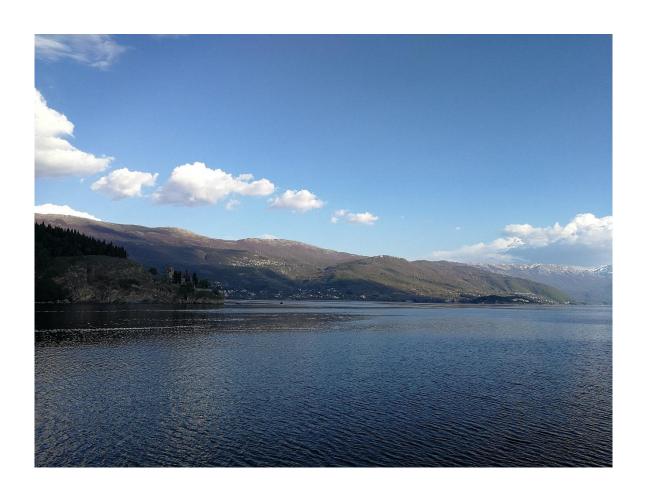
9 - 14 April 2017 / 9 - 14 avril 2017

### **Mission Report**

## Joint World Heritage Centre/ICOMOS/IUCN Reactive Monitoring Mission to the World Heritage property

# Natural and Cultural Heritage of the Ohrid Region (the former Yugoslav Republic of Macedonia)

9 - 14 April 2017



Cover Photo: Lake Ohrid © UNESCO/Alexandra Fiebig

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Last but not least, the mission expresses its gratitude to the World Heritage Centre, ICOMOS and IUCN for their support throughout the mission and the drafting this report.

#### **EXECUTIVE SUMMARY AND LIST OF RECOMMENDATIONS**

#### **Background**

As requested by the World Heritage Committee at its 40th session (Istanbul/UNESCO, 2016), a joint World Heritage Centre/ICOMOS/IUCN Reactive Monitoring mission was invited by the State Party to the property, and was carried out from 9 to 14 April 2017. The objective of the mission was to assess the overall state of conservation of the property, to review progress made in the implementation of the Committee's Decision, and to provide technical advice to the State Party with regards to the scope and development of a Strategic Environmental Assessment (SEA) and a Heritage Impact Assessment (HIA) which would comprehensively assess the potential individual and cumulative impacts of all proposed infrastructure projects and other major projects on the Outstanding Universal Value (OUV) of the property.

#### **Mission Methodology**

Widespread consultation occurred with national, regional, and local authorities, site managers, and non-governmental organisations (NGOs). The mission undertook on-site visits and received a detailed introduction to a series of documents, plans and programs from the authorities of the former Yugoslav Republic of Macedonia.

The mission also took into account the results of the Periodic Report, and in particular Section II on the Natural and Cultural Heritage of the Ohrid region in which the State Party assesses the main threats and management needs of the property<sup>1</sup>.

A special meeting with the NGOs and the members of the mission was organised by the authorities. The mission received documents from the civil society raising concerns on a wide range of issues on the state of conservation of the property, which points to the need to establish genuine participative approaches to the management of this World Heritage property.

#### **Overall State of Conservation**

The mission expressed its concern about the threats faced by the natural values of the World Heritage property relating primarily to Lake Ohrid and Galičica National Park. Lake Ohrid's hydrology and biodiversity are exposed to diverse impacts and risks including decreased water levels due to prolonged dry periods, and anthropogenic factors such as uncontrolled discharge, water pollution due to inadequate wastewater treatment systems, and evident eutrophication in certain places such as mouths of rivers that flow into the lake. In the long-term, this can pose serious threats to the entire lake ecosystem, with several endemic species of the lake already considered endangered.

The mission also expressed its concern about the extensive urban development and inappropriate exploitation of the coastal zones which could contribute to its severe deterioration, if no immediate measures are taken by the authorities.

While the core of the Ohrid historic town is well preserved, one of the main factors affecting the property are developments which have already occurred in the urban settlements, agricultural and coastal zones resulting in water pollution, degradation of habitats, alteration and loss of quality of the lake landscape. Considerable change and development have taken place since the inscription of the property. Increased urbanization along the coast has caused increased interference with natural resources, with higher water consumption, increased pollution, and fragmentation and destruction of habitat. The poor architectural quality of many buildings, inside and outside of urban areas, is also a threat to the visual quality of the property, especially in the main towns, Ohrid and Struga, comprised of relatively heterogeneous buildings. Tall buildings or any constructions close to the water, have a high visual impact, threatening the integrity of the property.

Periodic Report Section II- Natural and Cultural Heritage of the Ohrid region <a href="http://whc.unesco.org/archive/periodicreporting/EUR/cycle02/section2/groupb/99.pdf">http://whc.unesco.org/archive/periodicreporting/EUR/cycle02/section2/groupb/99.pdf</a>). – also see Annex 6: SECOND CYCLE PERIODIC REPORT FACTORS SUMMARY

Current proposals for large infrastructure and construction projects could lead to irreversible transformations of the overall relationship between the historic city, archaeological remains, natural setting, including the Galičica National Park and the Lake Ohrid.

The mission also expressed its concern over solid waste and inappropriately made landfill sites, and illegal dumping sites observed in various places throughout the property posing a substantial threat to the pollution of air, soil, surface water and groundwater, including risks for biodiversity, human health and agricultural land, and affecting the aesthetic value of the area. In addition, the mission expressed the urgent need for further improvements in the wastewater treatment from both Macedonian and Albanian sides.

Although not observed during the mission, the property is exposed to heavy pressures from tourism during summer season such as traffic congestion, parking in non-designated parking places, and illegal dumping of solid waste. The mission noted that there is no system in place for monitoring the number of visitors to the national park and carrying capacity has not yet been determined. There is currently no visitor Management Plan in place.

The mission noted the efforts of the State Party to define a detailed inventory of the cultural and natural heritage elements, as well as the challenges of preparing a range of relevant Management Plans and instruments, and an integrated Management Plan for the property, given the complexity and vulnerabilities of Lake Ohrid's shared natural and cultural heritage and many stakeholders.

The zone situated in the northern part of the property is considered at risk of serious deterioration due to the infrastructural development projects, urban development and transformation of agricultural lands which represents a potential danger for the OUV of the property. The mission was informed that 19 detailed urban plans are still at a preliminary stage.

#### **Proposed Development Projects**

A number of substantial infrastructure and tourism development projects were presented to the mission, which may result in hazardous effects on the ecosystem and also the cultural values of the property.

#### Railway, European Corridor VIII

The mission noted potential negative environmental impacts within the boundaries of the property including possible substance run-offs during construction and operation that might cause pollution to Lake Ohrid, pollution with organic compounds and heavy metals, and flow of excavated material into the lake which could disrupt the ecological processes in the lake and Crn Drim and Sateska rivers.

Construction of the railway that connects Kičevo (outside of the property) with the Albanian border, and which runs through the property, could be considered acceptable in principle, if properly planned and implemented with all the precautionary measures as defined by the EIA, and if the relevant mission recommendations are fully implemented.

Taking into account that the World Heritage Committee at its 38th session urged the State Party to identify alternative routes that do not cross the property, the mission visited several locations and received information about the chosen location. Nevertheless, the mission recommends that the authorities submit to the World Heritage Centre for review by the Advisory Bodies, first, a comprehensive comparative study of alternative routes including those that do not pass in close vicinity of the lakeshore, and in particular avoiding one of the last well-preserved stretches of the lakeshore on the Albanian-Macedonian border (including the option identified and proposed by ICOMOS, based on the mission visit to the site, and presented in Annex 5, map 6.5.2.5.)

#### Highway A2, European Corridor VIII

The area, where highway A2 is planned, is largely agricultural land with only limited natural habitats found along the route. Destruction of part of the agricultural fields will be inevitable, but the impact on natural values is considered low due to low habitat sensitivity. There is a moderate risk of pollution during the construction phase of bridges and two ecological corridors have the potential to be disrupted. However, this area is covered by the archaeological remains (not excavated or not inventoried yet).

The overall proposed route for highway A2 Trebenište-Struga could be considered as acceptable in the plain of Crn Drim and Sateska rivers, if sufficient passages (both for people and animals) are established along the route that should be broad and high enough to allow the smooth crossing of the users. Moreover, in case that new archaeological remains are found during the construction works, the project should cease until necessary research is implemented.

The mission highlighted that the combined impact of the conjunction of highway A2 and the railway in the same site, which has not been taken into account by any of the projects, needs to be considered.

#### A3 road

The mission concluded that some of the proposals for large-scale infrastructure and construction projects, such as sub-sections (a) and (e) of the A3 road within the property could lead to irreversible changes to the property.

#### Galičica ski centre

The mission concluded that the Galičica ski resort within the property, represents a potential danger to its Outstanding Universal Value, in combination with the developments and transformations that have already occurred in the urban settlements and lakeshore since its inscription.

#### Tourism facility projects

Numerous projects have been presented to the mission. The mission recommends to introduce a moratorium on any coastal and urban transformation within the property, prior to the preparation/revision and adoption of the Management Plan, an OUV-based sustainable tourism strategy, including regulations for tourism activities, movable facilities at the beaches and openair commercial activity, as well as the OUV-based Urban / Coastal Master Plans.

#### **Mission's Conclusions and Recommendations**

The mission considered that the general state of conservation of the mixed property "Natural and Cultural Heritage of the Ohrid region" – is currently impacted upon by a number of factors which could represent a potential danger to the Outstanding Universal Value of the property in accordance with paragraphs 179 and 180 of the Operational Guidelines and cause its authenticity and integrity to become vulnerable.

While considerable progress has been achieved with the establishment of a Commission for Management of the Natural and Cultural Heritage of the Ohrid Region, the mission noted that the latest version of the draft Management Plan for the Natural and Cultural Heritage of the Ohrid Region 2016-2025, prepared in 2015, still requires improvements. Considering the legal requirement of a Strategic Environmental Assessment (SEA) for the adoption of the Management Plan, the mission strongly recommends that the SEA process be used for amending and strengthening parts of the Management Plan.

Despite the 2009 boundary modification, the property's integrity can still be further improved, especially as only two-thirds of the lake are included, leaving one-third of the Albanian part of the lake outside of the property. Additionally, the protection of the property could be significantly strengthened by establishing a coherent buffer zone comprising also Lake Prespa.

Major efforts in transboundary cooperation between Albanian and Macedonian authorities are essential for ensuring appropriate integrative conservation measures not only for the protection of Lake Ohrid that crosses the national boundary, but also a wider region (ecosystem) including Lake Prespa. There are a number of transboundary agreements, strategic plans, bodies, and designations that the site benefits from, in particular the EU-funded project "Towards strengthened governance of the shared natural and cultural heritage of the Lake Ohrid region", the success of which will depend on the commitment and the implementation of concrete actions by the two countries for the protection of the Lake Ohrid region.

The mission recommends to provide the State Party with an opportunity to address these concerns and to implement the mission recommendations, but if these actions are not completed

promptly the property may soon meet the conditions for inscription on the List of World Heritage in Danger.

On the basis of numerous discussions during meetings with national and local authorities, as well as of the analysis of the state of conservation of the World Heritage property, the mission developed its detailed recommendations and a set of immediate, short- and mid-term measures are proposed in Chapter 5 Conclusions and Recommendations (see also Annex 7) to address the potential threats which could have deleterious effects on the property's Outstanding Universal Value.

#### Recommendation 1)

Develop and submit to the World Heritage Centre, for review by the Advisory Bodies, a comprehensive comparative study of alternative routes for the European Corridor VIII railway including those that do not pass in close vicinity of the lakeshore, and in particular avoiding one of the last well-preserved stretches of the lakeshore on the Albanian-Macedonian border (including the option identified and proposed by ICOMOS, based on the mission's visit to the site, and presented in Annex 5, map 6.5.2.5.)

#### Recommendation 2)

With regards to the construction of highway A2:

- a. Ensure that sufficient passages for people and wildlife are provided that should be wide and high enough to enable smooth crossing by their users, and which should include at least one of the pipe culverts every kilometre with a diameter of two meters,
- b. Upgrade the existing road between Struga and the Albanian border, rather than tracing a new highway, in view of the fragility of the environment in that part of the property, and to the closeness of the lake,
- c. In case of new archaeological findings during the construction works, suspend all construction until the necessary research and inventory work has been carried out.

#### **Recommendation 3)**

Assess the cumulative impacts of the railway and highway A2 on the Outstanding Universal Value (OUV) of the property, and justify the choice of not pairing them, or not changing their alignments in order to bring them closer in the northern part of the property.

#### Recommendation 4)

Permanently abandon plans for the construction of sub-sections (a) and (e) of the A3 road, and suspend the construction of other sub-sections of the A3 road until all appropriate measures are taken to avoid and minimize their potential impacts on the OUV of the property, in line with the specific recommendations made in this report.

#### Recommendation 5)

Permanently abandon plans for the construction of the Galičica ski centre project, maintain the current internal national park zoning, and consider developing ecotourism options that would not negatively impact the property.

#### Recommendation 6)

Put in place a moratorium on any coastal and urban transformation within the World Heritage property, at least until all relevant planning documents (Management Plan, OUV-based Urban/Coastal Master Plans etc.) have been prepared and adopted, effective protective juridical regulations have been approved, and effective control mechanisms are established.

#### Recommendation 7)

Finalise all relevant planning documents (Management Plan, OUV-based Urban/Coastal Master Plans, OUV-based Tourism strategy, including regulations for tourism activities, movable facilities at the beaches and open-air commercial activity) and submit them to

the World Heritage Centre for review by the Advisory Bodies; It is strongly recommended that the SEA process be used for amending and strengthening parts of the Management Plan.

#### Recommendation 8)

Rigorously ensure that cumulative impacts of any infrastructure, urban and/or coastal development projects on the OUV of the property are assessed during the Strategic Environmental Assessment for Ohrid Region Management Plan (2016-2025), and submitted to the World Heritage Centre, for review and comments by the Advisory Bodies before any decisions are made that would be difficult to reverse, in accordance with paragraph 172 of the Operational Guidelines.

#### Recommendation 9)

In relation to illegal constructions within the property:

- a. undertake a detailed inventory of all existing illegal constructions within the property and carry out relevant Heritage and Environmental Impact Assessments (HIA and EIA) to assess their impacts on the OUV of the property.
- b. remove all illegal constructions within the property and in particular within the Galičica National Park, which, based on the above-mentioned HIAs and EIAs are considered to represent a threat to the property, including its authenticity and conditions of integrity, and
- c. ensure the strict enforcement of existing laws and regulations to prevent any further illegal construction within the property.

#### Recommendation 10)

Undertake a thorough assessment in view of defining and establishing a buffer zone for the property, in order to strengthen its protection, which should ideally include Prespa Lake, as an important part of the connected Ohrid-Prespa ecosystem, as well as the remaining part of Galičica National Park.

#### Recommendation 11)

Clarify the decision-making mechanism and tasks and functions of the Commission for Management of the Natural and Cultural Heritage of the Ohrid Region, and establish genuine participative approaches in the management of the property to ensure adequate involvement of local communities and civil society organizations.

#### Recommendation 12)

Strengthen transboundary cooperation with the State Party of Albania in the protection and conservation of the property, in particular on monitoring the lake's biodiversity and water quality, exchanging relevant scientific data, and establishing common management actions such as jointly agreed fishing quota.

#### Recommendation 13)

Improve the central wastewater treatment system for all settlements in the Lake Ohrid basin, and enable education and training of relevant staff to build their technical capacities.

#### Recommendation 14)

Provide to the World Heritage Centre, for review by the Advisory Bodies, detailed information about the chemical composition of wood pylons used for the walking boards in the Bay of Bones Museum, including a national expert opinion about the threat potentially posed by the chemical concentrations used on the pylons to fish spawning in the lake waters below the museum.

#### Recommendation 15)

Develop and implement appropriate measures to stabilise the water level of Lake Ohrid, including regular monitoring and control of discharge of lake waters into the Crn Drim

river by Macedonian power plants company ELEM, and explore options to re-divert the Sateska river back into the Crn Drim river.

#### Recommendation 16)

Close and clean up the Bukovo landfill and all illegal waste dumping sites within the property, and establish a functional communal waste collection system.

#### Recommendation 17)

Take all necessary measures to control invasive species in Lake Ohrid and ensure the regular implementation of a biodiversity monitoring programme, and enforce legal provisions to ensure the protection of endangered and endemic species.

#### Recommendation 18)

Reduce motorised traffic in Ohrid old town, with time slots for access and restrictions to parking, referring to examples of good practices from other historic city centres around Europe and globally.

#### Recommendation 19)

Implement appropriate measures in order to prevent any loss of archaeological remains and deterioration of architectural and urban planning coherence, including by enhancing the surroundings of historical buildings and archaeologic sites by landscaping and public space improvement, with observance of authenticity and integrity, avoiding shapes and materials too conspicuous or estranged to the site and local culture and flora (e.g. palm trees), as well as avoiding large size commercial billboards within the property, replacing them with smaller size posters.

#### 1 BACKGROUND TO THE MISSION

#### 1.1 INSCRIPTION HISTORY

The "Natural and Cultural Heritage of the Ohrid region", a mixed World Heritage property was inscribed for its natural values in 1979 and for its cultural values a year later. In 1979, the Committee decided to inscribe the Ohrid Lake on the World Heritage List under what was then natural criterion (iii) (equivalent to current criterion (vii)). In 1980, this property was extended to include the cultural and historical area, and cultural criteria (i) (iii) (iv) were added. Minor boundary modifications have been referred in 2008 (Decision 32 COM 8B.49) and subsequently approved by the Committee in 2009 (Decision 33 COM 8B.40).

## 1.2 INTEGRITY/AUTHENTICITY ISSUES RAISED IN THE IUCN/ICOMOS EVALUATION REPORT AT TIME OF INSCRIPTION

The 1979 IUCN evaluation noted that the boundaries of the property proposed in the nomination did not meet the criteria of integrity from a natural sciences perspective as it did not include the Lake's watershed, while the 1980 ICOMOS evaluation highlighted that specific efforts should be devoted to housing which is generally in a poor state of preservation.

In 2012, the pilot project "Natural and Cultural Heritage of the Ohrid Region" was proposed by the States Parties of the Republic of Albania and the former Yugoslav Republic of Macedonia in the framework of the Upstream Process, endorsed by the World Heritage Committee at its 36th session (St. Petersburg, 2012)<sup>2</sup>.

The objective of this Pilot Project is the extension of the already inscribed mixed site to the Albanian part of the Lake Ohrid region to strengthen the property's integrity in particular in terms of the natural attributes.

#### 1.3 INSCRIPTION CRITERIA AND WORLD HERITAGE VALUES

The World Heritage Committee adopted in 2015 the following retrospective Statement of Outstanding Universal Value.

The Lake Ohrid region, a mixed World Heritage property covering 83,350 ha, was inscribed for its natural values in 1979 and for its cultural values a year later. Lake Ohrid is a superlative natural phenomenon, providing refuge for numerous endemic and relict freshwater species of flora and fauna dating from the tertiary period. As a deep and ancient lake of tectonic origin, Lake Ohrid has existed continuously for approximately two to three million years. Its oligotrophic waters conserve over 200 species of plants and animals unique to the lake, including algae, turbellarian flatworms, snails, crustaceans and 17 endemic species of fish including two species of trout, as well as a rich birdlife.

Situated on the shores of Lake Ohrid, the town of Ohrid is one of the oldest human settlements in Europe. Built mostly between the 7th and 19th centuries, Ohrid is home to the oldest Slav monastery (dedicated to St. Pantelejmon) and more than 800 Byzantine-style icons of worldwide fame dating from the 11th century to the end of the 14th century. Ohrid's architecture represents the best preserved and most complete ensemble of ancient urban architecture of this part of Europe. Slav culture spread from Ohrid to other parts of Europe. Seven basilicas have thus far been discovered in archaeological excavations in the old part of Ohrid. These basilicas were built during the 4th, 5th and beginning of the 6th centuries and contain architectural and decorative characteristics that indisputably point to a strong ascent and glory of Lychnidos, the former name of the town. The structure of the city nucleus is also enriched by a large number of archaeological sites, with an emphasis on early Christian basilicas, which are also known for their mosaic floors. Special emphasis regarding Ohrid's old urban architecture must be given to the town's masonry heritage. In particular, Ohrid's traditional local influence can be seen among its well-preserved late-Ottoman urban residential architecture dating from the 18th and 19th

<sup>&</sup>lt;sup>2</sup> See particularly Decision 35 COM 12 <a href="http://whc.unesco.org/en/decisions/4404">http://whc.unesco.org/en/decisions/4404</a>

centuries. The limited space for construction activities has led to the formation of a very narrow network of streets.

Although the town of Struga is located along the shores of Lake Ohrid, town life is concentrated along the banks of the Crn Drim River, which flows out of the lake. The existence of Struga is connected with several fishermen settlements on wooden piles situated along the lake shore. A great number of archaeological sites testify to origins from the Neolithic period, the Bronze Age, the Macedonian Hellenistic period, the Roman and the early Middle Age period.

The convergence of well-conserved natural values with the quality and diversity of its cultural, material and spiritual heritage makes this region truly unique.

#### Criterion (i)

The town of Ohrid is one of the oldest human settlements in Europe. As one of the best preserved complete ensembles encompassing archaeological remains from the Bronze Age up to the Middle Ages, Ohrid boasts exemplary religious architecture dating from the 7th to 19th centuries as well as an urban structure showcasing vernacular architecture from the 18th and 19th centuries. All of them possess real historic, architectural, cultural and artistic values. The concentration of the archaeological remains and urban structures within the old urban centre of Ohrid, along the coast of Lake Ohrid as well as the surrounding area creates an exceptional harmonious ensemble, which is one of the key features that make this region truly unique.

#### Criterion (iii)

The property is a testimony of Byzantine arts, displayed by more than 2,500 square metres of frescoes and more than 800 icons of worldwide fame. The churches of St. Sophia (11th century), Holy Mother of God Perivleptos and St. John Kaneo notably display a high level of artistic achievements in their frescoes and theological representations, executed by local as well as foreign artists. Ancient architects erected immense basilicas, which were to serve as models for other basilicas for centuries. The development of ecclesiastical life along the shores of the lake, along with its own religious architecture, frescoes and icons, testifies to the significance of this region as a religious and cultural centre over the centuries.

#### Criterion (iv)

The Lake Ohrid region boasts the most ancient Slavonic monastery and the first Slavonic University in the Balkans – the Ohrid literary school that spread writing, education and culture throughout the old Slavonic world. The old centre of Ohrid is a uniquely preserved, authentic ancient urban entity, adjusted to its coastal lake position and terrain, which is characterised by exceptional sacred and profane architecture. The architectural remains comprising a forum, public buildings, housing and sacred buildings with their infrastructure date back to the ancient town of Lychnidos (the former name of the town). The presence of early Christian architecture with the lofty basilicas from 4th to 6th centuries, together with the Byzantine architecture with a great number of preserved sacred buildings of different types from 9th to 14th centuries, is of paramount importance and contributes to the unity of the urban architecture of the city.

#### Criterion (vii)

The preservation of Lake Ohrid dating from pre-glacial times is a superlative natural phenomenon. As a result of its geographic isolation and uninterrupted biological activity, Lake Ohrid provides a unique refuge for numerous endemic and relict freshwater species of flora and fauna. Its oligotrophic waters contain over 200 endemic species with high levels of endemism for benthic species in particular, including algae, diatoms, turbellarian flatworms, snails, crustaceans and 17 endemic species of fish. The Lake Ohrid region also harbours a rich birdlife.

#### Integrity

Despite a minor modification in 2009, the current boundary of the property still does not fully encompass all of the features that convey the property's Outstanding Universal Value. Most notably in relation to its natural values, the integrity of the property is limited since only two-thirds of Lake Ohrid located in the former Yugoslav Republic of Macedonia as well as a small part of the lake's basin have been inscribed. The integrity of the property could be strengthened by extending it to the remaining one-third of Lake Ohrid located in Albania and including other areas essential to the protection of the lake's watershed, in order to adequately protect the lake's

exceptional biodiversity. Main threats to the integrity of the property include uncoordinated urban development, increasing population, inadequate treatment of wastewater and solid waste, and tourism pressure. In addition, pollution from increased traffic influences the quality of the water, which leads to the depletion of natural resources.

The integrity of the property suffered to some extent, as several houses built at the end of 19th century were demolished in order to exhibit the excavated remains of the Roman Theatre. The overall coherence of the property, and particularly the relationship between urban buildings and the landscape, is vulnerable to the lack of adequate control of new development.

#### **Authenticity**

The town of Ohrid is reasonably well preserved, although uncontrolled incremental interventions have impacted the overall form of the monumental urban ensemble as well as the lakeshore and wider landscape. These are also vulnerable to major infrastructure projects and other developments.

Concerning the religious buildings, important conservation and restoration works have been carried out since the 1990s. Conservation works on the monuments in the region have been thoroughly researched and documented, but some have impacted the property's authenticity. The icons and frescoes are in good condition and kept in the churches.

The originally residential function of some buildings has changed over time, as have some of the interior outfitting of residential buildings, which were altered to improve living conditions. While reconstructions often used materials identical to those used at the time of construction, new materials have also been used on occasion, which presents a threat for the authenticity of the property.

## 1.4 EXAMINATION OF THE STATE OF CONSERVATION BY THE WORLD HERITAGE COMMITTEE

The World Heritage Committee examined the state of conservation of this World Heritage property several times between 1998 and 2016.

A joint UNESCO / ICOMOS / IUCN reactive monitoring mission was carried out in September 1998 for the first time since the inscription of the site on the World Heritage List in 1979.

The mission report drew particular attention to the fact that at the time of inscription of this mixed property on the List, the well preserved old towns of Ohrid and Struga were set in an almost untouched natural environment on the shores of the Lake Ohrid. As to cultural heritage, only specifically listed monuments are inscribed on the World Heritage List. These monuments are very well preserved. The natural heritage includes part of the lake which is territory of the country (and excludes the part on the territory of Albania) and part of the Galičica National Park. The enormous increase in constructions and settlement activities has seriously altered the original balance in the region: for example, the town of Struga has incorporated ten new subcommunities. The mission observed that the authorities undertake great efforts for the preservation of the natural and cultural heritage of the site. However, economic and demographic developments pose threats to the values of the site that can only be addressed through an integrated approach and protective measures that link the cultural and the natural heritage preservation.

The mission report included a set of recommendations calling for a special legal framework for the World Heritage site (integrating culture and nature), the strengthening of the management, the preparation of Spatial Plan for the area and the towns, and the extension of the site to include the whole of the Galičica National Park.

The Bureau took note of the report of the joint UNESCO / ICOMOS / IUCN mission and commended the Government for the efforts taken for the preservation of the monuments and environment in Ohrid. It further recommended the Government to consider the recommendations of the mission carefully, particularly with regard to integrated planning and legal protection of the natural and cultural heritage. It also requested the authorities to review the definition of the cultural heritage, to define and propose revised boundaries, if appropriate, and to establish adequate buffer zones.

Recently the World Heritage Committee examined the state of conservation of this property at its 38th, and 40th sessions in Doha (2014) and Istanbul (2016) respectively, in particular due to a number of development projects that are planned in the Ohrid region. Other identified factors affecting the property include management and planning, economic and demographic developments; buildings and development; ground transport infrastructure; major visitor accommodation and associated infrastructure and impacts of tourism / visitor / recreation (see Annex 6: SECOND CYCLE PERIODIC REPORT FACTORS SUMMARY).

#### 1.5 JUSTIFICATION OF THE MISSION

At its 40th session, the World Heritage Committee requested the State Party of the former Yugoslav Republic of Macedonia to invite a joint World Heritage Centre/ICOMOS/IUCN Reactive Monitoring mission to the property to assess its state of conservation and to provide technical advice to the State Party with regards to the scope and development of a Strategic Environmental Assessment (SEA) and a Heritage Impact Assessment (HIA) which would comprehensively assess the potential individual and cumulative impacts of all proposed infrastructure projects and other major projects on the Outstanding Universal Value (OUV) of the property (Decision **40 COM 7B.68**).

Please refer to Annex 1, 2 and 3 for the mission's terms of reference, programme and composition of mission team.

## 2 NATIONAL POLICY FOR THE PRESERVATION AND MANAGEMENT OF THE WORLD HERITAGE PROPERTY

#### 2.1 NATIONAL/PROTECTED AREA LEGISLATION

The Natural and Cultural Heritage of the Ohrid region has several layers of legal protection. The protection of cultural heritage is regulated by the Law on Cultural Heritage Protection (Official Gazette of RM No. 20/04, 115/07), by-laws and a law declaring the old city core of Ohrid as a cultural heritage of particular importance (Official Gazette of RM No. 47/11). The protection of natural heritage is regulated by the Law on Nature Protection (Official Gazette of RM No. 67/2004, 14/2006 and 84/2007), including within and outside of protected areas. There are also: the Law on Protection of Lake Ohrid, Lake Prespa and Lake Dojran (Official Gazette of RM No. 45/77) under which Lake Ohrid was proclaimed as a protected area ('monument of nature'), and the Law on Managing the World Cultural and Natural Heritage of the Ohrid Region (Official Gazette of RM No. 75/10), as well as the Law on Waters (Official Gazette of RM No. 87/08, 06/09, 161/09, 83/10, 51/11, 44/12, 23/13, 163/13, 180/14). All legal instruments need to be kept updated and implemented to protect the property.

#### 2.2 PLANS AND INSTRUMENTS

The property is managed and protected through a range of relevant management documents, and an effective overall Management Plan is a clear long-term requirement. The "Physical Plan of the Republic of Macedonia" of 2004 is the long-term document for land management, providing a vision for the purpose, protection, organization and landscape of the country and how to manage it. This plan needs to be maintained and updated regularly. Some deficiencies have been noted in the general implementation of urban planning regulations and plans.

Integrated management of natural and cultural heritage through a joint coordinating body and joint management planning are urgently needed to ensure that the values of the property are conserved. Given the vulnerabilities of the property related to the development and impacts of tourism, the management requirements for the property need strengthening and new cooperation mechanisms and management practices must be put into place. This may include establishing a buffer zone, and ensuring adequate financial and human resources for management as well as effective Management Planning and proper law enforcement.

The complexity of Lake Ohrid's shared natural and cultural heritage requires innovative governance models able to deal with a multitude of management objectives in the broader

transboundary Lake Ohrid region with a clear focus on the multiple heritage values of the property, recognised by several international and national designations. Cooperation between the cultural and natural sectors is essential, and the capacities of site management must be strengthened in order to effectively protect both the cultural and natural values of the property. Effective integration and implementation of planning processes at various levels, cross-sectorial cooperation, community participation and transboundary conservation are all preconditions for the successful long-term management of Lake Ohrid.

In the Law on Protection of Cultural Properties, the Management Plan is recognised as a strategic document for long-term management, protection, conservation, use and presentation of natural and cultural heritage that is issued by the Government of FYR of Macedonia, on the proposal of the Directorate for Environment and the Cultural Heritage Protection Office. Adoption of the Management Plan is also anticipated by Law on the Management of the Natural and Cultural Heritage of the Ohrid Region.

In the process of the elaboration of the Management Plan, a central aim was that of finding a balance between cultural and natural values in heritage conservation and the development of the area. The drafting of the plan took ten years, and several issues came out during the process, as it proved difficult to define the specific goals the plan had to fulfil. The Management Plan is not yet approved; while it may have promoted dialogue, it has not yet substantially changed management practices. The necessity of adoption of the Management Plan, the content of the Plan, process of development and bodies responsible for implementation are all specified in the abovementioned Law on the Management of the Natural and Cultural Heritage of the Ohrid Region.

Some of the most relevant challenges that were highlighted by the members of the team working on the Management Plan for the existing World Heritage property concern the complexity of the process due to the involvement of many disciplines, the need to integrate and coordinate the Management Plan with the existing management and planning system, such as the National Park Galičica Management Plan and the Physical Plan of the Republic of Macedonia; the recognition and the support to society's needs; the multiplicity of ownership, stakeholders and jurisdictions; the assessment of the value of the place to the communities and their weighing with a range of management issues, the need to develop an overall vision and, at the same time, to pursue realistic short, medium and long term objectives in relation to the available resources.

## Plan for Integrated Protection of Old City Core of Ohrid, inventory of cultural heritage elements

The Institute for Protection of Cultural Monuments and Museum, in Ohrid, is responsible for the follow-up of the cultural heritage in the municipalities of Ohrid, Struga, Debarca and Vevčani. This institute has prepared a Plan for Integrated Protection of Old City Core of Ohrid, with a detailed inventory of all listed objects (churches, mosques, civil buildings, archaeological sites, isolated structures, etc.) on all of its territory (see next page).

The inventory includes date of construction, materials and techniques, height, roofing, use, state of conservation. It indexes the buildings with "monumental value", which must be integrally preserved, but also those with "ambiental value", which have less intrinsic value but contribute to the setting and must therefore be preserved in their general shape.

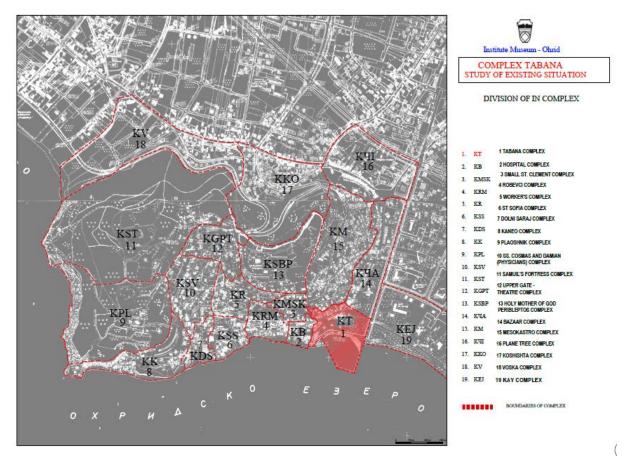
For the historic area of Ohrid (82 ha), a series of detailed maps have been published, on 19 subsectors, called "complexes". For each of the complexes, all the characteristics of the inventory are mapped on as many thematic maps (see example below).

#### 2.3 MANAGEMENT STRUCTURE AND INSTITUTIONAL FRAMEWORK

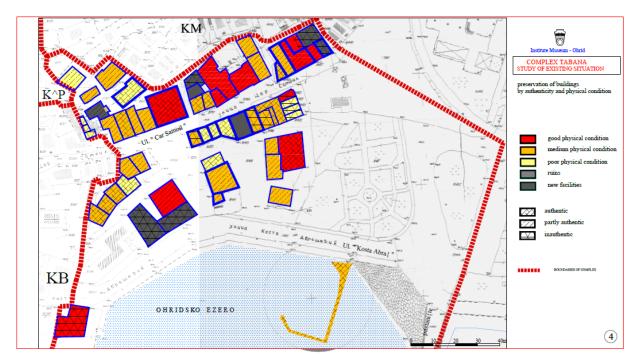
The property is managed by two ministries (the Ministry of Culture and the Ministry of Environment), via three municipalities (Ohrid, Struga and Debrca). The Institute for Protection of Monuments of Culture and Museums in Ohrid has the authority to protect cultural heritage, and the Natural History Museum Dr Nikola Nezlobinski in Struga is responsible for protecting movable heritage. The Galičica National Park is authorized to manage natural heritage within the park as a whole, and part of the cultural heritage located within the territory of the Park. The

Institute for Hydrobiology in Ohrid is responsible for the continuous monitoring of the Lake Ohrid ecosystem, the research and care for Lake Ohrid's flora and fauna, as well as the management of the fish hatchery, also to enrich the lake's fish stocks.

In accordance with the Law on Managing the World Cultural and Natural Heritage of the Ohrid Region (Official Gazette of RM No. 75/10), a **Commission for Management of the Natural and Cultural Heritage of the Ohrid Region** has been established by the Government both as a coordinating and advisory body. Its specific duties are outlined in Article 11 of the Law on Managing the World Cultural and Natural Heritage of the Ohrid Region. The Commission is comprised of a President, Vice-President and 21 members, appointed by the Government, upon a joint proposal submitted by the Minister of Environment and Physical Planning and the Minister of Culture. At the time of the mission, the Commission members were in the process of being appointed and the first meeting of the Commission is planned in May / June 2017.



Division of the historic area of Ohrid into 19 "complexes"



Example of inventory map: state of conservation for complex I (Tabana)

#### 3 IDENTIFICATION AND ASSESSMENT OF ISSUES AND THREATS

#### 3.1 MANAGEMENT EFFECTIVENESS

#### 3.1.1 MANAGEMENT PLAN FOR OHRID REGION

The latest version of the draft Management Plan for the Natural and Cultural Heritage of the Ohrid Region 2016-2025 was prepared in 2015. The State of Conservation report by the State Party, 2017 noted: "This plan provides the vision for the future of the natural and cultural heritage of the Ohrid Region, defines the current problems and challenges and presents a review of the main goals, strategies and activities related with the protection, conservation and planned development of the region, together with the implementation instruments, in order to preserve the universal value and outstanding importance of the protected region, as a benefit to future generations, simultaneously striving to preserve its integrity and authenticity."

Generally, the draft Management Plan was prepared rather as a regional development plan than a guiding plan for conservation and protection of a World Heritage property. Chapter 1 of the Management Plan provides historical background and is strongly oriented towards highlighting Ohrid Region's status as a mixed World Heritage property. This is to be commended as IUCN's review of the 2010 draft Management Plan noted the absence of reference to Outstanding Universal Value (OUV) in the vision for the Ohrid region. Although the current version of the Plan notes that protection of natural and cultural elements is of utmost importance for the region, alongside sustainable development, it also supports large and smaller infrastructure projects throughout various chapters without an attempt to critically examine their impact to the OUV of the property. For example, some of the noted "potentials" for Ohrid Region are the development of pan-European traffic Corridor VIII which passes through the property, construction of A3 road that passes largely through Galičica National Park, reconstruction of the existing and construction of new ports, construction of tourism development zones at Krasta, Gradište and Liubaništa 1 and 2, while also noting the benefits of big tourist facilities as being important for the development of congress tourism. Most of the chapter 4 and parts of chapter 6 are oriented towards economic development that might have detrimental impact on the property's OUV.

The property's values, not related only to the OUV, are very well described in chapter 2 alongside key threats in chapter 5 and somewhat in chapter 6. Structure of the Plan should be improved though to avoid repetition and ensure clarity of some chapters; e.g. chapters 5 and 6 overlap in certain issues. Chapter 6 *Key issues* is generally unclear; e.g. national legislation is

listed as the "key issue" while it should have been (and is also included) in the background chapter.

Chapter 5 assesses the risks and threats to the property, but only as potential – those that could affect the property – without stressing on the actual ones. Although the purpose of a Management Plan is also to foresee threats that have not yet had visible effects, it would have been preferable to identify which ones are already here, to which extent they may increase, and a level of probability and severity for the potential ones. In addition, the assessment of risks and threats is quite general, without detailed and located examples for each.

Chapter 7 is weakly elaborated. The Plan notes the structure of the Commission for Management of the Natural and Cultural Heritage of the Ohrid Region without outlining the Commission's concrete function (mandate), nor the decision-making authority. Chapter 7.2 is a repetition of what is already noted earlier, while financing of the activities in chapter 7.3 and monitoring system in chapter 7.4 are both insufficiently detailed.

A significant gap is that operational objectives, measures to achieve them and indicators for management of natural features have not been elaborated at all. There are only some points provided towards management of tourism and cultural heritage.

Generally, the Management Plan does not provide much room for education and awareness raising. Those issues are stated in many parts of the draft (including two sub-chapters of chapter 6 *Key issues*: 6.08 *Educational Programs*, and 6.17 *Education*), but it is difficult to see the common thread of the educational policy for the property (for instance, the two sub-chapters 6.08 *Educational Programs*, and 6.17 *Education*, are separated by 7 other sub-chapters, and their distinction is not obvious).

Chapter 8 contains an Action Plan which provides a list of very general activities, quite exhaustive but without necessary details. The Action Plan lacks a first-phase sub-plan indicating the first measures taken, with their term (1, 2, 5 years...), their nature (regulatory, operative, awareness-raising...), the actors and stakeholders involved, if possible elements of budget (amount estimated and foreseen financers), and indicators of further evaluation.

The responsibility for the development of the Strategic Environmental Assessment (SEA) of the Ohrid Region Management Plan lies with the Ministry of Culture. The requirement and content of the SEA are defined by legal provisions; Law on Environment and Regulation on the contents of the report on the strategic assessment of the environment – Official Gazette of RM, No. 153/07, which should be followed. Also, it is advised that EU guidance is followed (Directive 2001/42/EC) in preparation of the SEA. The SEA should particularly include elaboration of individual and cumulative impacts of all planned infrastructure and other major projects to the World Heritage property. The SEA should also contain clear prevention measures for potential negative impacts to the cultural and natural values of the World Heritage property. It also needs to address the transboundary aspect of the property. The State Party expressed concern about the SEA contents during the mission, and thus it was agreed that they officially request technical assistance with outlined Terms of Reference of experts needed and send it to the World Heritage Centre. Considering that the draft Management Plan still requires improvements, it is strongly recommended that the SEA process is used for amending and strengthening parts of the Management Plan as well.

#### 3.1.2 BOUNDARY ISSUES

**Evaluation and justification of the pertinence of the existing boundary of the World Heritage property** 

The property covers 83,350 ha, including Lake Ohrid, part of Galičica National Park, lowlands in the north and a strip of land adjacent to the lake in the east.

The property has been listed on the basis of natural values related to Lake Ohrid and of cultural values related to the town of Ohrid and a number of settlements scattered throughout the

property (archaeological remains, churches, monasteries, urban ensemble, etc.). With this regard, the boundary of the World Heritage property is justified.

In 2009, a minor modification of the property's boundary was approved by the World Heritage Committee. The area of the property was reduced by 690 ha, excluding a narrow strip in northern, north-western and north-eastern parts and including additional area of Galičica National Park. Despite this boundary modification, the property still lacks integrity, especially as only two-thirds of the lake are included in the property, leaving one-third of the Albanian part of the lake outside of the World Heritage property.

#### **Proposals regarding WH property buffer zone creation**

The property lacks a buffer zone that would be broad enough to protect the views from the lake, to encompass the functional system to which it belongs, and thus improve the property's integrity.

The draft Management Plan notes (chap. 1.12) that the buffer zone will be 1-3 km for the rural parts of Ohrid, but the map has not been provided and it is unclear what is meant by that determination. The Plan also notes that the final buffer zone would be determined after the Upstream Process supporting the nomination process for the extension of the property into the Albanian territory is finalized. However, the mission is of view that this should not influence the authorities to determine the buffer zone in the existing property and recommends to define it already now.

In the south-eastern part, the buffer zone could potentially encompass the part of Galičica National Park that is currently not included in the property, as already recommended by the 1997 Reactive Monitoring mission. The integrity of the property could be significantly strengthened by including Lake Prespa in the buffer zone. Prespa and Ohrid lakes share the same origin and form a connected ecosystem, as water from Prespa flows through karstic Galičica mountain to the Lake Ohrid. Such an extended buffer zone would be more difficult to manage than a smaller one, but it would add only one extra management authority unit to the property; Municipality of Resen, which manages the Lake Prespa Monument of Nature.

The mission team did not visit Prespa Lake nor does it have sufficient information to assess the suitability of such proposal, potential risks in terms of management of the enlarged property, the natural values of Prespa Lake, nor the current challenges and threats to Prespa and its surroundings. A detailed assessment about including Prespa Lake as part of the World Heritage buffer zone could be performed and further action and decision made based on its results.

#### 3.1.3 STRATEGIES (SUSTAINABLE TOURISM, RISK PREPAREDNESS, ETC.)

The final draft of the Strategy for the Development of Tourism in the Municipality of Ohrid (2016-2020) was developed by the Municipality of Ohrid (available only in Macedonian). The Strategy is a typical tourism development document with some inconsistencies, particularly regarding the definition of specific objectives of the strategic aim 2 "Ohrid is the leading tourism destination in the region based on a rich natural and cultural heritage and imperative for the whole local community". The specific objectives of the strategic aim 2 include: 2.1 protection and promotion of cultural heritage; 2.2 supporting development of green businesses; 2.3 awareness raising about the protection of natural and cultural heritage; and 2.4 networking to ensure appropriate protection of the environment (pp. 52-53). The accompanying Operational plan defines the specific objectives somewhat different; 2.1 is actually the above 2.2; 2.2 refers to reduction of waste via preventive measures and awareness raising actions; 2.3 refers to the above 2.4; 2.4 refers to the above 2.1; and 2.5 is added with reference to public awareness raising and institutional capacity development regarding the protection of natural and cultural heritage.

The budget for implementation of overall four strategic objectives is limited to less than 20 million EUR. Planned budget for implementation of the strategic aim 2 differs on pp. 62 and in the Operational plan (pp. 66 onwards) for 2,140,000 EUR, so it is unclear which budget is correct.

The mission recommends that the State Party develops an OUV-based sustainable Tourism Strategy and submits it to the World Heritage Centre for review in line with the World Heritage Programme for Sustainable Tourism.

#### 3.1.4 COMMUNITIES AND CIVIL SOCIETY INVOLVEMENT

The World Heritage Centre has received a number of correspondence from individual concerned citizens as well as the civil society representatives raising concerns on a wide range of issues from inappropriate waste water disposal, illegal constructions, threats to the marsh lands and the Galičica National Park from tourism development etc. There is an urgent need to establish genuine participative approaches to the management of this World Heritage property.

The mission team met with the representatives of the civil society on 12 April at the house of Urania, in the presence of the national authorities.

11 representatives of NGOs from Ohrid, Skopje and Struga attended the meeting. A wide range of opinions prevailed among the civil society representatives ranging from those who advocate economic development of the area based on significantly increasing the tourism offer (including a skiing area) to those who advocate for nature-based tourism as an alternative to the planned large-scale tourism infrastructures and who raise significant concern regarding the ecosystem of the lake and the national park of Galičica. Some NGO representatives have prepared proposals for alternative solutions to the proposed tourism infrastructure projects and for amendments to the existing law regarding the management of the World Heritage property. These proposals have also been shared with the national authorities for information and consideration, in line with Paragraph 174 of the *Operational Guidelines*.

#### 3.1.5 TRANSBOUNDARY AND INTERNATIONAL COLLABORATION

Transboundary cooperation between Albanian and FYROM authorities has been ongoing not only for the protection of Lake Ohrid, but also a wider region including Lake Prespa. Considering the specificities of the ecosystem that crosses the national boundary, transboundary conservation is essential for ensuring appropriate integrative conservation measures. There are a number of transboundary agreements, strategic plans, bodies, and designations that the site benefits from, such as: the Agreement between the Council of Ministers of the two countries for the Protection and Sustainable Development of Lake Ohrid and its Watershed (Skopje, 2004), Bilateral Lake Ohrid Watershed Committee (2005); the Agreement on the Protection and Sustainable Development of the Prespa Park Area (European Commission, 2014), inclusion of Galičica National Park in the Transboundary Prespa Park in 2000 and 2010, Trilateral Strategy and Action Plan for the Prespa Lake Basin (2012-2016), designation of Ohrid-Prespa Transboundary Biosphere Reserve within the UNESCO Man and the Biosphere Programme (2014), and establishment of the Fund for Nature of Prespa-Ohrid (2017).

One of the major initiatives in the area of transboundary cooperation is the EU-funded project "Towards strengthened governance of the shared natural and cultural heritage of the Lake Ohrid region", implemented as phase two of the pilot upstream project mentioned above, with the support of the Ministry of Environment of the Republic of Albania. The project has initiated a number of transboundary meetings with the main institutions responsible for the management of the entire Lake Ohrid region which has led to the identification of a number of concrete actions for the region which could and should be implemented in a coordinated manner between the two countries. The success of this pilot upstream project will depend on the commitment and the implementation of concrete actions by the two countries for the protection of the Lake Ohrid region.

#### 3.2 NATURE AND EXTENT OF THREATS TO THE PROPERTY

#### 3.2.1 URBAN AND COASTAL DEVELOPMENT PRESSURE

#### **Urban development outside of urban areas**

Increased urbanization can be observed along the coast and in the upper parts of the national park. It takes the form of a sprawl of new individual houses around existing settlements (Ohrid, Struga, Velestovo, the villages along the coast south of Ohrid...) and of various tourist accommodations and facilities along the coast. In addition, the mission was briefly informed

about the ongoing legalisation process of illegally built constructions in the urban, coastal and Park areas. This inappropriate urban development may have the following impacts:

- Water pollution, if the constructions are not equipped with satisfactory wastewater treatment, whether collective or individual;
- Degradation or fragmentation of riparian habitats;
- Alteration of the lake landscape, which is characterized by a strong contrast between towns, traditionally dense (Ohrid, Struga, Peštani) and undeveloped sections of the lakeshore; extensive development along the coast would make the landscape more ordinary, losing a part of its quality.

According to the Law on Waters, no construction of permanent buildings is allowed in the coastal belt of the lake in a width larger than 50 metres from the elevation of the highest water level of Lake Ohrid. Nevertheless, intensive coastal development is visible along the shoreline of Lake Ohrid, especially in its eastern part within Galičica National Park. Towards the end of the 1960s, intensive migration process has started from mountain villages to the lakeshore, highly decreasing the population density in the mountainous part of the World Heritage property and putting pressure on the lake. The old settlements, such as Leskoec, Oteševo, Šipokno and Konjsko, were almost completely deserted, while new settlements were established, e.g. Rača, Sv. Stefan, Istok, Dolno Konjsko and Elešec. During the recent two decades, urbanization along the shore has been followed by growing development in mountainous areas as well. The abandoned villages gradually became weekend resorts and brought along higher water consumption and increased pollution of the park. At the same time, agricultural land use has been decreasing.

This low-density, poor-quality urban development impacts the coastal landscape. From the distance (especially from Ohrid town), this part of the coast no longer appears as natural, but is dotted with small or large buildings (especially the recent Hotel Park Lakeside, at the foot of Gorica hill): On the site, the ambience in many parts is that of a long suburb, not of a natural shore.



Low-density urban developments along the shore between Ohrid and Gorica. Up on the hillside, the village of Velestovo, which has also witnessed excessive low-density extensions.

The increased urbanization along the coast and in the upper parts of the national park caused fragmentation and destruction of habitat, increased interference with natural resources (particularly water), and pollution (e.g. solid waste, construction debris, waste waters, air pollution, noise). The lake's shoreline cliffs provide habitat for the Balkan endemic keeled lizard (*Algyroides nigropunctatus*). Even minor pressures upon the habitat alongside the cliffs on the stretch from Peštani to Gradište and in the vicinity of the village of Trpejca may seriously affect this sensitive population and jeopardize its survival. An example of species whose biological vitality had declined due to infrastructural development along the coast is the yellow waterlily (*Nuphar lutea*). An attempt was made to reintroduce this plant to its former habitat near the locality of Mazija.

#### **Architectural quality of constructions**

The poor architectural quality of many buildings, within or out of urban areas, is also a threat to the visual quality of the property. Especially the major part of the main towns, Ohrid and Struga, is made of heterogeneous buildings (juxtaposition of individual and collective buildings, no alignment, variety of styles, etc.).



Suburbs of poor architectural quality in Ohrid (in the backstage, old town on the hill)

#### Nature of constructions in relation to the property's character

The visual impact of constructions also depends on their nature. Tourist facilities related to accommodation and sport activities should be the less intrusive as possible. In this category, high buildings (such as Hotel Park Lakeside, Gorica) or any constructions close to the water have a high visual impact, which threatens the site's integrity.

The matter is different with facilities aimed at interpretation of the site and its natural and cultural values, such as site museums. In the *Bay of Bones*, nearby Gradište peninsula, south of Peštani, a museum has been built in 2008 in a site where many remnants (animal bones, pile bases...) of a pile-dwelling village dating back between 1200 and 700 BC have been found by divers. This kind of construction, even isolated in a natural site, is more consistent with the character of the property. Close to the museum, which is on the shore, a pile dwellings village has been reconstructed. The shapes, materials and construction techniques have been well documented, the ensemble does not challenge the authenticity of the site as it does not claim to be the original structure and is made for interpretation purposes.

This achievement is thus compatible with the principles of Nara document (1994) and ICOMOSs Ename charter (2007) and is acceptable in the property with regard to cultural values. However, concerns exist about potential water pollution with preservatives used to avoid wood piles decay (see section 3.2.5 below).



The reconstructed pile dwellings settlement at the Bay of Bones museum

#### Instauration of St. Clement's University in Plaoshnik

This project has been assessed earlier, with recommendations to the State Party. In 2016, the decision 40COM 7B.68 of the World Heritage Committee "welcomes the actions undertaken by the State Party concerning the revision of the project for the Instauration of St. Clement's University at Plaoshnik to reduce its negative impacts on the property". Indeed, the project has been revised taking into account recommendations of the 2013 UNESCO-ICOMOS Advisory mission, with regards to the size, elevation, scale and scope of planned constructions. The buildings, under construction at the time of the mission, are all of a traditional style (stones, bricks, tiles), over a concrete structure, without glass façades planned in the first project. The ensemble is not of the utmost architectural interest, but it does not impair the overall aspect of the site.

The new buildings are over a part of the archaeological ensemble. Their foundations have tried to preserve the latter insofar as possible, but in places, the concrete pillars have been erected in the place of the old walls, which have been reconstructed around.



Buildings under construction of the new St. Clement's University in Plaoshnik (museum part), with archaeological remains in front.



Detail of the ground floor showing the pre-existing archaeological structures

Besides the university's buildings, other buildings have been built or reconstructed earlier, and have already been assessed in earlier Advisory mission and state of conservation reports. The church of St. Clement and St. Pantelejmon was reconstructed between 2000 and 2002, with a good documentation and a clear distinction of new works from existing substructures (in accordance with Venice charter).

Two basilicas with remaining mosaic floors have not been reconstructed but have been sheltered from the rain by sheds. One of those sheds (upper basilica) has the shape and the volume of the former basilica, from what is known of it. In addition to sheltering, this gives an idea of the geometry of the missing building.



View on the church of St. Clement and St. Pantelejmon (left) and the shed built over the remains of the lower basilica (left image, on the right).



Separation of the wall of the reconstructed church from the original substructure, by a sheet of lead





Shed built over the remains of the upper basilica, with the volume of the missing building

The choice of open sheds may be questioned, as they may be inefficient in case of wind that would bring rain through lateral openings. The threat to mosaics must be confirmed, but if it is, those openings could be sealed by wood board walls that would keep the overall volume of the missing basilica without claiming to be a reconstruction.

#### **Quays and promenade reconstruction**

During the mission, the municipality of Ohrid presented a project for reconstruction and upgrading of *Quay Macedonia* and a project for construction of a small pier (marina) in front of Palace Hotel.

The upgrading of the quay will consist of a broadening by 3 meters (2 m of backfill, 40 cm of pillars and 60 cm of cantilever) and of a new granite pavement on all the promenade.

The rationale of broadening the quay has not been fully understood by the mission, though the new pavement might be an improvement to the current concrete one. According to the report on the State of Conservation submitted by the State Party in 2017, the urban design documentation for the quay is currently in the preparatory phase while the mission was informed that the Environmental Assessment of the project was not approved by the Ministry of Physical Planning and Environment.





Present aspect of the guay and promenade in Ohrid, towards the city centre and towards the south

#### **Public space management**

The streets of the old city are generally in good condition, with stone pavement. But an excessive presence of motor vehicles can be noted.

Large commercial billboards can be seen in various locations of the property where their visual intrusion impairs the integrity of the property. Such devices are in no place compatible with the OUV of the property.

An OUV-based regulations for advertising, movable facilities and open-air commercial activity should be established within the framework of the elaboration of the relevant plans.



Advertisement billboard along coastal road P1301, south of Ohrid, between Šipokno and Dolno Konjsko



Excessive presence of motor vehicles in old town

#### 3.2.2 LARGE INFRASTRUCTURE PROJECTS

The decision 40 COM 7B.68 of the World Heritage Committee notes with concerns three infrastructure projects: the A3 road, the Railway Corridor VIII and the highway A2.

#### Railway, European Corridor VIII

#### Description

The project, prepared by the Public Enterprise for Railway Infrastructure (Macedonian Railways), is a railway line between Kičevo and Lin (in Albania, close to the border), passing through the property in its final tract before entering the Albanian territory. It is a part of the

European Corridor VIII (see Annex 5 (6.5.2)), connecting Black Sea with Adriatic, through 3 countries: Bulgaria, the former Yugoslav Republic of Macedonia and Albania. It is one of the two sections of Corridor VIII that are missing to date – the other missing section being towards the other border of the country, to the East, between Kumanovo and Bulgaria, while the section Kumanovo-Skopje-Tetovo-Gostivar-Kičevo is operating. In Lin (Albania), the proposed railway would connect with an existing line that connects Durres, Tirana and stopping some 20 km ahead from Pogradec (major town on the Albanian side) and which is currently disused and to be rehabilitated.

This line is intended for mixed traffic (passenger and freight, including heavy freight). It should be a single-track main line with standard track gauge of 1 435 mm, for lowest nominal speed of 100 km/h, with minimum radius of 500 m, maximum gradient of 3.5 %. The track is planned to be electrified with a single-phase system of electrification 25 kV and 50 Hz.

The project is divided in two sections (see Annex 5, 6.5.2.4 MAP OF THE PROPOSED RAILWAY ROUTE BETWEEN KIČEVO AND THE ALBANIAN BORDER), from north to south, with different terms of scheduling:

- Section 1, between Kičevo and Struga, being implemented first;
- Section 2, between Struga and border with Albania, in the longer term.

In Albania, the railway is meant to join the above-mentioned existing line, close to the town of Lin, close to the mouth of a tunnel that connects to the remainder of the old Albanian railway line.

The property is concerned by the southern part of Section 1, through the plain of Crn Drim and its tributaries, and by the whole Section 2. The part of concern of Section 1 consists mainly of an embankment, elevated of a few meters above natural terrain, over waterways, possible floods and road passages. Section 2 runs through a more rugged terrain, where it is planned to have cuttings and a 3-km long tunnel.

The State Party noted that the Ministry of Transport and Communications began to implement the project through the preparation of the required documentation; a Feasibility Study, a Concept Design Project, an analytical Study on the Costs and Benefits, as well as a Strategic Environmental Assessment on the railway section from Kičevo to the Albanian border (all finalised in 2011) and the Executive Project (in the preparatory phase).

#### Assessment of threats

Potential negative environmental impacts were noted in the Environmental Impact Assessment Study of 2010. The main impacts within the boundaries of the World Heritage property include possible incidents of substance run-offs during construction and operation phases that might cause pollution of Lake Ohrid, pollution with organic compounds and heavy metals, and inlet of excavated material into the lake. As it is a highly sensitive habitat, such incidents with pollution would disrupt the ecological processes in the lake. Similar impacts may occur with regards to Crn Drim and Sateska rivers, the pollution of which may cause damage to the communities. These threats should be absolutely avoided and all the precautionary measures should be properly planned and implemented.

The remnants of Struga marsh, located between Struga and villages of Kališta and Radolišta, will not be directly affected by the railway line, but some impact can be expected, e.g. use of local roads through the marsh during the operation phase). Possibilities for any future revitalisation of Struga marsh would be reduced due to the construction of the railway line.

Taking into account that the World Heritage Committee at its 38th session urged the State Party to identify alternative routes that do not cross the property, the mission visited several locations and received information about the chosen location. The State Party highlighted that due to the morphology of the terrain, and considering that the route was determined at the European Union level as the pan-European Corridor VIII, there is not much room in adjusting the planned route of the railway line.

While the construction of the railway that connects Kičevo (outside of the property) with the Albanian border, passing through the property could be considered acceptable in principle, if properly planned and implemented with all the precautionary measures as defined by the EIA,

the mission nevertheless recommends that the authorities submit to the World heritage Centre for review by the Advisory Bodies a comprehensive comparative study of alternative routes including those that do not pass in close vicinity of the lakeshore (including the option identified and proposed by ICOMOS, based on the mission visit to the site, and presented in Annex 5, map 6.5.2.5.), and which allows for avoiding one of the last well-preserved stretches of the lakeshore on the Albanian-Macedonian border, considering that the extension of the property into the Albanian territory is currently being prepared by the Albanian authorities within the framework of the Upstream Process and EU funded project "Towards the strengthened governance of the lake Ohrid Region".

#### Highway A2, European Corridor VIII

#### Description

Highway A2 is the road component of the European Corridor VIII that would eventually connect Albania with Bulgaria through the former Yugoslav Republic of Macedonia, and concerns the route between Kičevo and Struga. A2 is planned as a dual-carriageway, for a design speed of 120 km/h, with motorway characteristics (grade-separated crossings and junctions, stopping lanes on each side, for a total carriageway of 21.50 m).

According to their site configuration, the sections of A2 have different origins:

- In the mountainous region southwest of Kičevo, the route is entirely new, with many viaducts and tunnels;
- In Sateska river valley, north of Trebenište village, the existing road is doubled with a new carriageway;
- In the property, a new route is traced from Trebenište village to the north of Struga.

The section of the mission's concern here is the third one, the only within the property, and with a planned new route. The mission was informed in the future it is also planned to construct a highway connecting Struga with the border of Albania, passing the route east of the Lake Ohrid. However, the mission was informed this is a very long-term planning as no funding is yet available. The mission recalls that updated information on any plans for this road needs to be submitted to the World Heritage Centre, in line with paragraph 172 of the Operational Guidelines.

#### Assessment of threats

The mission visited several locations where highway A2 is planned to pass, the route being located in northern part of the World Heritage property. This area is largely a humanly modified agricultural land consisting of crop fields, vineyards and orchards, and including Sateska river channel (built in the 1960s). Only limited natural habitats can be found along the route, including Crn Drim river, temporary water flows during wet periods, and narrow patches of reed belts (*Phragmites australis*). Destruction of part of the agricultural fields will be inevitable in the implementation of the project, but the impact on natural values is considered low due to low habitat sensitivity. Bridges will be built over Sateska channel and Crn Drim, while during the construction phase, moderate risk of pollution (e. g. discharge of fuels, input of construction materials, including waste) was noted in the Environmental Impact Assessment study of 2015.

The Fifth national report to the Convention on Biological Diversity (Ministry of Environment and Physical Planning, 2014) noted that two ecological corridors, Treska (Podvis) and Ilinska-Stogovo mountains, have the potential to be disrupted due to the A2 construction. The report also noted the need for construction of several underground passages and at least two green passages to allow connectivity.

#### Combined impacts of highway A2 and the railway

Another impact to be considered is the conjunction of highway and railway in the same site. This combined impact has not been taken into account by any of the projects, which have been designed separately. If both infrastructures are separated by some 500 m, as it is planned in the plain north of Struga, the landscape will be impacted on a wide space and the strip of land inbetween would be difficult to access by the farmers. If they were paired, those impacts would be lowered, but the distance to cross at once under the paired infrastructures by animals would be longer. However, in such cases (as in France for TGV lines along motorways in flat lands),

the choice is generally done to pair the infrastructures, with 50 m or less in-between. This remark does not apply to the eastern part of the property, where the railway is potentially planned closer to the lakeshore and where A2 highway route is not traced yet. However, any continuation of A2 into the Macedonian Albanian should not pass along the lakeshore, in line with the recommendations adopted by the WHC at its 38th Session.

#### A3 road

#### Description

The proposed A3 expressway project is meant to connect the town of Ohrid (and eventually highway A2) with the Albanian border. It is planned as a single-carriageway, for a design speed of 80 km/h, with express road characteristics (grade-separated crossings and junctions, 2-m wide stopping lanes on each side, for a total carriageway of 11.40 m), in the position of a corniche along the hillside, at an elevation between 100 and 200 m over lake level in average. A3 is divided in three sections, from north to south, with different terms of scheduling:

- Section 1, from Kosel to Ohrid (long-term)
- Section 2, from Ohrid to Peštani (short-term, approximately 13.3 km)
- Section 3, from Peštani to the Albanian border (mid-term, approximately 12.9 km).

A further connection is planned on an even longer term between A2 and Kosel.

Only sections 2 and 3 have been presented and discussed during the mission. The justification given to the project on those sections is the insufficiency of the existing road (P1301) due to its high traffic in touristic season and its low characteristics (as narrow as 5 meters in some sections, impossible to broaden because of development along the road or proximity of the lake).

Ohrid-Peštani section is to be implemented with the funds provided by the European Bank for Reconstruction and Development (EBRD), while funds for southern section to the border crossing have not yet been secured. Justification for the construction of the new road is made based on the fact that traffic congestion during summer period (approximately one month in duration) is extremely high on the current coastal road Ohrid-Peštani-Sveti-Naum, which is amplified by unorganized car parking. Current road is used also for heavy traffic between Albania and FYROM (including also transport of chemicals and other material), creating risk for the lake and its surroundings due to potential accidents. Also, the traffic along the coastal road, passing through several coastal villages, causes local air pollution.

The proposed project can be subdivided into sub-sections (see detailed plans in Annex 5.3 A3 ROAD.), which raise different issues:

#### In section 2:

- Sub-section (a): Main A3 road from Asnom street junction (in Ohrid town) to junction with connecting road (b) above Šipokno village;
- Sub-section (b): Connecting road from P1301 at Rača village road to junction with main A3 road above Šipokno;
- Sub-section (c): Main A3 road from junction above Šipokno to junction over Dolno Konjsko village (Metropole hotel);
- Sub-section (d): Main A3 road from junction over Dolno Konjsko to Peštani village.

#### In section 3:

Sub-section (e): Main A3 road from Peštani to Sveti Naum.

#### Assessment of threats

The A3 road project may have the following impacts on the OUV of the property:

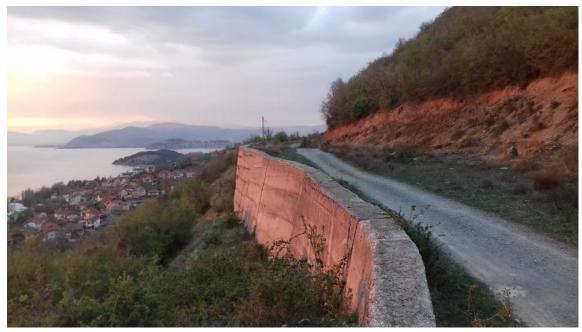
- Destruction of habitats on mountain slopes;
- Fragmentation of ecological connections by the road, especially between mountain and lake;
- Alteration of the landscape.

The impacts on landscape and natural habitats vary according to the sections of the new road:

**Sub-section a (Asnom-Šipokno)** joins the lower level (Ohrid town, at lake level) with the average road level, between 100 and 200 m over lake level; it is entirely new; the impact on landscape is high as the lateral slope imposes high cuttings and embankments. The project implies destruction of natural habitats on a wide strip (road allowance plus cuttings and embankments), disturbance on wildlife by traffic (noise, pollution, lights at night), and interruption or disturbance of ecological connections, between the mountain and the lake. The latter impact is not well mitigated: a 2-km section of the road has no passages, under or over the road. The three latter impacts on natural habitats (destruction, disturbance and interruption) take place within the National Park but in its zone of "sustainable use" (ZSU), which allows such works, and they are limited by the location of the project close to the urban area, with less valuable habitats than further south and no major ecological corridor.

Sub-sections b (Šipokno-Rača) and c (Rača-Dolno) reuse works (embankments, cuttings and sustaining walls) that had been made 40 years ago for a similar project; the impact on landscape is thus reduced as the new works will only be the making of the roadway, with no or few new structures visible from distance. The project implies destruction of the habitats that have emerged on the road allowance since 40 years, now occupied by a small dirt road surrounded by vegetation – but this impact is relatively limited with regard to the overall area of the park. More significant is the disturbance on wildlife by traffic, and, even more, the interruption or disturbance of ecological corridors, between the mountain and the lake, with risks of shocks between vehicles and animals; the latter impact is mitigated by 3 box culverts, 5-meter wide, which will allow the passage of most species, but on limited places. Although the mission was informed that active ecological corridor allowing animals to pass from the mountain to the lake and opposite exists at the location of Crno Brdo, the mission could not confirm this, as the corridor was not to be seen at this location. Currently, the coastal road does not enable the noted ecological connectivity and the proposed A3 road would even further degrade the possibility for movement of animals.

**Sub-section d (Dolno-Peštani)** involves more works, as it is entirely new, without existing structures; but it will have 7 viaducts and 3 galleries (open on their side), which will restore ecological connections between both sides of the road; there will be <u>impacts during the work phase</u>, as the galleries will not be drilled but constructed over the road, with important preliminary earthworks; but <u>the final state may be satisfying</u>, in terms of connections, and in terms of landscape if the structures are properly designed (according to recommendations given in Chapter 5).



Above Dolno, allowance of a 40-year old road project, occupied by a dirt road, with heavy sustaining walls

**Sub-section e (Peštani to Sveti Naum)** has similar impacts as sub-section (a), not mitigated by viaducts and galleries as in sub-section (d), and the natural environment is so far less touched, with less developments, and closer to the park's core zone (zone of strict protection); impacts will therefore be heavier than on sub-section (d). The mission was informed (but have not seen the area) that in this section there is an active ecological corridor, Zli Dol (a river valley stretching from the shoreline south of the village Trpejca to the high altitude forest in the zone of strict protection), likely to be used by different mammals including wild boar. The existence of this ecological corridor would be threatened by the proposed section of A3 road. This section of the proposed road (including the noted ecological corridor) passes through the Macedonian oak (*Quercetum trojanae macedonicum*) forest. Macedonian oak is listed in the Annex I of the European Union's Habitats Directive, it is Balkan endemic plant species. The road would affect about 84 ha of the oak forest that would be lost irreversibly.

The A3 road project is not compatible with the regulations of Galičica National Park, and implies amendments to the Management Plan of the park. Those amendments, motivated by this A3 road project and by the ski resort project, have been prepared for the period 2011-2020, and subject to a Strategic Environmental Assessment (SEA), prepared in August 2015<sup>3</sup>. They involve a change of the inner zoning of the park, so that the projects of concern would be located in the zone of sustainable use (ZSU), where they are admitted, instead of the zone of active management (ZAM), where such land uses are forbidden, with a shift of another part of the park from ZSU to ZAM, as a mitigation measure. The map of proposed changes is reproduced in Annex 5.4. A3 express road would affect modification of 49.85 ha that would be excluded from the current zone of active management and included to the zone of sustainable use, and thus weaken the protection of the park.

Generally, A3 road may devaluate the aesthetic value of the property. The cleared forest strip for the purposes of road construction would be highly visible from the coastline and higher viewpoints. Potentially, due to increased accessibility, A3 construction may lead to even further increased urbanization of the coastal area.

#### 3.2.3 ILLEGAL AND COMMERCIAL FISHING

The main pressures on fish species in Lake Ohrid are from fishing and water pollution. Overfishing has caused the decline of the population of endemic Ohrid trout (*Salmo letnica*), which is more affected than other fish species due to greater demand for it (it is considered a delicacy) and its economic value. Although the Government enacted a seven-year moratorium on fishing Ohrid trout in 2004, Jordanova et al. (2016)<sup>4</sup> noted that Ohrid trout "stocks have been consistently decreasing over the last decades, despite annual repopulation efforts from artificially spawned juveniles."

As the ban on fishing the trout ceased after seven years, the Government established a fishing quota, and, in 2012, handed the fishing to a private concessionaire. The concessionaire is obliged to respect the fishing quota, not to allow fishing without a permit and regularly restock the lake. While fishing in FYROM has been reducing since 1992, fishing in Albania for commercial purposes and including illegal fishing, has dramatically grown, which calls for transboundary cooperation and strengthening of mutual protection of the lake and its biodiversity. Law enforcement of the regulations related to fisheries in Albania remain to be tackled in the future. Another concern on the Albanian side is the presence of fish farms in the area of karstic springs in Driloni (an important supply of spring water, low in nutrients critical for the maintenance of its oligotrophic state of Lake Ohrid) which breed among others alien exotic

<sup>&</sup>lt;sup>3</sup> Citrus (consultants) for Public Institution National Park Galichica, *Draft Amendments to the Management Plan for National Park Galichica for the Period 2011-2020, Strategic Environmental Assessment (SEA)*, Reference: J337, August 2015

<sup>4</sup> http://www.trjfas.org/abstract.php?id=867

species such as the rainbow trout and lead to pollution from antibiotics and other chemicals used by the fish farmers, eventually contributing to the eutrophication of the lake.

The mission did not get sufficient detailed data on fish population in the lake, including the status of endemic species, while GIZ report<sup>5</sup> noted that not much information is actually available as the latest data inventory and fish stock assessments have been performed only in the early 1990s.

#### 3.2.4 SOLID WASTE

Communal waste on the territory of Ohrid Municipality is disposed at Bukovo landfill and only about 30 per cent of the population is included in the public service of solid waste collection. For Struga Municipality the solid waste is disposed in a dump that can be seen from the road between Ohrid and Struga due to its substantial height. There have also been news of uncontrolled fires in this dump in mid-April 2017. Such situation is worrying as inappropriately made landfill sites pose a great threat to the pollution of air, soil, surface water and groundwater, including risks for biodiversity, human health and agricultural land. According to the Spatial Plan of Ohrid Region 2005-2020 and Ministry of Environment and Physical Planning and Swedish Environment Protection Agency (2012), Bukovo is ranked as a site with high risk of threat to the environment, while v. Višni (in Struga Municipality) is ranked as a medium-threat landfill site. The criteria for risk determination included a set of factors; participation of the hazardous/medical waste in the total volume disposed, landfill's extent, and site characteristics and sensitivity. Based on the Ministry of Environment and Physical Planning and Swedish Environment Protection Agency (2012), the Government envisages closure of non-compliant landfills and organisation of waste collection through regional landfills. The mission was not informed about the timeline of this process and whether both Bukovo and v. Višni would be closed.

In addition to the operating landfills which do not meet the standards of the EU Landfill Directive 1999/31/EC, there are illegal dumping sites, and inappropriately disposed solid waste can be observed in various places throughout the World Heritage property, affecting the aesthetic image of the area, and also causing pollution.

Key problems include insufficient technical capacity for collection and disposal of waste, and inadequate treatment of industrial dangerous, non-dangerous waste, and medicinal waste. The problems with collection and treatment of communal waste is amplified in summer due to large number of tourists staying in the region.

Improving the effectiveness of solid waste collection and treatment should be seen as one of the key priorities for the region, and should be accompanied by appropriate education of the local population.



Illegal dumping in Crn Drim plain

<sup>&</sup>lt;sup>5</sup> https://www.giz.de/en/downloads/giz2016-en-initial-characterization-prespa-ohrid-shkodra-skadar.pdf



Inappropriate disposal of waste in the World Heritage property, western coast of the lake Ohrid

#### 3.2.5 LAKE POLLUTION

The institution responsible for monitoring of the Ohrid aquatic area including all potential negative impacts to the watershed, as well as stocking of the Ohrid trout, is the Hydrobiological Institute located in the town of Ohrid. Water of the Lake Ohrid is largely oligotrophic, with ongoing eutrophication representing one of the major threats. Eutrophication is most evident near the river mouths of Sateska, Koselska, Velgoška and Čerava rivers.

According to the GIZ study of 2016, the Lake Ohrid nutrient and pollution load has decreased due to the recent modernization of the main wastewater collector and treatment plants located near Vraništa and Struga. Around 75-80 per cent of the Ohrid-Struga region is connected to the central sewer system. After being processed, wastewater is being released to Crn Drim river that outflows from the lake. Despite the recent improvement of the wastewater treatment collector through the German Bank for Development (KfW) financed project, the main collector's principal tubes are damaged due to the collector's insufficient carrying capacity resulting with leakage of infiltrated water in the lake. Japan International Cooperation Agency (JICA) reported in 2012 that further improvements in the wastewater treatment are urgently needed, alongside raising the technical capacity of staff managing the collector, and awareness of the public about impacts of discharging wastewater (and solid waste) from their households.

In Albania, the wastewater treatment plant is located in Pogradec, cleaning approximately 70 per cent of the wastewater produced in Pogradec. Wastewater from other villages is left untreated as its collection is not connected to the central system. Similarly, in FYROM, Trpejca, Radožde and several other villages are disconnected from the main wastewater collector and plants. Wastewater discharge in these settlements is being addressed at individual basis through separate septic tanks and in an inappropriate manner endangering underground waters.

In the north, the main pollutants are phosphorus and nutrient load. Apart from these pollutants, key threats affecting the quality of the water in the lake include also conversion of natural landscape (beaches, urban infrastructure), agriculture and climate change.

Agriculture is concentrated in the plains north of the lake and along the watersheds of its main tributaries. Fertilizers, soil particles and pesticides are washed away together with the erosion processes. There is less pressure of agricultural source of pollution coming from the Albanian side as agricultural land use has decreased significantly in recent years. However, industry, especially metallurgical, chemical and mining, represents a significant threat to the water quality of the lake.

Lake Ohrid is a large water body with significant ability of self-purification and resilience towards anthropogenic pressures such as eutrophication, siltation and pollution. As already noted, the lake is mainly in the natural oligotrophic state, particularly in the pelagic zone which is also characterised by a good ecological status. Largely endemic benthic invertebrate and native fish fauna seems to be in stable condition in the lake's pelagic zone. However, this assessment, according to the 2016 GIZ study, does not hold for the littoral zone of the lake where moderate

to bad status of aquatic flora and invertebrate fauna and was diagnosed, particularly at the mouths of Lake Ohrid tributaries. The macroinvertebrate fauna at the Macedonian part of Lake Ohrid indicated good ecological status at two sites only, west of the town of Ohrid and north of the village of Trpejca.

Another source of concern is in the reconstructed pile dwelling settlement of Bay of Bones Archaeological Museum nearby Gradište peninsula (above mentioned, p. 26). The mission was informed that the construction material that was used for this museum (wood piles) might disrupt regular fish spawning due to the heavy chemicals used on the wood.

#### 3.2.6 INVASIVE SPECIES

Invasive species found in the Ohrid Lake include fish species Rainbow trout (*Oncorhynchus mykiss*), Silver carp (*Hypophthalmichthys molitrix*), Stone moroko (*Pseudorasbora parva*), and bitterling (*Rhodeus amarus*) plus Acute pond snail (*Physa acuta*) and a plant, Canadian Waterweed (*Elodea Canadensis*). They have been introduced from various sources, e.g. from Prespa Lake to Ohrid Lake through the underground water system due to karstic geomorphology, from Sateska and Crn Drim rivers (e.g. invasive snail species potentially carried by birds), or through introduction by humans.

Based on the information communicated by the Hydrobiological Institute of Ohrid during the mission, invasive species are one of the reasons for the observed changes in the population of endemic species, especially relating to the move of the endemics away from the mouths of the rivers deeper into the lake. Although due to restrictions in financing biodiversity monitoring, precise information are largely missing, the Hydrobiological Institute informed the mission that several endemic species are considered endangered. No further data have been provided to the mission team.

#### 3.2.7 HYDROLOGICAL ISSUES

In 1962, Sateska river that used to be Crn Drim river's tributary, was diverted into the Ohrid Lake, as to reduce siltation of Globočica reservoir in the Drin Basin, drain the Struga marshland (now used for farming), and ensure continuous flow of Lake Ohrid water for generation of hydroelectric power. An overflow structure controlling the water flow from the lake into Crn Drim is located in Struga. Alteration of Sateska water course led to draining of about 2,500 ha of land, used mainly for agricultural purposes. It has also brought significant impacts to the hydrological characteristics of both the river and the lake. Sand and gravel has been extracted from Sateska riverbed in an uncontrolled manner, leading to significant erosion. While previously implemented anti-erosion measures used to be successful in decreasing sedimentation in the river, and in the lake accordingly, this practice was abandoned causing large amount of sediment being deposited in the artificially constructed river flow and in the lake. Considerable sedimentation has degraded the channel and caused creation of a large river delta at the inflow into the lake. The load also includes a lot of organic material influencing the level of oxygen in the receiving waters and altering flora and fauna in this part of the lake.

On the Albanian side of the lake, no flow regulations have been undertaken, but the ecology of the water body is threatened due to continued destruction of wetlands and uncontrolled urban development.

Hydrology of the lake is also affected by water extraction for the irrigation purposes and public water supply, in both countries surrounding the lake. Furthermore, the mission was informed that the discharge of the lake water into the Crn Drim is not appropriately managed by the Macedonian power plants company ELEM, affecting the decrease of the Ohrid Lake water level, and in long-term, its ecosystem.

# 3.2.8 TOURISM PRESSURE, INCLUDING LARGE TOURISM DEVELOPMENT PROJECTS

Tourism is the most important and attractive sector of the regional development. The mission was informed that Ohrid region is exposed to high visitor pressure, especially during the summer season. The State Party informed the World Heritage Centre about the planned tourism development projects as follows.

### Galičica ski centre

The Galičica ski centre project's objective is to establish a regional sporting and recreational centre in the park for all seasons. The base area for the ski centre contains two main components: the Gradište Lakeside Village and the Upper Peštani Base. Preparation of Urban Planning Documentation for Gradište development zone containing 300 apartments, a hotel, and a lakeside area to be landscaped with Mediterranean horticulture (13.83 ha) is in the initial phase. The Upper Peštani Base (about 17.5 ha) is planned to be the starting point for year round access to the ski centre (gondola terminal with accompanying facilities, i.e. ticket facilities, restrooms, guest services, rentals, a café, small retail shop, office space and employee space). This site was identified due to the large area with gentle slopes suitable for development and potential connection to the proposed future A3 expressway. Three parking lots (3 ha, capacity of 935 cars and 12 busses) are planned to be accessed by 1 km long road. The development area will be accessed beyond the day visitor parking area with 2.2 km of proposed road that climbs to an elevation of 900 m (200 m over lake level). There will be a cluster of hotels, low density single-family units and medium density apartments.

The mid-mountain zone components of the ski centre contain: the mid mountain lodge (0.25 ha), children snow play area (2 ha), Nordic ski trails and snowshoe trails (21.5 ha), and the skiing beginner area (a lift of about 50 m in length).

The main ski area includes: the mountain top lodge (0.2 ha), 15 km of ski pistes (52.5 ha), artificial snowmaking pond on the Lake Prespa side (approximately 38,500 m³ of water will be required per season and, when the resort is fully operational, approximately 104,500 m³ per season).

Nordic (cross-country) ski trails (221 ha) will be developed on gentle terrain that is too flat for commercial skiing and will be accompanied by a building (Backside Lodge) and a summer parking lot.

The ski centre will potentially also include construction of another base with gondola at Lake Prespa side (which is not included in the World Heritage property). The centre will include 5 lifts, a power line, potable water pipeline, and a sewer (septic tank and a drainage field). The proposed mountain capacity is 3,500 people per day.



A view from the coastal road towards the ski resort location

#### Assessment of threats

The convergence of well-conserved natural values with the quality and diversity of its cultural, material and spiritual heritage makes this region truly unique. Construction of the Galičica ski centre has a high potential to negatively impact the natural values of the property and disturb the spiritual significance of the site. The property's overall coherence, and particularly the relationship between landscape and the lake is vulnerable due to the lack of adequate control of new development. The ski centre's infrastructure and the forest clear-cuts to be made for gondolas and lifts would be highly visible from parts of the coastal road along the Lake Ohrid, while the infrastructure would be particularly visible from higher altitudes in the park, conflicting with and jeopardising the property's OUV. Further threat to the property's OUV would be generated by tourism development zones in Gradište and Upper Peštani. Creation of artificial snow may ultimately alter the ecological and hydrological balance of the mountain due to the changed water regime and increased water run-off from the mountain, especially because of its karstic geomorphology. It is not clear if the assessment has been made on possible impacts of artificial snow making on the Lake Ohrid's hydrology and water quality, which should be detailed in the project design.

Galičica National Park is renowned for its floral diversity and the ski centre would cause destruction of plant communities and fragmentation of habitats. Three habitat types in particular that would be impacted by the ski centre development are listed in Annex I of the European Union's Habitats Directive, including the Alpine and sub-alpine calcareous grasslands, *Juniperus communis* formations on heaths or calcareous grasslands, and Illyrian *Fagus sylvatica* forests.

Of the many species of conservation interest that are protected within the park, two have been identified by Galičica National Park management authority to be of particular concern. These are the protected plant species *Crocus cvijicii* and the protected Apollo butterfly (*Parnassius apollo*). The latter is listed in the IUCN Red List as Vulnerable. Habitat of both species coincides in parts with the proposed ski centre development area. *Crocus cvijicii* blooms shortly after the snow melts. Apart from potential destruction during the infrastructure building (excavations), this plant is at risk from the use of artificial snow which may suffocate the plant before blooming. The Apollo butterfly will be exposed to higher chance of being captured by visitors due to the increase of the number of people in the park (it is a prized species).

Further threats include the potential of bringing more uncontrolled urban development to the vicinity of the ski centre, additional pressure from the increased number of visitors, and increased human disturbance. Additionally, Galičica National Park already suffers from serious lack of conservation management, as the staff is largely working in the forestry sector managing timber extraction and other use of natural resources in about 40 per cent of the park (as noted by the national park staff during the mission), for commercial purposes. Such activities are not appropriate for a World Heritage property and should be very limited and highly regulated if existing at all. The ski centre would generate additional pressure to the under resourced park's staff to deal with visitor management (in addition to negatively impacting the natural values of the park) instead of focusing on the main management objectives of the national park which should be protection of species and conservation management including biodiversity monitoring.

The ski centre development would threaten not only the national park's management effectiveness, but also its integrity because of the proposed changes in the park's zoning. Galičica National Park is managed on the basis of the objectives set for three different zones; zone of strict protection, zone of active management, and zone of sustainable use. At the moment, the proposed ski project, alongside the A3 express road, collide with these regulations and modifications in the current zoning system are required. The changes would include exclusion of land from the zone of active management and its incorporation into the zone of sustainable use. The total directly affected area includes 529.55 ha of the park's territory, where 496.15 ha would be excluded from the current zone of active management and re-zoned to the zone of sustainable use, pending approval of the Strategic Environmental Assessment (SEA) on the Draft Amendments to the Management Plan for National Park Galičica for the Period 2011-2020.

### Ljubaništa tourism development zone

Ljubaništa tourism development zone, located in Ohrid Municipality on the eastern coast of Lake Ohrid, has originally been divided into three components, Ljubaništa 1, 2, and 3. Ljubaništa 3 project has been abandoned while Ljubaništa 1 and 2 are still planned. Based on the State Party's State of Conservation report 2017, Urban Planning Documentation for Ljubaništa 1 (covering an area of 26.80 ha) was developed in 2014 and is currently under the approval procedure. The mission did not receive this document. Preparation of Urban Planning Documentation for Ljubaništa 2 (covering an area of 289.50 ha) is in the initial planning phase.

According to the information provided in SEA on the Draft Amendments to the Management Plan for National Park Galičica for the Period 2011-2020, Ljubaništa 1 tourism development zone will consist of housing infrastructure, commercial and business infrastructure, green areas including with recreation purposes, and other infrastructure. 20 per cent of the tourism development zone is planned to be constructed in the Lake Ohrid itself, and the remaining part within the boundaries of Galičica National Park. Similar to the ski resort and A3 road projects, Galičica National Park's zoning is planned to be modified for the purposes of this project, i.e. 0.69 ha would be excluded from the current zone of active management and added to the zone of sustainable use.

### Assessment of threats

According to SEA on the Draft Amendments to the Management Plan for National Park Galičica for the Period 2011-2020, there are no major concerns over ecological effects from these developments. Nevertheless, the project is planned in its entirety in the World Heritage property and the ultimate results would be an increased number of visitors, including cars, creating further pressure to the property. As the planning documentation was not transmitted, it is unclear what the proposed development in the lake contains and if it will affect the water quality or any other relevant aquatic ecological aspect.

The mission team did not visit the planned location for Ljubaništa tourism development zone due to time constraints.

The State Party reported in the State of Conservation report 2017 that smaller-scale development projects are also planned for the Ohrid region and these include, but are not restricted to the following:

### Studenčišta marsh pedestrian path and street

Studenčišta marsh is located to the east of the town of Ohrid along the lake's shore. Two projects for reconstruction of the pedestrian path by the Studenčišta channel and the construction of a pedestrian street from the channel to the national park are currently planned. It is unclear if appropriate planning documentation for these two projects have been prepared and approved yet. The information on the exact location and environmental impacts of these projects has not been provided, nor has the mission visited the area.

Studenčišta marsh is a sensitive wetland system containing many valuable species and acting as a natural filter for the lake. Considering that Studenčišta marsh is already under severe pressure from nearby urban development, any projects planned in this area should carefully consider environmental and biodiversity impacts before getting approval for implementation. The 5th State Party's report to the Convention on Biological Diversity noted worrisome condition of a relict species, tufted sedge (*Carex elata*). The species' biological vitality is in decline and only small populations are still present near Studenčišta area.

### **Beach development projects**

Several projects for beach development are in planning phase and would be implemented pending funding by the Ministry of Transport and Communications. These include beach development in the Ohrid Municipality; Lagadin Beach, Daljan Beach, beach near the Scout Camp (120 m long), beach on the stretch from Studenčišta marsh to the Park Hotel (700 m long), and beach located in Debarca Municipality. No further information on these projects was provided to the mission team, except for the Lagadin beach.

### Livadišta car camp

Urban Planning Documentation for a car camp Livadišta in Struga Municipality, located in the western coast of the lake in the place of the existing car camping site, covering 5.10 ha, is under approval.

### AS car camp

Urban Planning Documentation for a car camp AS in Struga Municipality, located in the western coast of the lake in the place of the existing car camping site, covering 10.23 ha, is under approval.

### Treska tourism development zone

Preparation of Urban Planning Documentation for the tourist development zone Treska in Struga Municipality is in the initial planning phase.

Regarding the numerous projects presented to the mission, it recommends to introduce a moratorium on any coastal and urban transformation within the property, prior to the preparation/revision and adoption of the Management Plan, an OUV-based sustainable tourism strategy, including regulations for tourism activities, movable facilities at the beaches and openair commercial activity, as well as the OUV-based Urban / Coastal Master Plans.

### 4 ASSESSMENT OF THE STATE OF CONSERVATION OF THE PROPERTY

The assessment of the state of conservation with regards to the natural values of the World Heritage property primarily concerns Lake Ohrid and Galičica National Park. Chapter 3 has already outlined major aspects regarding the current condition and potential impacts to the state of conservation of these two natural assets.

Lake Ohrid's hydrology and biodiversity is exposed to diverse impacts and risks. In the recent period, the lake has been affected by decreased water levels due to prolonged dry periods without heavy rains, and also because of strong anthropogenic factor, e.g. uncontrolled discharge of the lake water into Crn Drim. In the long-term, this can pose serious threats to the entire lake ecosystem. Another problem relates to water pollution due to inadequate wastewater treatment system and evident eutrophication of the lake in certain places such as mouths of rivers that flow into the lake. Several endemic species of the lake are already considered endangered.

The property suffers from substantial urban and coastal development, including in areas that are within the boundaries of Galičica National Park. Integrity of the site is seriously degraded because of excessive, uncontrolled urbanization without evident unity in physical characteristics of the newly built infrastructure. Such development pressure is also affecting the enlarged production of solid waste and wastewater. The central wastewater treatment system does not include all the villages, and although modernized, it has no capacity to process wastewater adequately and is already affected by leakages in the system. Solid waste that is inappropriately disposed can be seen in various places throughout the property, affecting not only the aesthetic values of the site, but also health of people and posing risks for the lake and nature. There is a general problem with collection and disposal of solid waste, including inappropriate treatment of industrial and other waste.

Although not seen during the mission, the property is exposed to heavy pressures from tourism. This is limited to summer season when the visitors are attracted by relatively warm water of the lake (swimming), hiking trails in Galičica National Park, and cultural assets of the property. There is no system in place on registering the number of visitors in the property, or at least in the national park. Carrying capacity of the national park has not been determined either and no visitor Management Plan is in place. During the peak summer months, high number of visitors cause diverse problems such as traffic congestion, parking in non-designated parking places, illegal dumping of solid waste.

The elements of cultural heritage (churches, archaeological sites...) are in a good state of conservation for those seen during the mission. The urban ensembles are preserved and well managed, with a detailed inventory by the Institute for Protection of Cultural Monuments and Museum, Ohrid, that itemises every significant building. But information lacks about the effectiveness of the protection measures following this inventory.

The instauration of St. Clement's University at Plaoshnik has met the demands expressed by the World Heritage Committee. If a few construction decisions are questionable with regard to archaeological remains conservation (concrete pillars erected on old walls), their impacts remain limited.

The overall aspect of Ohrid city centre is well preserved, but out of it, cultural attributes that are more scattered (as in Struga) suffer from a poor setting that impair their visual integrity.

Another important aspect affecting the state of conservation of the property is the issue of boundaries. Primarily this relates to two aspects; one is non-integrated approach to management and protection of Ohrid Lake in terms of its transboundary aspect; and another one is non-existence of a buffer zone which would enable stronger protection and integrity of the property. Considering Lake Ohrid is a transboundary lake, there should be strong and continuous cooperation between parties of the two countries, ensuring no negative impacts from any of the countries is affecting the lake ecosystem. At the moment, although cooperation is ongoing, there is no common management of the lake, and illegal fishing occurring in Albania is still affecting the Ohrid trout population. With regards to the buffer zone, one of the key challenges is proper safeguarding of Sv. Naum water springs in Ohrid Lake, which is connected with Prespa Lake through karstic Galičica mountain. Prespa is seen as potential source from where invasive species come into Ohrid, and potentially also pollution, thus adding it to the buffer zone might ensure effectiveness of Ohrid Lake protection.

### 5 CONCLUSIONS AND RECOMMENDATIONS

# 5.1 CONCLUSION REGARDING THE OVERALL STATE OF CONSERVATION OF THE PROPERTY

The mission considered that the general state of conservation of the mixed property "Natural and Cultural Heritage of the Ohrid region" – is currently impacted upon by a number of factors which could represent a potential danger to the Outstanding Universal Value of the property in accordance with paragraphs 179 and 180 of the Operational Guidelines and cause its authenticity and integrity to become vulnerable.

The mission expressed its concern about the threats faced by the natural values of the World Heritage property relating primarily to Lake Ohrid and Galičica National Park. Lake Ohrid's hydrology and biodiversity are exposed to diverse impacts and risks including decreased water levels due to prolonged dry periods, and anthropogenic factors such as uncontrolled discharge, water pollution due to inadequate wastewater treatment systems, and evident eutrophication in certain places such as mouths of rivers that flow into the lake. In the long-term, this can pose serious threats to the entire lake ecosystem, with several endemic species of the lake already considered endangered.

The mission also expressed its concern about the extensive urban development and inappropriate exploitation of the coastal zones which could contribute to its severe deterioration, if no immediate measures are taken by the authorities.

While the core of the Ohrid historic town is well preserved, one of the main factors affecting the property are developments which have already occurred in the urban settlements, agricultural and coastal zones resulting in water pollution, degradation of habitats, alteration and loss of quality of the lake landscape. Considerable change and development have taken place since the inscription of the property. Increased urbanization along the coast has caused increased interference with natural resources, with higher water consumption, increased pollution, and fragmentation and destruction of habitat. The poor architectural quality of many buildings, inside and outside of urban areas, is also a threat to the visual quality of the property, especially in the main towns, Ohrid and Struga, comprised of relatively heterogeneous buildings. Tall buildings or any constructions close to the water, have a high visual impact, threatening the integrity of the property.

Current proposals for large infrastructure and construction projects could lead to irreversible transformations of the overall relationship between the historic city, archaeological remains, natural setting, including the Galičica National Park and the Lake Ohrid.

The mission also expressed its concern over solid waste and inappropriately made landfill sites, and illegal dumping sites observed in various places throughout the property posing a substantial threat in terms of the pollution of air, soil, surface water and groundwater, including risks for biodiversity, human health and agricultural land, and affecting the aesthetic image of the area. In addition, the mission expressed the urgent need for further improvements in the wastewater treatment from both Macedonian and Albanian sides.

Although not observed during the mission, the property is exposed to heavy pressures from tourism during summer season such as traffic congestion, parking in non-designated parking places, and illegal dumping of solid waste. The mission noted that there is no system in place for monitoring the number of visitors to the national park and carrying capacity has not yet been determined. There is currently no visitor Management Plan in place.

The mission noted the efforts of State Party to define a detailed inventory of the cultural and natural heritage elements, as well as the challenges of preparing a range of relevant Management Plans and instruments, and integrated Management Plan for the property, given the complexity and vulnerabilities of Lake Ohrid's shared natural and cultural heritage and many stakeholders. While considerable progress has been achieved with the establishment of a Commission for Management of the Natural and Cultural Heritage of the Ohrid Region, the mission noted that the latest version of the draft Management Plan for the Natural and Cultural Heritage of the Ohrid Region 2016-2025, prepared in 2015, still requires improvements. Considering the legal requirement of a Strategic Environmental Assessment (SEA) for the

adoption of the Management Plan, the mission strongly recommends that the SEA process be used for amending and strengthening parts of the Management Plan.

The zone situated in the northern part of the property is considered at risk of serious deterioration due to the infrastructural development projects, urban development and transformation of agricultural lands and represents a potential danger for the OUV of the property. Despite the 2009 boundary modification, the property's integrity can still be further improved, especially as only two-thirds of the lake are included, leaving one-third of the Albanian part of the lake outside of the property. Additionally, the protection of the property could be significantly strengthened by establishing a coherent buffer zone comprising also Lake Prespa.

Major efforts in transboundary cooperation between Albanian and Macedonian authorities are essential for ensuring appropriate integrative conservation measures not only for the protection of Lake Ohrid that crosses the national boundary, but also a wider region (ecosystem) including Lake Prespa. There are a number of transboundary agreements, strategic plans, bodies, and designations that the site benefits from, in particular the EU-funded project "Towards strengthened governance of the shared natural and cultural heritage of the Lake Ohrid region", the success of which will depend on the commitment and the implementation of concrete actions by the two countries for the protection of the Lake Ohrid region.

The issue of the potential inscription of the property on the List of World Heritage in Danger has been raised by the World Heritage Committee, Decision 40 COM 7B.64. "Further requests the State Party to submit to the World Heritage Centre, by 1 February 2017, a report on the state of conservation of the property and on the steps taken to implement the above recommendations, for examination by the World Heritage Committee at its 41st session in 2017, with a view to considering, in the case of confirmation of the ascertained or potential danger to OUV, the possible inscription of the property on the List of World Heritage in Danger."

The property is currently impacted upon by a number of factors which could represent a potential danger to the Outstanding Universal Value of the property in accordance with paragraph 179 and 180 of the Operational Guidelines and cause its authenticity and integrity to become vulnerable. However, the mission considers that the State Party should be provided with an opportunity to address all concerns and to implement the mission recommendations, but if these actions are not completed promptly the property may soon meet the conditions for inscription on the List of World Heritage in Danger.

It is also recommended that the State Party develops a time bound Action Plan for implementation of all recommendations provided below and immediate, short- and mid-term measures listed in the Executive Summary of this report, and secures adequate funds for corresponding activities.

### 5.2 RECOMMENDATIONS

On the basis of numerous discussions during meetings with national and local authorities, as well as of the analysis of the state of conservation of the World Heritage property, the mission developed a set of recommendations to address the potential threats which could have deleterious effects on the property's Outstanding Universal Value. These are presented in detail here below, topic by topic.

### **5.2.1 EUROPEAN CORRIDOR VIII**

The European Corridor VIII, with its two heavy infrastructures, will have certain impacts on the property. Recommendations on how to avoid or better mitigate those impacts are given hereafter.

### Railwav

Construction of the railway that connects Kičevo (outside of the property) with the Albanian border is acceptable in principle if the subsequent advice is followed:

In Section 1, north of Struga: potential pollution of Sateska must be completely avoided.

- In Section 2, between Struga and the tunnel mouth: the highest threat is posed to the Lake Ohrid and Crn Drim river, particularly in terms of any incidents that might happen all measures must be taken to avoid any water pollution.
- Section 2, the tunnel is acceptable, as its impact to the environment is minimal, but its position, with regards to the route it implies on the Albanian part of the lake shore, is questionable as it puts at threat one of the last one of the last well-preserved stretches the Ohrid lake shore.
- The project should envisage construction of a number of green passages and crossing areas to ensure smooth movement of animals and people.

### Therefore, the mission recommends that the State Party:

### **Recommendation 1)**

Develop and submit to the World Heritage Centre, for review by the Advisory Bodies, a comprehensive comparative study of alternative routes for the European Corridor VIII railway including those that do not pass in close vicinity of the lakeshore, and in particular avoiding one of the last well-preserved stretches of the lakeshore on the Albanian-Macedonian border (including the option identified and proposed by ICOMOS, based on the mission visit to the site, and presented in Annex 5 (6.5.2.5))

### **Highway A2 and Combination of projects**

The overall proposed route for highway A2 Trebenište-Struga is acceptable in the plain of Crn Drim and Sateska rivers.

However, no passages for movement of people and animals have been envisaged along the route, only pipe culverts for drainage.

Between Struga and the Albanian border, where A2 is planned on the long range, no route has been proposed yet. The existing road can be taken to the standards of an expressway, with nominal speed between 80 and 100 km/h, by straightening the sharpest turns, suppressing direct accesses (with a new small road to restore them and for slow vehicles) and adapting crossroads (grade-separated or roundabouts). If the traffic justifies on the long term to transform it into a dual-carriageway, the existing road should be used for one of the carriageways, and the other one constructed along or not far, as it is done in other sections of A2.

It should also be noted that archaeological findings have been made nearby the route of highway A2, which poses certain risks that need to be taken into account during its construction.

### **Recommendation 2)**

### With regards to the construction of highway A2:

- d. Ensure that sufficient passages for people and wildlife are provided that should be wide and high enough to enable smooth crossing by their users, and which should include at least one of the pipe culverts every kilometre with a diameter of two meters,
- e. Upgrade the existing road between Struga and the Albanian border, rather than tracing a new highway, in view of the fragility of the environment in that part of the property, and to the closeness of the lake,
- f. In case of new archaeological findings during the construction works, suspend all construction until the necessary research and inventory work has been carried out.
- g. Any continuation of A2 into the Macedonian Albanian border should not pass along the lakeshore, in line with the recommendations adopted by the WHC at its 38th Session.

### **Combination of projects**

### **Recommendation 3)**

Assess the cumulative impacts of the railway and highway A2 on the Outstanding Universal Value (OUV) of the property, and justify the choice of not pairing them, or not changing their alignments in order to bring them closer in the northern part of the property.

### 5.2.2 A3 ROAD

Construction of the road A3 is only partially acceptable and it is strongly advised to follow these recommendations:

- Sub-sections (b) P1301 at Rača-junction with the main A3 road above Šipokno, (c) main A3 road at Šipokno-junction over Dolno Konjsko, and (d) main A3 road at junction over Dolno Konjsko-Peštani, are the most justified in terms of traffic and developments along the existing road, and with the lowest impacts on landscape and natural habitats, as (b) and (c) can reuse earthworks and structures made 40 years ago, and (d) is made of a series of viaducts and semi-open galleries. The authorities should take all appropriate measures to avoid and minimize the impacts.
- Sub-sections (a) main A3 road from Asnom street junction in Ohrid town-junction with the connecting road (b) above Šipokno, and (e) Peštani-Sveti Naum, both have less justification ((a) because the existing P1301 road is a dual-carriageway which already meets the requirements, (e) because there are less traffic and developments along the road, especially if the project of Galičica Ski Centre is abandoned, as recommended below) and more substantial impacts (the highest being in section (e)). These subsections of the new A3 road should be abandoned and replaced by works on the existing road, with new sections only to bypass the villages Trpejca and Ljubanište. In so doing, ecological corridor Zli Dol should remain functional, and no change of Galičica National Park zoning system (envisaged exclusion of 49.85 ha of zone of active management and inclusion in the zone of sustainable use) should occur.

The amendments recommended to be brought on sections (b), (c) and (d) are the following:

<u>De-grading the standards from express road to ordinary road</u>: it is not necessary to design a road with the standards of an express road when it is planned for a maximum speed of 80 km/h, as here; these standards concern mainly:

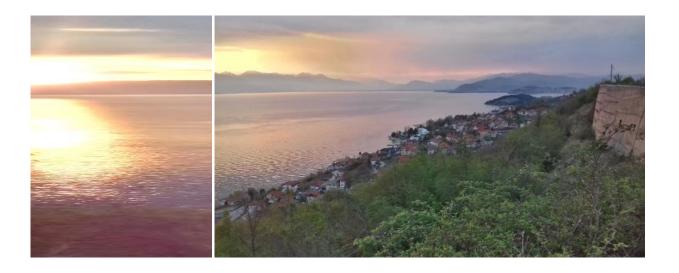
- cross section (suppression of the stopping lanes, which add 4-meters of width to the cross section and are not justified for such a speed);
- minimal radius of curves;
- slopes;
- type of crossings: some crossings may be grade-separated (small paths, without junctions), but the junctions should be level crossings (as the motorway-type junctions, with their connecting ramps, may cause excessive speeds); the most appropriate junction type is the roundabout, which may be reduced in size and occupy a limited space (more than a classical junction, but less than a motorway-type junction).

<u>Designing the viaducts with a high standard of quality</u>: whether small or important, a viaduct, if well designed, may be an enhancement of the landscape; this does not imply additional decorations on technical structures, but designing each technical project with a view of giving it a sleek shape.

Adapting the design of semi-open galleries in order to better integrate them:

- (1) restoring a cross section closer to the natural one above the galleries (see proposal in Annex 6.5.3),
- (2) adapting earthworks on the side of galleries to hide them in some places,
- and (3) planting climbing plants on lateral pillars and trees in front of them.

With these amendments, this road could not only have a satisfactory integration, but also become a scenic road offering outstanding views on the lake.



This could call for the creation of scenic parking spaces. The latter should also be carefully designed in order to limit their impacts, but in any case, this solution would be preferable to a cross section with stopping lanes, which would be used to gaze the landscape instead of only in case of emergency.

### **Recommendation 4)**

Permanently abandon plans for the construction of sub-sections (a) and (e) of the A3 road, and suspend the construction of other sub-sections of the A3 road until all appropriate measures are taken to avoid and minimize their potential impacts on the OUV of the property, in line with the specific recommendations made in this report.

## 5.2.3 GALIČICA SKI CENTRE

### **Recommendation 5)**

Permanently abandon plans for the construction of the Galičica ski centre project, maintain the current internal national park zoning, and consider developing ecotourism options that would not negatively impact the property.

# 5.3 RECOMMENDATIONS FOR ANY ADDITIONAL ACTION TO BE TAKEN BY THE STATE PARTY

### Management Plan and the SEA

The Strategic Environmental Assessment (SEA) process for Ohrid Region Management Plan (2016-2025) should begin as soon as possible. The mission recommends that the State Party, should there be a need for it, requests technical assistance from the World Heritage Centre and the Advisory Bodies, with detailed Terms of References of experts required to provide support in the development of the SEA. It is strongly recommended that the SEA process is used for amending parts of the Management Plan for the Ohrid Region to improve certain elements, as outlined in chapter 3.1.1 and to assess the cumulative impacts of the large infrastructure projects, as requested by the World Heritage Committee (Decision 40 COM 7B.68).

### **Urban and coastal development**

Ohrid region has experienced heavy urban/coastal development during the recent decades. No construction should be undertaken in the future in the coastal belt of the lake, in a width larger than 50 metres from the elevation of the highest water level of Lake Ohrid, in conformity with the Law on Waters. The mission was informed that land-use (or spatial) plans on the municipality level exist but they have not been communicated during the mission. There should be strict enforcement of land-use plans in each municipality, avoiding any urban sprawl by providing none or only very limited urban extensions, and forbidding any development out of urban areas and urban extensions.

### **Tourism pressures**

Considering that a significant number of beach development projects is planned that might affect the state of conservation of the Lake Ohrid and its surroundings, and result with increased pressure to the property, the mission recommends that the State Party provides further information about the extent of beach development to the World Heritage Centre. Also, further information about the planned projects in Studenčišta marsh should be provided to the World Heritage Centre. It is unclear if any planning documentation for the construction of a pedestrian path and a street was developed and where these are located in terms of the location of a marsh, which is a sensitive ecosystem.

Tourism pressures are significant in the property. As currently there is no visitor management system in place, it should be a priority to develop and implement an OUV-based sustainable tourism strategy. Furthermore, considering the nature and extent of communicated planned tourism development projects in the property, it seems that commercialisation of the region is the key vision for development. It is strongly recommended to orientate towards genuine protection of the World Heritage property, and, in terms of tourism development, explore nature-friendly options (e.g. birdwatching, hiking, mountain biking).

In light of all of the above, the mission makes the following recommendations:

### **Recommendation 6)**

Put in place a moratorium on any coastal and urban transformation within the World Heritage property, at least until all relevant planning documents (Management Plan, OUV-based Urban/Coastal Master Plans etc.) have been prepared and adopted, effective protective juridical regulations have been approved, and effective control mechanisms are established:

### **Recommendation 7)**

Finalise all relevant planning documents (Management Plan, OUV-based Urban/Coastal Master Plans, OUV-based Tourism strategy, including regulations for tourism activities, movable facilities at the beaches and open-air commercial activity) and submit them to the World Heritage Centre for review by the Advisory Bodies; It is strongly recommended that the SEA process be used for amending and strengthening parts of the Management Plan.

### **Recommendation 8)**

Rigorously ensure that cumulative impacts of any infrastructure, urban and/or coastal development projects on the OUV of the property are assessed during the Strategic Environmental Assessment for Ohrid Region Management Plan (2016-2025), and submitted to the World Heritage Centre, for review and comments by the Advisory Bodies before any decisions are made that would be difficult to reverse, in accordance with paragraph 172 of the Operational Guidelines.

### **Recommendation 9)**

In relation to illegal constructions within the property:

- undertake a detailed inventory of all existing illegal constructions within the property and carry out relevant Heritage and Environmental Impact Assessments (HIA and EIA) to assess their impacts on the OUV of the property,
- b. remove all illegal constructions within the property and in particular within the Galičica National Park, which, based on the above-mentioned HIAs and EIAs are considered to represent a threat to the property, including its authenticity and conditions of integrity, and
- c. ensure the strict enforcement of existing laws and regulations to prevent any further illegal construction within the property;

### **Boundary** issues

Considering that the property currently does not have a buffer zone, the mission strongly recommends the State Party to:

### **Recommendation 10)**

Undertake a thorough assessment in view of defining and establishing a buffer zone for the property, in order to strengthen its protection, which should ideally include Prespa Lake, as an important part of the connected Ohrid-Prespa ecosystem, as well as the remaining part of Galičica National Park.

### Civil society involvement

### **Recommendation 11)**

Clarify the decision-making mechanism and tasks and functions of the Commission for Management of the Natural and Cultural Heritage of the Ohrid Region, and establish genuine participative approaches in the management of the property to ensure adequate involvement of local communities and civil society organizations.

### Transboundary cooperation, including on fisheries management

In light of already established transboundary cooperation between the Albanian and Macedonian authorities, continuation and further strengthening of cooperation in the protection and conservation of the World Heritage property should be a priority for the benefits of the lake ecosystem. The authorities from the two neighbouring countries should particularly find ways of collaboration in areas that affect the health of the lake ecosystem and that should be carefully defined by parties from both countries. For example, these should include monitoring of the lake's biodiversity, monitoring of water quality, exchange of relevant scientific data, and establishing common management actions, e.g. jointly agreed fishing quota. Establishment of such cooperation should be viewed as a short-term priority—the ongoing Pilot Upstream Project for the extension of the World Heritage property to the Albanian part of the Lake Ohrid region presents an excellent opportunity in this regard, including to develop a joint transboundary Management Plan to ensure common management of the lake and the surroundings. Population of Ohrid trout has declined primarily due to overfishing. While fishing quota system was introduced in the country, further threats of overfishing are coming from Albania where illegal fishing occurs. It is advised that the Macedonian authorities inform the neighbouring country of their experience in managing the trout.

### **Recommendation 12)**

Strengthen transboundary cooperation with the State Party of Albania in the protection and conservation of the property, in particular on monitoring the lake's biodiversity and water quality, exchanging relevant scientific data, and establishing common management actions such as jointly agreed fishing quota.

### Lake pollution

Wastewater is one of the key pollutants of the Lake Ohrid. Having an appropriate and fully functional wastewater treatment collector is of utmost importance for the sustenance of the lake ecosystem. Wastewater treatment system currently does not fulfil its central objective due to the damages incurred in the system and insufficient carrying capacity. Also, not all the settlements are connected to the central system.

### **Recommendation 13)**

Improve the central wastewater treatment system for all settlements in the Lake Ohrid basin, and enable education and training of relevant staff to build their technical capacities.

Information about chemical composition of wood piles used as walking boards in the Bay of Bones Museum above Lake Ohrid should be provided to the World Heritage Centre, including a national expert opinion about the threat potentially posed by the chemical concentrations used on the wood piles to fish spawning in the lake water below the museum.

### **Recommendation 14)**

Provide to the World Heritage Centre, for review by the Advisory Bodies, detailed information about the chemical composition of wood pylons used for the walking boards in the Bay of Bones Museum, including a national expert opinion about the threat potentially posed by the chemical concentrations used on the pylons to fish spawning in the lake waters below the museum.

### Hydrological issues

Considering that water level of Ohrid Lake has decreased mainly because of human factors, which are threatening the lake ecosystem, it is highly important, and should be considered as a priority, to stabilize the water level by controlling the discharge of the lake water into the Crn Drim river by Macedonian power plants company ELEM.

Diversion of Sateska River into Ohrid Lake has led to dramatic changes in the lake's littoral area, creating a large delta and altering biodiversity. The mission recommends exploration of an idea to re-divert Sateska back into the Crn Drim River.

### **Recommendation 15)**

Develop and implement appropriate measures to stabilise the water level of Lake Ohrid, including regular monitoring and control of discharge of lake waters into the Crn Drim river by Macedonian power plants company ELEM, and explore options to re-divert the Sateska river back into the Crn Drim river;

### Solid waste

Waste is one of the major factors affecting the state of conservation of the property. Adequate, including accessible and functional, communal solid waste collection system should be enabled in the whole Ohrid region as a matter of urgency. It is also a high priority to close and clean all illegal dumping sites within the boundaries of the property. Strong support should be given to the development of a recycling activity sector, with corresponding implementation of selective sorting. Region-wide education campaign about the appropriate solid waste disposal should be provided for local communities.

According to the risk prioritization system, Bukovo landfill in Ohrid Municipality poses high threat to the environment and human health, while v. Višni was assessed as a medium-threat landfill. The mission encourages the authorities in realising the plan to close high-risk landfills and organise a regional waste management system, developed and operating according to the EU standards.

### **Recommendation 16)**

Close and clean up the Bukovo landfill and all illegal waste dumping sites within the property, and establish a functional communal waste collection system.

### **Invasive species**

The mission did not receive adequate information about the seriousness of threat posed by invasive species in Lake Ohrid, although it was communicated that some endemic species might be endangered. All necessary measures should be undertaken to control the invasive species in the lake and regular biodiversity monitoring should be implemented. Special protection measures, according to legal provisions, should be duly undertaken for endangered species.

### **Recommendation 17)**

Take all necessary measures to control invasive species in Lake Ohrid and ensure the regular implementation of a biodiversity monitoring programme, and enforce legal provisions to ensure the protection of endangered and endemic species.

### **Public space management**

### **Recommendation 18)**

Reduce motorised traffic in Ohrid old town, with time slots for access and restrictions to parking, referring to examples of good practices from other historic city centres around Europe and globally.

### **Recommendation 19)**

Implement appropriate measures in order to prevent any loss of archaeological remains and deterioration of architectural and urban planning coherence, including by enhancing the surroundings of historical buildings and archaeologic sites by landscaping and public space improvement, with observance of authenticity and integrity, avoiding shapes and materials too conspicuous or estranged to the site and local culture and flora (e.g. palm trees), as well as avoiding large size commercial billboards within the property, replacing them with smaller size posters.

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### 6 ANNEXES

## 6.1 ANNEX 1: TERMS OF REFERENCE OF THE 2017 REACTIVE MONITORING MISSION

Joint World Heritage Centre – ICOMOS – IUCN Reactive Monitoring Mission Natural and Cultural Heritage of the Ohrid Region (the former Yugoslav Republic of Macedonia)

### 9-14 April 2017

At its 40th session, the World Heritage Committee requested the State Party of the former Yugoslav Republic of Macedonia to invite a joint World Heritage Centre/ICOMOS/IUCN Reactive Monitoring mission to the property to assess its state of conservation and to provide technical advice to the State Party with regards to the scope and development of a Strategic Environmental Assessment (SEA) and a Heritage Impact Assessment (HIA) which would comprehensively assess the potential individual and cumulative impacts of all proposed infrastructure projects and other major projects on the Outstanding Universal Value (OUV) of the property (Decision 40 COM 7B.68). The mission team will be composed of Ms Anna Sidorenko, representing World Heritage Centre, Mr Pierre-Marie Tricaud, representing ICOMOS, and Mrs Maja Vasilijevic, representing IUCN.

Considering that the large-scale infrastructure projects recently proposed within and around the property, in particular the A3 road, the Railway Corridor VIII, Highway A2 and the Galičica Ski resort, appear to represent a potential danger to the property, in line with paragraphs 179 and 180 of the *Operational Guidelines*, the mission should undertake in particular the following:

- Provide technical assistance to the State Party with regards to the scope and development of a Strategic Environmental Assessment (SEA) and Heritage Impact Assessments (HIAs) which would comprehensively assess the potential individual and cumulative impacts of all the above-mentioned infrastructure projects and other major projects on the OUV of the property and would also include consideration of alternative routes and locations for these major projects;
- 2. Assess the overall state of conservation of the property and, in line with paragraph 173 of the *Operational Guidelines*, assess any other relevant conservation issues that may negatively impact on the OUV of the property.

It would be appreciated if the following items could be provided in English to the World Heritage Centre (copied to IUCN/ICOMOS) as soon as possible; to enable preparation for the mission:

 a) Latest information on the current status of the above-mentioned projects and all relevant project materials, including existing Environmental Impact Assessments (EIAs) and Heritage Impact Assessments (HIA) for each project.

The mission team should be assisted to conduct the necessary field visits to key locations, and to meet all of the relevant stakeholders concerned. The mission team should hold consultation with the Macedonian authorities, in particular the Ministry of Culture and the Ministry of Environment and Physical Planning; additional consultations should be held with the range of other relevant stakeholders, including: i) NGOs; ii) researchers.

Based on the results of the above-mentioned assessment and discussions with the State Party representatives and stakeholders, the mission team will develop recommendations for the Government of the former Yugoslav Republic of Macedonia and for the World Heritage Committee in relation to measures needed to address potential threats to the Outstanding

Universal Value of the property and to improve its management. It should be noted that recommendations are made within the mission report (see below), and not while the mission is still on-going.

The mission team will prepare a concise mission report on the findings and recommendations of this Reactive Monitoring mission no later than 6 weeks after the end of the field visit, following the standard format.

### 6.2 ANNEX 2: ITINERARY AND PROGRAMME OF THE MISSION

UNESCO/ICOMOS/IUCN Reactive Monitoring Mission for the World Heritage property "Natural and Cultural Heritage of the Ohrid region",

9 - 14 April 2017, the former Yugoslav Republic of Macedonia

### Programme

### Sunday, 9 April- Skopje

UNESCO/ICOMOS/IUCN Reactive Monitoring Mission arrive in Skopje, the Former Yugoslav Republic of Macedonia.

### Monday, 10 April- Skopje- Ohrid

09:00-10:00 Skopje, Venue: Ministry of Culture

First joint meeting with the representatives of the responsible Ministries, members of the Working group for implementation of the WHC UNESCO Decision (for Culture, Environment and Transport), the Directors of the Cultural and Natural Heritage Protection Offices, representatives from the Cabinets of the Prime Minister and Vice Prime Minister and representative from the National Commission for UNESCO.

### Present persons - members of the Working group

- Mrs. Lidja Topuzovska, Secretary General of Macedonian National Commission for UNESCO and Assistant Head of Sector for International Cooperation and Cooperation with UNESCO in the Ministry of Culture
- Mr. Zoran Pavlov, Head of Sector in the Cultural Heritage Protection Office -Ministry of Culture and National Focal Point for Cultural Heritage of the Ohrid Region
- Mr. Ilber Myrta, Head of Sector in the Environment Protection Office Ministry of Environment and Physical Planning and National Focal Point for Natural Heritage of the Ohrid Region
- Ms. Sandra Andovska, Secretary General of the National Council for the Sustainable Development - Cabinet of the Deputy Prime Minister for Economic Affairs
- Ms. Irena Jakimovska, State Counselor in Cabinet of the Prime Minister
- Ms. Ljuba Siljanovska, State Counselor in the Ministry of Transport and Communications
- Ms. Maja Lazarevska, Assistant Head of Sector in the Ministry of Transport and Communications
- 10:00-11:00 Meeting with the director and representatives from the Public Enterprise for State Roads (discussion related to infrastructure projects, Highway A2 and road section A3)

### Present persons:

- Mr. Aleksandar Stojanov, Director
- Mrs. Sashka Bogdanova, Advisor for Protection of Environment
- 11:30-12:30 Meeting with representatives from the Public Enterprise for Macedonian Railways Infrastructure discussion related to infrastructure project, the railway section of Corridor VIII

### **Present persons:**

Mr. Milan Jankuloski, Deputy Director

- Mr. Ljupcho Arsov, Deputy Head for Investment
- Mr. Gjorgji Pushev, Responsible Planner / Architect

# Consortium members of EPTISA, who prepared the project for railway section of Corridor VIII:

- Maria José Martin
- Daniela Ecker
- Milan Prole
- Mrs. Katerina Simonovska
- Mr. Andrej Matevski
- Mrs. Menka Spirovska
- Mrs. Verica Nikolikj

13:00	Lunch hosted by Mr. Viktor Lilchic Adams, Director of Cultural Heritage Protection Office
14:30	Travel to Ohrid
17:30	Internal expert working meeting
20:00	Dinner hosted by Ministry of Environment and Urban Planning

### Tuesday, 11 April- Ohrid

09:30-10:30 <u>Site Visit - National Park "Galicica"</u>
Meeting with representatives of the National Park "Galicica"

### **Present persons:**

- Mr. Zoran Veljanoski, Director
- Mr. Andon Bojadzi, Responsible Person for the Infrastructure Project "Ski Centre"
- 10:30-12:30 Site visit of the National Park "Galicica" with a representative/guide from the National Park "Galicica"
- 12:30-14:00 Lunch hosted by Ministry of Culture National Commission for UNESCO
- 14:30-16:30 Site Visit of selected points from locations for the implementation of the infrastructural project railway section of Corridor VIII

### **Present persons:**

- Mr. Ljupcho Arsov, Deputy Head for Investment
- Mr. Gjorgji Pushev, Responsible Planner/Architect
- 17:00-18:00 Visit to prominent viewpoints in Ohrid from a boat by which the whole town and its development along the coast, as well as the extent of urban development around the lake, can be seen and understood
- 20:00 Dinner hosted by Ministry of Culture National Commission for UNESCO

### Wednesday, 12 April- Ohrid

09:30-10:30 Meeting with the Director of Institute for Protection of Cultural Monuments and Museum – Ohrid.

### **Present persons:**

- Mrs. Tanja Paskali Buntaseska, Director
- Mr. Milcho Georgievski, Advisor Curator

### 09:30-10:30 Meeting at the Hydrobiological Institute

### **Present persons:**

- Mrs. Elizabeta Veljanovska, PhD, Director
- Mr. Sasho Trajanovski, PhD, Responsible for UNESCO
- 10:30-12:30 Site Visit the Old urban nucleus of the town Ohrid (Ancient Theatre, Plaoshnik, St. Holy Mary Perybleptos, Gallery of Icons, St. Sofia and objects where conservation activities are undertaken)
- 13:00-13:30 Meeting in the Municipality of Ohrid

### **Present persons:**

- Mr. Nikola Bakracheski, PhD, Major of Ohrid
- Mr. Zoran Raftoski, Head of Fund for Communal Development
- Mr. Gjoko Apostolov, Head of Sector for Local Economic Development
- Mr. Branko Arnaudovski, Assistant Head of Sector for urbanism and construction land management
- Mrs. Liljana Jonoska, Counsellor in the Sector for urbanism and construction land management
- 13:30:14:30 Lunch hosted by Mr. Nikola Bakracheski, Major of Ohrid
- 14:30-17:00 Site Visit of selected points from locations for the implementation of the infrastructural project Highway A2 and road section A3
- 18:00 Meeting with the Non-governmental organizations Venue: House of Urania

### **Present persons:**

- Mr. Aleksandar Jovanoski, E.D.E.N. Tourism cluster
- Mrs. Dragana Velkovska, E.D.E.N. "Ohrid SOS"
- Mr. Nikola Kiselinov, T.A.O. Biljana
- Mr. Boris Stojanoski, "Grashnica" Ohrid
- Mr. Boris Djajkoski, "Grashnica" Ohrid
- Mr. Berat Sela, "Natura" Struga
- Mr. Lazo Naumoski, Independent Ecologist Ohrid
- Mrs. Aleksandra Bujaroska, "FRONT 21/42"
- Mrs. Ana Cholovikj Lesoska, Center for environmental research and information "EKO-Sense"
- Mr. Trajche Taevski, "Ohrid SOS"
- Mr. Goran Patchev, Macedonian National Committee of ICOMOS

# 20:00 Dinner hosted by Mrs. Tanja Paskali Buntaseska, Director of Institute for Protection of Cultural Monuments and Museum - Ohrid

### Thursday, 13 April— Ohrid - Skopje

7:00 Travel to Skopje

9:30-10:30 Working session on SEA and HIA with the representatives of the responsible ministries – members of the Working group Venue: Ministry of Culture

### Present persons - members of the Working group

- Mrs. Lidja Topuzovska, Secretary General of Macedonian National Commission for UNESCO
- Mr. Zoran Pavlov, Head of Sector in the Cultural Heritage Protection Office Ministry of Culture and National Focal Point for Cultural Heritage of the Ohrid Region
- Mr. Ilber Myrta, Head of Sector in the Environment Protection Office Ministry of Environment and Physical Planning and National Focal Point for Natural Heritage of the Ohrid Region
- Mr. Marjan Galevski, State Counselor Cabinet of the Prime Minister of the Republic of Macedonia
- Ms. Sandra Andovska, Secretary General of the National Council for the Sustainable Development - Cabinet of the Deputy Prime Minister for Economic Affairs
- Ms. Irena Jakimovska, State Counselor in Cabinet of the Prime Minister
- Ms. Ljuba Siljanovska, State Counselor in the Ministry of Transport and Communications
- Ms. Maja Lazarevska, Assistant Head of Sector in the Ministry of Transport and Communications
- Mr. Sasho Apostolov, Head of Sector for Urban Planning in the Ministry of Transport and Communications
- 10:30 11:00 Meeting with Ms. Elizabeta Kancheska Milevska, Minister of Culture and President of National Commission for UNESCO, Mr. Viktor Lilchic Adams, Director of Cultural Heritage Protection Office and Ms. Lidija Topuzovska, Secretary General of the National Commission
- 11:15 11:45 Meeting with Mr. Bozidar Petroski, State Secretary in the Ministry of Transport and Communications

### Present persons

- Mr. Toni Temkov, Cabinet of the Minister of Transport and Communications
- Ms. Ljuba Siljanovska, State Counselor in the Ministry of Transport and Communications
- Mrs. Lidja Topuzovska, Secretary General of Macedonian National Commission for UNESCO
- Mr. Zoran Pavlov, Head of Sector in the Cultural Heritage Protection Office Ministry of Culture and National Focal Point for Cultural Heritage of the Ohrid Region
- Ms. Sandra Andovska, Secretary General of the National Council for the Sustainable Development - Cabinet of the Deputy Prime Minister for Economic Affairs
- Ms. Irena Jakimovska, State Counselor in Cabinet of the Prime Minister
- 12:00-12:30 Meeting with Mr.Bashkim Ameti, Minister of Environment and Urban Planning

### **Present persons**

- Mr. Zoran Pavlov, Head of Sector in the Cultural Heritage Protection Office Ministry of Culture and National Focal Point for Cultural Heritage of the Ohrid Region
- Mr. Ilber Myrta, Head of Sector in the Environment Protection Office Ministry of Environment and Physical Planning and National Focal Point for Natural Heritage of the Ohrid Region

## 13:00 Lunch hosted by National Commission for UNESCO

## Friday, 14 April- Skopje

End of mission and departure of UNESCO/ICOMOS/IUCN representatives

### 6.3 ANNEX 3: COMPOSITION OF THE MISSION TEAM

# UNESCO/ICOMOS/IUCN Reactive Monitoring Mission for the World Heritage property "Natural and Cultural Heritage of the Ohrid region",

### 9 - 14 April 2017, the former Yugoslav Republic of Macedonia

### **Composition of mission team:**

### **UNESCO** representatives:

Mrs Anna Sidorenko
Programme Specialist
Europe and North America Unit
UNESCO World Heritage Centre
7, place de Fontenoy
F – 75352 Paris 07 SP
a.sidorenko@unesco.org

Mrs Alexandra Fiebig
Project Officer
Europe and North America Unit
UNESCO World Heritage Centre
7, place de Fontenoy
F – 75352 Paris 07 SP
a.fiebig@unesco.org

### **IUCN** representative:

Mrs Maja Vasilijevic

Co-Chair, Transboundary Conservation Specialist Group IUCN World Commission on Protected Areas maja.vasilijevic1@gmail.com

### **ICOMOS** expert:

Mr Pierre-Marie Tricaud

Agricultural Engineer, Landscape Architect, Doctor of Urban Planning

Institut d'Aménagement et d'Urbanisme de la Région d'Île-de-France

Department of Urban Planning, Development, Territories / Heritage-Landscape Mission 15, rue Falguière, 75015 Paris pierre-marie.tricaud@iau-idf.fr

# 6.4 ANNEX 4: LIST OF RECEIVED AND CONSULTED DOCUMENTS AND PUBLICATIONS

2017 State Party State of Conservation Report on World Heritage property "The Natural and Cultural Heritage of the Ohrid Region"

2017, Natural and Cultural Heritage of the Ohrid Region Management Plan 2016-2025 (English translation). Skopje-Ohrid.

Agency for Spacial Planning (2010). *Overall Plan of Ohrid-Presspany Region 2005 – 2020* (in Macedonian only).

Citrus (2015). Draft Amendments to the Management Plan for National Park Galichica for the Period 2011-2020. Strategic Environmental Assessment (SEA). Reference: J337.

Civil Engineering Institute Macedonia (No date). *Nontechnical Summery, Trebenishte –Struga Motorway, Macedonia*.

Civil Engineering Institute Macedonia (No date). *Technical description of the Project "Highway A2, Trebenishta-Struga section"*.

Civil Engineering Institute Macedonia (2015). *Infrastructure Project for Construction of Highway A2, Section Trebeniste-Struga (Environmental Impact Assessment Study from the highway construction A2, Trebenishta-Struga section).* 

Civil Engineering Institute Macedonia (2015). Report from the Traffic Noise and PM10 Measurement in the Environment on the Projected Road Section Trebeniste – Struga.

Civil Engineering Institute Macedonia (2016). *Elaborate for environmental protection from developing a project: Arrangement Lagadin Beach* – *Ohrid*.Veljanoska Sarafiloska, E. (2017), *Hydrobiological Institute*. (*Information on the decrease of the water level in Lake Ohrid*).

GIZ (2015). Initial Characterisation of Lakes Prespa, Ohrid and Shodra/Skadar. Implementing the EU Water Framework Directive in South-Eastern Europe. Deutsche Gesellschaft für Internationale Zusammenarbeit: Tirana. <a href="https://www.giz.de/en/downloads/giz2016-en-initial-characterization-prespa-ohrid-shkodra-skadar.pdf">https://www.giz.de/en/downloads/giz2016-en-initial-characterization-prespa-ohrid-shkodra-skadar.pdf</a>.

Institute for Research in Environment, Civil Engineering and Energy-Skopje (2016). Construction of Motorway A2, section Trebenishta – Struga, Heritage Impact Assessment Report.

Institute Museum - Ohrid (2017). Complex Tabana - Study of Existing Situation.

Institute Museum – Ohrid (2017). Synthesis Plan, Study of Existing Situation, Regime of protection.

Jordanova, M., Rebok, K., Rocha, E. (2016). "Liver Pathology of Female Ohrid Trout (*Salmo letnica Kar.*) from the Eastern Coast of Lake Ohrid: Baseline Data Suggesting the Presence of a Pollution Gradient". *Turkish Journal of Fisheries and Aquatic Sciences* 16 (2): 241-250. DOI: 10.4194/1303-2712-v16\_2\_03.

Ministry of Environment and Physical Planning (2014). *Fifth National Report to the Convention on Biological Diversity of the Republic of Macedonia*. <a href="https://www.cbd.int/doc/world/mk/mk-nr-05-en.pdf">https://www.cbd.int/doc/world/mk/mk-nr-05-en.pdf</a>>.

Municipality of Ohrid (2016). Strategy for tourism development in the Municipality of Ohrid final draft. Ohrid.

Nacionalen Park Galičica (2010). *Draft National Park Galicica Management Plan for the Period* 2011-2020. Ohrid.

Ohrid SOS (2017). WORLD HERITAGE ON THE EDGE, A Report on the Natural and Cultural Heritage of the Ohrid Region.

Opština Ohrid (2016). Strategija za razvoj na turizmot vo Opština Ohrid. Finalen nacrt.

Paskali Buntaseska, T. (2017). *National Institution for the Protection of Monuments of Culture and Museum – Ohrid.* 

Petrovska, S., Celeski, A., Pop-Kostova, N., and Patcev, G. (2016). *Plan for Integrated Protection of Old City Core of Ohrid* (in English). Ohrid.

Public Enterprise for Railway Infrastructure "Macedonian Railways" (2010). *Environmental Impact Assessment Study of the Project Construction of Railway Line Kicevo-Lin (Border with the Republic of Albania)*. Skopje.

Republic of Macedonia, Public Enterprise for Physical and Urban Plans (2006). *General Urban Plan for Ohrid 2002-2012* (in Macedonian only).

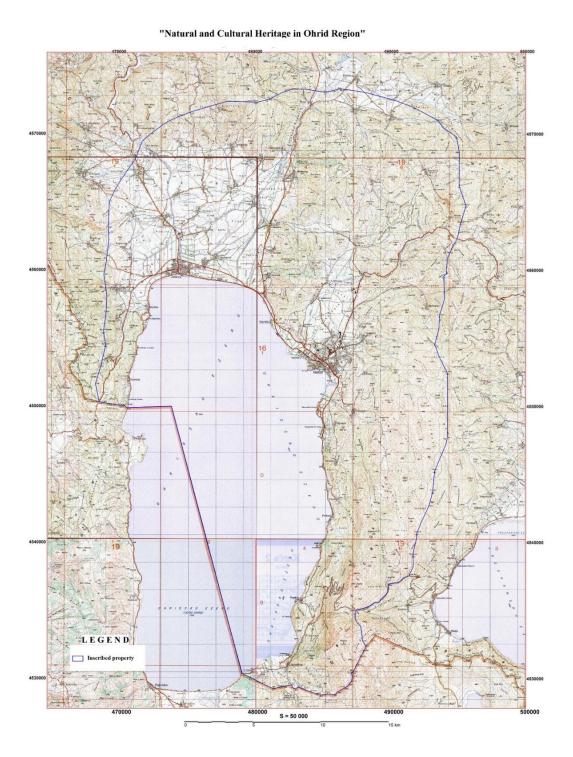
Table of 30 monuments;

Table of 244 archaeological sites;

Map of inscribed property and list of cultural monuments and archaeological sites.

### 6.5 ANNEX 5: MAPS AND RELEVANT DOCUMENTS ON SITE AND PROJECTS

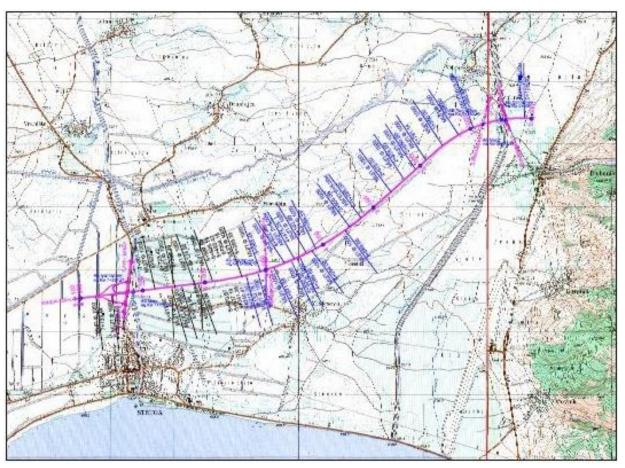
# 6.5.1 MOST RECENT MAP OF THE BOUNDARIES OF THE INSCRIBED PROPERTY PROPERTY



Natural and Cultural Heritage of the Ohrid region - inscribed property (2009) (Available at: <a href="http://whc.unesco.org/en/list/99">http://whc.unesco.org/en/list/99</a>)

## 6.5.2 EUROPEAN CORRIDOR VIII: RAILWAY AND HIGHWAY A2

## 6.5.2.1 Alignment of highway A2 north of Struga



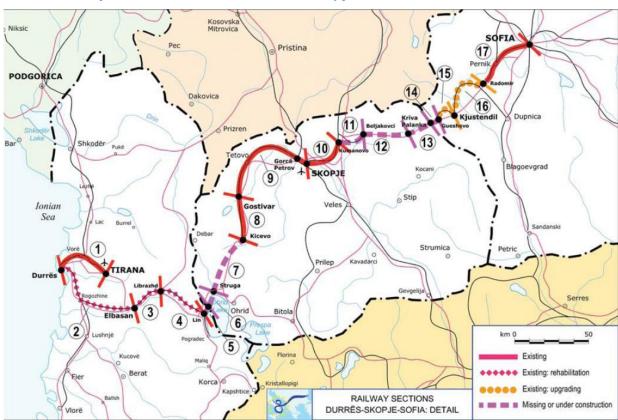
(source: Civil Engineering Institute "Makedonija" JSC, Environmental Impact Assessment Study from the highway construction A2, Trebenishta-Struga section)

### 6.5.2.2 Overall view of European Corridor VIII and its road network



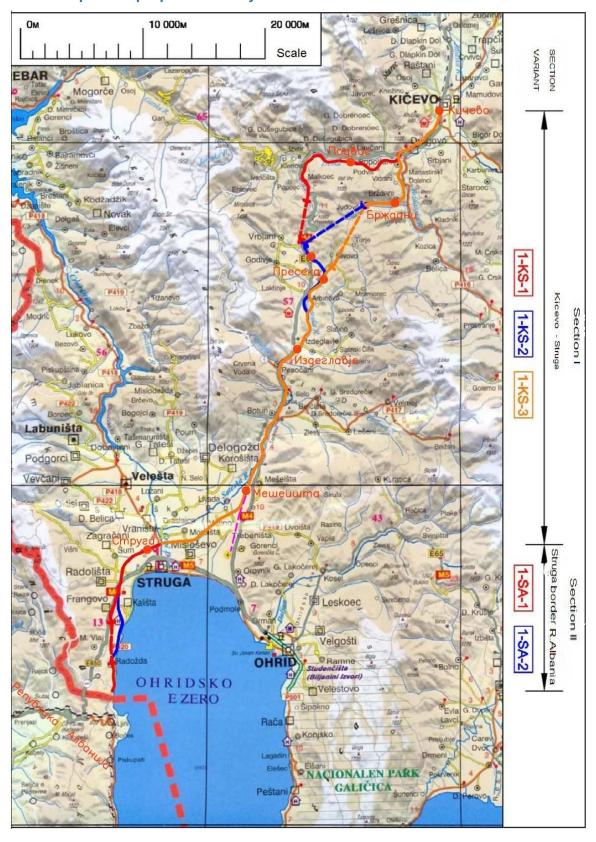
(source: Civil Engineering Institute "Makedonija" JSC, Environmental Impact Assessment Study from the highway construction A2, Trebenishta-Struga section, p. 16)

### 6.5.2.3 Railway Corridor VIII, section Duras-Skopje-Sofia



(source: Secretariat of Corridor VIII, quoted in *Environmental Impact Assessment Study Of The Project Construction Of Railway Line Kicevo-Lin (Border With The Republic Of Albania)*, Public Enterprise for Railway Infrastructure "Macedonian Railways", p. 49)

### 6.5.2.4 Map of the proposed railway route between Kičevo and the Albanian border

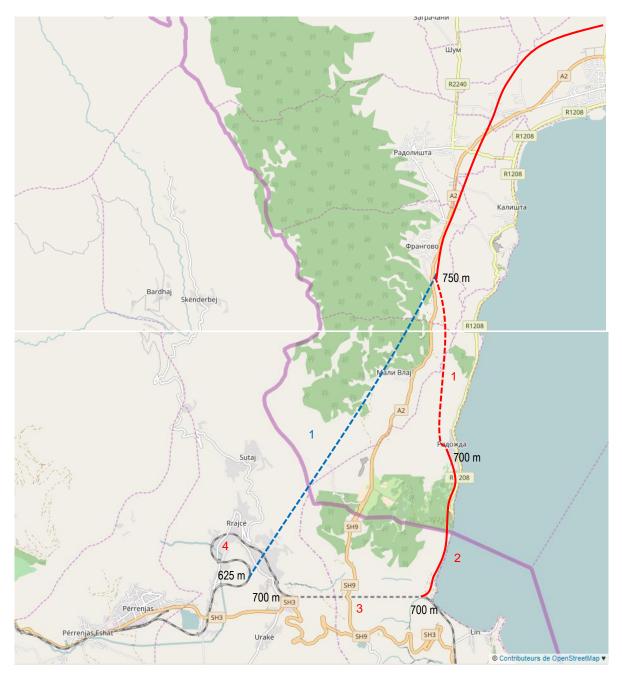


(source: Environmental Impact Assessment Study Of The Project Construction Of Railway Line Kicevo-Lin (Border With The Republic Of Albania), Public Enterprise for Railway Infrastructure "Macedonian Railways", p. 67)

Section 1: In orange, chosen alternative. In red and blue, rejected alternatives.

Section 2. In red, chosen alternative; In blue, rejected alternative.

# **6.5.2.5** Map of the proposed railway route and possible alternative to the Albanian border



700 m: elevation

(source: Background: Open Street Map; Proposed railway route: Macedonian Railways)

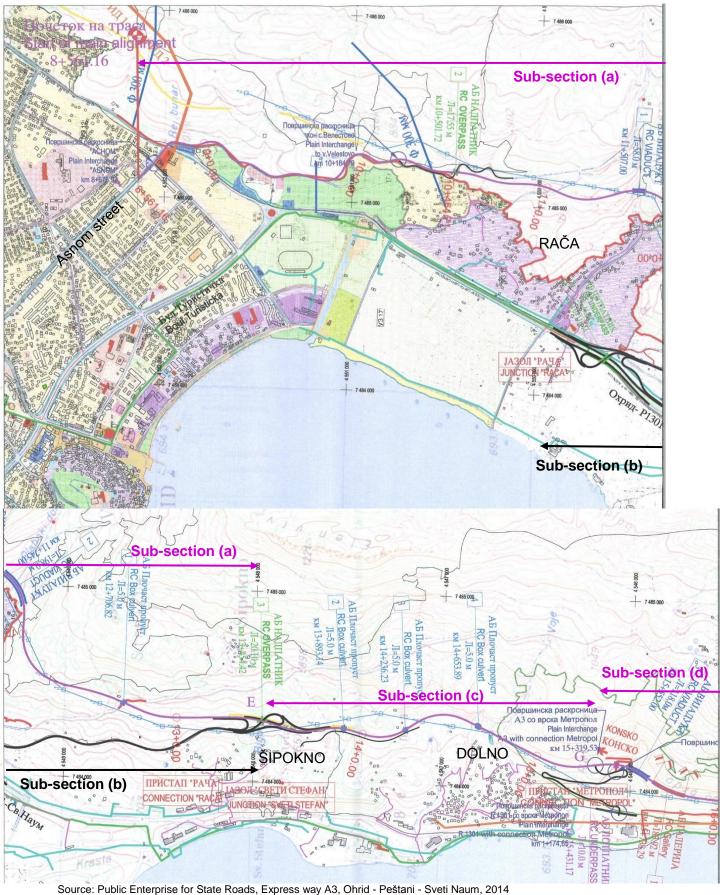
Proposed railway route (red line - Public Enterprise for Railway Infrastructure "Macedonian Railways")

- 1. --- New tunnel, 3 km
- 2. ---- New embankment along the lake coast
- 3. --- Old tunnel, rehabilitated (with possible need to increase its height for catenary lines)
- 4. ---- Series of existing turns, in order to make up for the level difference

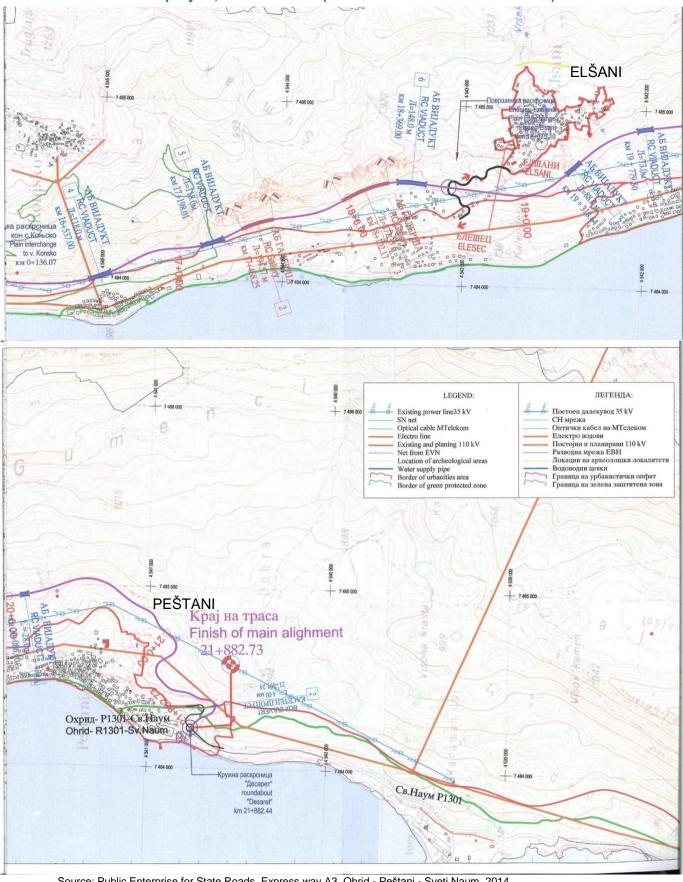
One of the alternatives to be examined in the comparative study (blue line --- suggested by the ICOMOS expert)

1. --- New tunnel, 7,5 km, level difference 125 m (i. e. 1.7% slope)

6.5.3 A3 ROAD
6.5.3.1 A3 road project, sub-sections a (Asnom-Šipokno), b (Raca-Šipokno) and c (Šipokno-Dolno). 1: 20 000

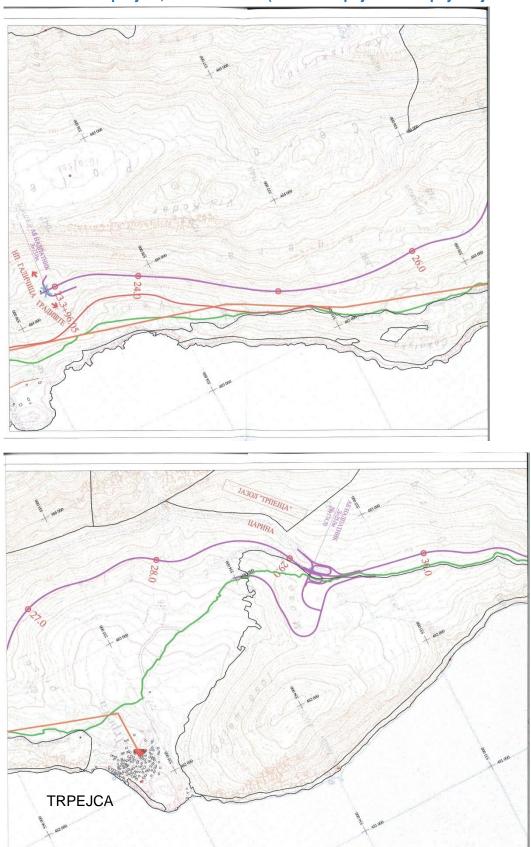


6.5.3.2 A3 road project, sub-section d (Dolno-Elšani and Elšani-Peštani). 1: 20 000

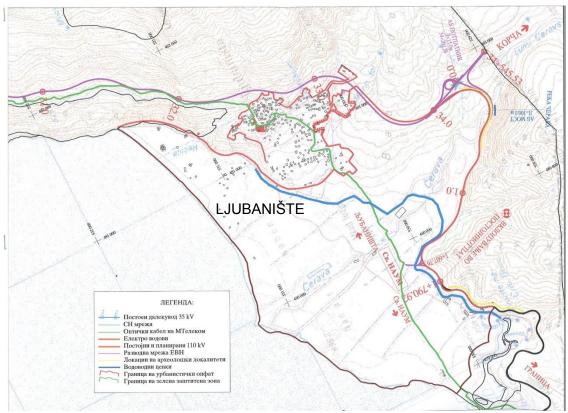


Source: Public Enterprise for State Roads, Express way A3, Ohrid - Peštani - Sveti Naum, 2014

6.5.3.3 A3 road project, sub-section e (Peštani-Trpejca and Trpejca-Ljubanište). 1: 20 000



Source: Public Enterprise for State Roads, Express way A3, Ohrid - Peštani - Sveti Naum, 2014

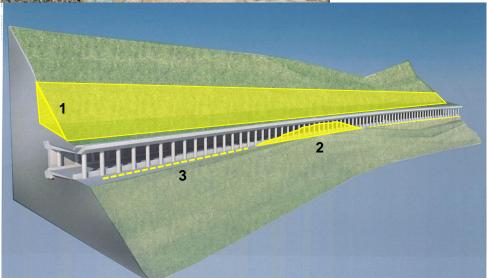




A3 road project, sub-section e (Ljubanište-Sveti-Naum). 1: 20 000 Source: Public Enterprise for State Roads, Express way A3, Ohrid - Peštani - Sveti Naum, 2014

Model of box culvert (5-m wide, 2-m high) used for under-passages (source: http://www.rocla.com.au/Box-Culverts.php)

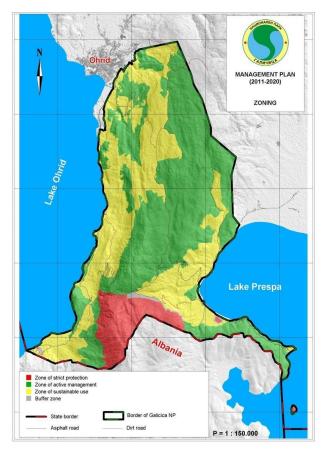
3-D computer design of semi-open galleries Source: Public Enterprise for State Roads, Express way A3, Ohrid - Peštani - Sveti Naum, 2014

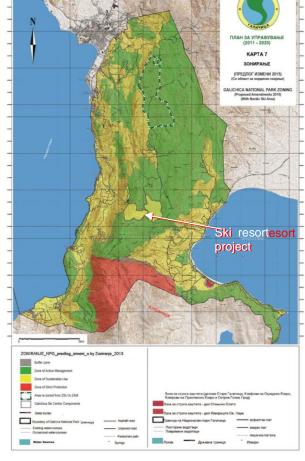


In yellow, Recommendations for a better integration of the semiopen galleries:

- **1.** Restoring natural terrain profile over the gallery
- 2. Where possible, elevating the soil in front of sections of the gallery
- **3.** Planting climbing vegetation on the pillars

# 6.5.4 AMENDMENTS TO THE MANAGEMENT PLAN OF GALIČICA NATIONAL PARK





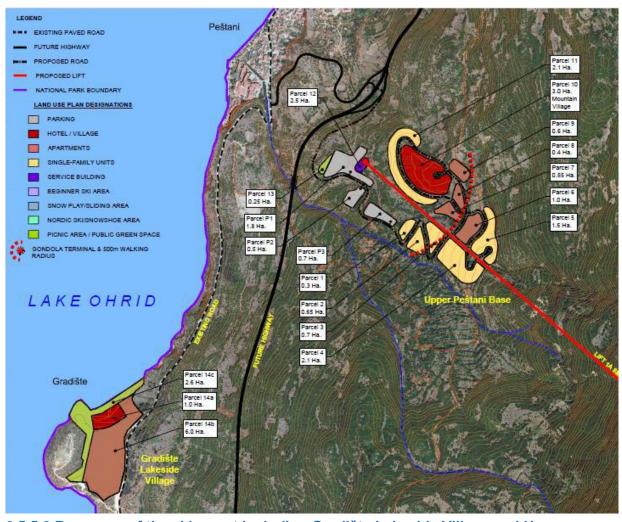
Above: Original National Park Galičica zoning (as in Galičica National Park Management Plan 2011-2020). Right: Proposed Amended zoning 2015 (source: Citrus, 2015, pp. 14 and 17)

## 6.5.5 GALIČICA SKI RESORT

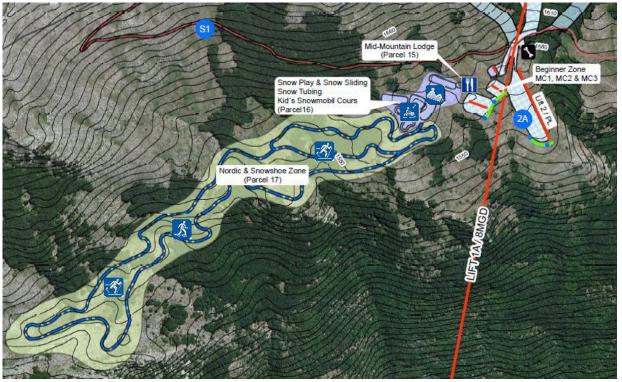
### 6.5.5.1 Ski resort complex in Galičica National Park



(source: Citrus, 2015, p. 48)

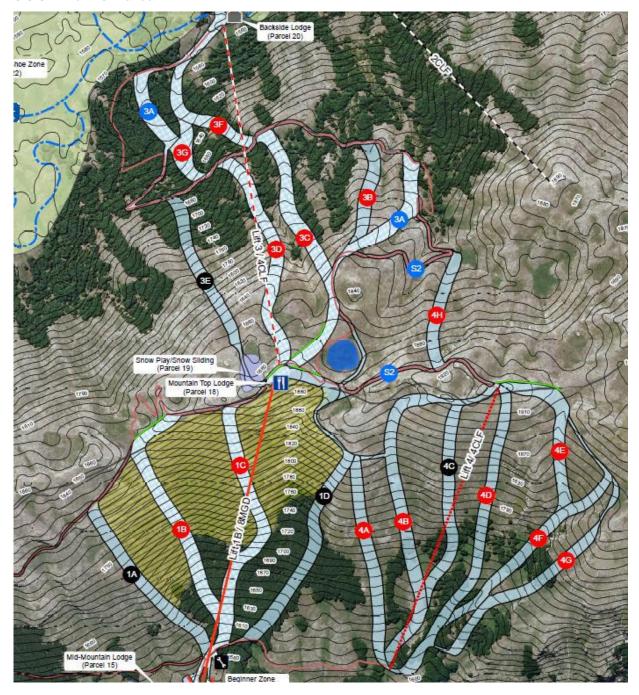


6.5.5.2 Base area of the ski resort including Gradište Lakeside Village and Upper Peštani Base (source: Citrus, 2015, p. 49)



6.5.5.3 Mid-mountain zone (source: Citrus, 2015, p. 50)

## 6.5.5.4 Main ski area



(source: Citrus, 2015, p. 52)

#### 6.6 ANNEX 6: SECOND CYCLE PERIODIC REPORT FACTORS SUMMARY

#### **Second Cycle Periodic Report**

Every six years, the States Parties are invited to submit a periodic report to the World Heritage Committee providing an assessment of the application of the *World Heritage Convention*, including the state of conservation of the World Heritage properties located on its territories.

The former Yugoslav Republic of Macedonia participated in the Second Cycle of Periodic Reporting for Europe and North America, which was launched at the 36th session of the World Heritage Committee (St. Petersburg, 2012). The results of the Second Cycle of Periodic Reporting exercise in Europe were presented to the World Heritage Committee at its 39th session in 2015.

The State Party clearly identified important threats to the property Natural and Cultural Heritage of the Ohrid region in the Periodic Report (Periodic Report \_ Section II- Natural and Cultural Heritage of the Ohrid region http://whc.unesco.org/archive/periodicreporting/EUR/cycle02/section2/groupb/99.pdf).

The summaries of *Factors affecting the Property* and *Management Needs* outlined by State Party in the Periodic Report (found in the tables below) shows the great number of current negative factors and threats to the property and its needs for management and protection.

#### **Summary - Factors affecting the Property**

		World Heritage criteria and attributes affected	Actions	Monitoring	Timeframe	Lead agency (and others involved)	More info / comment
3.5 Bi	ological resour	ce use/modification					
3.5.3	Land conversion	The urban development as a result of land conversion is affected the landscape, and many endemic species around the lake shore.	Strong cooperation between relevant Ministries for find the solution for better protection of the property and taking into account the economic development of the region.	No monitoring, key indicators for monitoring should be priority task of the Government of the Republic of Macedonia;	continuously	Ministry of Agriculture Ministry of Local Self Government Local self government - Ohrid; Local self government - Struga; Local self government - Debarca; Ministry of Transport and Comunication	it is necessary to have better knowledge about the natural and cultural values of the region
3.8 Sc	ocial/cultural us	es of heritage					
3.8.1	Ritual / spiritual / religious and associative uses	For a long term it could be negative affected on the monuments.	Some of the cultural monument are use as a scene for performance during the Ohrid Summer Festival,	no monitoring	continuously	Ministry of culture Municipality of Ohrid Macedonian Orthodox church	Using the heritage for different activities is positive for better presentation, but there is needs for controlled visits by number of tourists which is negative in relation with protective measures for the heritage.
3.8.2	Society's valuing of heritage	Without proper knowledge for the values of the heritage activities can affect to all the criteria.	Without the knowledge about the values of the heritage there are many development activities - urban, industry	There is needs of strong monitoring;	continuously	Ministry of Culture; Ministry of environment and urban planning; Local self- government - Ohrid; Local selfgovernment - Struga; Local self- government - Debarca; Business Sector; National Agency for Tourism Promotion and Support; Physical Planning Ag	Needs of cooperation between institutions, educations and raising awareness for the heritage on all level (local to national);

3.8.4		Changes in traditional ways of life and knowledge system can affected particularly the criteria I and IV.	Raising the awareness on local level for the values of the heritage	monitoring is needed	continuously	Local self- government	Changes in traditional ways of life affect to changes urban structure of the cities. Needs of organization of seminars, workshops and media campaigns as well as introduction of the natural and cultural heritage on local and national level.
3.8.5	changes in	Changes in local population with changing the traditional ways of life and knowledge system can affected particularly the criteria I and IV.		monitoring is needed	continuously	Ministry of culture; Ministry of environment and Spatial Planning; Ministry of local selfgovernment;	Identity, social cohesion, changes in local population and community can affect the changes in traditional ways of life and affect to changes urban structure of the cities.
3.8.6	Impacts of tourism / visitor / recreation	Tourism industry can affected to all criteria.	Analysis of the influence and the consequences from uncontrolled development of tourism and evaluation of the carrying capacity; Adopting Action Plan for sustainable tourism based on the natural and cultural heritage in the Ohrid region	no monitoring, monitoring is needed.		Ministry of Economy- Tourism Section; Local Self-Government of Ohrid; Local Self- Government of Struga; Local Self- Government of Debarca; National Agency for Tourism Promotion and Support Hotel Association of Macedonia; Association of Travel Agencies	There is need of tourism/visitor management plan for the site. Creating a touristic offer for specific target groups of tourists based on the unique universal values of the natural and cultural heritage of the Ohrid region.

### **Summary - Management Needs**

		Actions	Timeframe	Lead agency (and others involved)	More info / comment
4.1.1	There is a need for a buffer zone	The buffer zone will be defined in the Management plan.	short time	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca;	According to proposals in the Management plan, the revision of the buffer zones and their identification shall be preformed every 6 (six) years.
4.1.2	Inadequacies in the boundaries	The inadequacies in the boundaries is result of huge territory and its impossible to manage all the region. Changing the boundaries can not affect and changes the values of property.	long term	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca;	Changing the boundaries can not affect and changes the values of property.
4.1.4	The boundaries of the World Heritage property are not known by local residents / communities / landowners	Raising awareness on local and national level (stakeholders) for the values of the property, its boundaries and measures for protection of the natural and cultural heritage.	short-term	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca;	Knowledge for the boundaries of the protected area is essential for the better protection, presentation and promotion of the site.

	There is no legal framework for controlling use and activities in the area surrounding the World Heritage property and the buffer zone		continuously	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca;	There is no particular legal framework for controlling use and activities in the area surrounding the World Heritage property and the buffer zone; Activities in the property are defined in the Law on protection of cultural heritage,			
4.3 Ma	nagement Sys	tem / Management Plan						
4.3.4		Addoption of the Management plan for the Natural and Cultural heritage of the Ohrid region. Strengthening the supervision and the control of the situation with the natural heritage in Ohrid region		Government of the Republic of Macedonia; Ministry of culture; Ministry of environmental and Spatial planning,	Draft Management plan is prepared and revision and updating will be finalized by the end of 2014 Defining and dividing the power between the local selfgovernment and the authorities regarding the management of the natural			
4.3.6	Few of the work plan activities implemented	Many conservation activities at the Site, such as rehabilitation and sustainable use of historic buildings.	continuously	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca; Ministry of economy; Ministry of finance;	and cultural heritage. The work plan as document does not exist - many activities are done through annual budget program of the Government of the Republic of Macedonia.			
	There is little or no cooperation with industry regarding management	Better cooperation between all relevant institutions regarding management of the site.	short-term	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca;	Cooperation is insufficient and the full harmonization of the legislative from the field of protection of the natural and cultural heritage is needed.			
4.4 Fin		nan Resources						
4.4.3	The budget is inadequate for management needs	To provide more funds for better protection, popularization and managing of the site.	short-time	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca; Ministry of finance;	Finances for the activities will be provided from the budget of the Municipalities of Ohrid, Struga and Debarca and from the Budget of RM. Additionally, the finances can be provided from other financing sources – donations, grants, credits, gifts			
4.4.6	Inadequate equipment and facilities	To ensure adequate equipment and facilities.	short-time	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca; Ministry of finance; Ministry of transport and communication;	Adequate equipment and facilities is important for better treatment of the heritage (natural and cultural) as well as promotion and popularization of the site.			
4.4.15	Capacity development plan not implemented	Capacity building	continuously	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca; Ministry of	Capacity building through organizing seminars, short courses, workshops and international cooperation in the field of protection of the heritage. There is also needs preparing a capacity development plan for a long term period.			
4.5 Sc	4.5 Scientific Studies and Research Projects							
4.5.1	Knowledge about the property is insufficient	Raising awareness	continuously	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca; Ministry of education;	Raising of the awareness of the young people for the World Heritage Site; Introduction of the heritage in the educational system on all level as obligatory.			
4.6 Ec	Education, Information and Awareness Building							
4.6.5	The Outstanding Universal Value of the property is not adequately presented and interpreted	Rising the public awareness for the status and the importance of the world cultural and natural heritage of the Ohrid region trough educational programs and preparation of official promotion publications	continuously	Ministry of culture; Ministry of environmental and Spatial planning, Local self-government - Ohrid/Struga/Debrca; Ministry of education; Ministry of economy - sector tourism;	Raising the public awareness of the local population, visitors and tourists for the importance of the Outstanding Universal Values of the natural and cultural heritage in the Ohrid region as a World Heritage Site.			

4.7 Vi	4.7 Visitor Management							
	the property is not being actively managed	Professionalization and profiling the tourist staff according to the needs of the tourism industry for appropriate promotion of the universal values of the natural and cultural heritage in Ohrid		environmental and Spatial planning, Local self-government	Needs of analysis of the influence and the consequences from uncontrolled development of tourism and evaluation of the carrying capacity			

### 6.7 ANNEX 7: PROPOSED ACTION PLAN WITH MEASURES TO GUIDE THE IMPLEMENTATION OF THE RECOMMENDATIONS MADE BY THIS MISSION

#### Immediate measures (progress report by 1 February 2018)

- Permanently abandon plans for the construction of the Galičica ski centre project, maintain the current internal national park zoning, and consider developing ecotourism options that would not negatively impact the property;
- Permanently abandon plans for the construction of sub-sections (a) and (e) of the A3 road, and suspend the construction of other sub-sections of the A3 road until all appropriate measures are taken to avoid and minimize their potential impacts on the OUV of the property, in line with the specific recommendations made in this report;
- Undertake a thorough assessment in view of defining and establishing a buffer zone for the property, in order to strengthen its protection, which should ideally include Prespa Lake, as an important part of the connected Ohrid-Prespa ecosystem, as well as the remaining part of Galičica National Park;
- Start the Strategic Environmental Assessment (SEA) process for Ohrid Region Management Plan (2016-2025) and use this process for amending parts of the Management Plan for the Ohrid Region;
- Rigorously ensure that cumulative impacts of any infrastructure, urban and/or coastal development projects on the OUV of the property are assessed during the Strategic Environmental Assessment for Ohrid Region Management Plan (2016-2025), and submitted to the World Heritage Centre, for review and comments by the Advisory Bodies before any decisions are made that would be difficult to reverse, in accordance with paragraph 172 of the *Operational Guidelines*, before any irreversible decisions have been made:
- Put in place a moratorium on any coastal and urban transformation within the World Heritage property, prior at least until to the preparation and adoption of all relevant planning documents (Management Plan, OUV-based Urban/Coastal Master Plans etc.) have been prepared and adopted, the approval of effective protective juridical regulations have been approved, and the establishment of effective control mechanisms are established:
- Halt the process of legalisation of all illegal constructions within the property until a detailed inventory of all existing constructions is established and relevant Heritage and Environmental Impact Assessments (HIA and EIA) have been carried out;
- Ensure the strict enforcement of existing laws and regulations to prevent any further illegal construction within the property;
- Clarify the decision-making mechanism and tasks and functions of the Commission for Management of the Natural and Cultural Heritage of the Ohrid Region, and establish genuine participative approaches in the management of the property to ensure adequate involvement of local communities and civil society organizations;

#### **Short-term measures (updated report 1 December 2018)**

- Revise and finalise all relevant planning documents (Management Plan, OUV-based Urban/Coastal Master Plans, OUV-based Tourism strategy, including regulations for tourism activities, movable facilities at the beaches and open-air commercial activity) and submit them to the World Heritage Centre for review by the Advisory Bodies;
- Within the framework of existing legislative, regulatory and administrative provisions, assess cumulative impacts of major infrastructure, urban and coastal development projects during the Strategic Environmental Assessment for Ohrid Region Management Plan (2016-2025);
- Develop and submit to the World Heritage Centre for review by the Advisory Bodies, first, a comprehensive comparative study of alternative routes for the European Corridor VIII railway including those that do not pass in close vicinity of the lakeshore, and in particular avoiding one of the last well-preserved stretches of the lakeshore on the Albanian-Macedonian border (including the option identified and proposed by ICOMOS, based on the mission visit to the site, and presented in Annex 5, map 6.5.2.5.)

- With regards to the construction of highway A2:
  - Ensure that sufficient passages for people and wildlife are provided that should be wide and high enough to enable smooth crossing by their users, and which should include at least one of the pipe culverts every kilometre with a diameter of two meters,
  - Upgrade the existing road between Struga and the Albanian border, rather than tracing a new highway, in view of the fragility of the environment in that part of the property, and to the closeness of the lake
  - In case of new archaeological findings during the construction works, suspend all construction until the necessary research and inventory work has been carried out:
- Assess the cumulative impacts of the railway and highway A2 on the Outstanding Universal Value (OUV) of the property, and justify the choice of not pairing them, or not changing their alignments in order to bring them closer in the northern part of the property;
- Undertake a detailed inventory of all existing illegal constructions within the property and carry out relevant Heritage and Environmental Impact Assessments (HIA and EIA) to assess their impacts on the OUV of the property,
- Develop and implement appropriate measures to stabilise the water level of Lake Ohrid, including regular monitoring and control of discharge of lake waters into the Crn Drim river by Macedonian power plants company ELEM, and explore options to re-divert the Sateska river back into the Crn Drim river;
- Strengthen transboundary cooperation with the State Party of Albania in the protection and conservation of the property, in particular on monitoring the lake's biodiversity and water quality, exchanging relevant scientific data, and establishing common management actions such as jointly agreed fishing quota; Improve the central wastewater treatment system for all settlements in the Lake Ohrid basin, and enable education and training of relevant staff to build their technical capacitiesProvide to the World Heritage Centre, for review by the Advisory Bodies, detailed information about the chemical composition of wood pylons used for the walking boards in the Bay of Bones Museum, including a national expert opinion about the threat potentially posed by the chemical concentrations used on the pylons to fish spawning in the lake waters below the museum;
- Implement appropriate measures in order to prevent any loss of archaeological remains and deterioration of architectural and urban planning coherence, including by enhancing the surroundings of historical buildings and archaeologic sites by landscaping and public space improvement, with observance of authenticity and integrity, avoiding shapes and materials too conspicuous or estranged to the site and local culture and flora (e.g. palm trees), as well as avoiding large size commercial billboards within the property, replacing them with smaller size posters;
- Reduce motorised traffic in Ohrid old town, with time slots for access and restrictions to parking, referring to examples of good practices from other historic city centres around Europe and globally;

#### Mid-term measures (to be completed by 1 December 2020)

- Adopt all relevant planning documents (Management Plan, OUV-based Urban/Coastal Master Plans, OUV-based Tourism strategy);
- Close and clean up the Bukovo landfill and all illegal waste dumping sites within the property, and establish a functional communal waste collection system;
- Take all necessary measures to control invasive species in Lake Ohrid and ensure the regular implementation of a biodiversity monitoring programme, and enforce legal provisions to ensure the protection of endangered and endemic species;
- Remove all illegal constructions within the property and in particular within the Galičica National Park, which, based on the above-mentioned HIAs and EIAs are considered to represent a threat to the property, including its authenticity and conditions of integrity.

#### 6.8 ANNEX 8: WORLD HERITAGE COMMITTEE DECISIONS

## 6.8.1 WORLD HERITAGE COMMITTEE DECISION 40 COM 7B.68 (ISTANBUL/UNESCO, 2016)

Decision Adopted: 40 COM 7B.68

The World Heritage Committee,

- 1. Having examined Document WHC/16/40.COM/7B,
- 2. Recalling Decision 38 COM 7B.58, adopted at its 38th session (Doha, 2014),
- 3. <u>Welcomes</u> the actions undertaken by the State Party concerning the revision of the project for the Instauration of St. Clement's University at Plaoshnik to reduce its negative impacts on the property;
- 4. Notes with concern that a number of large-scale infrastructure projects have been proposed within the property and that the conclusions of the impact assessments of the proposed Galičica Ski Centre, the A3 road, the Railway corridor VIII and Highway A2 demonstrate that these projects would be likely to cause significant potential impacts on the Outstanding Universal Value (OUV) of the property, and considers that these projects appear to represent a potential danger to the property, in line with paragraphs 179 and 180 of the Operational Guidelines;
- 5. Requests the State Party, as a matter of urgency, to prepare an overall Strategic Environmental Assessment (SEA) and Heritage Impact Assessment (HIA) that assess comprehensively the potential cumulative impacts of all proposed infrastructure plans and other major projects on the property's OUV, with a view to identifying alternative routes and locations for these major projects that do not impact on the OUV, and to submit them to the World Heritage Centre, for review by the Advisory Bodies, before any further work is undertaken;
- 6. <u>Also requests</u> the State Party to invite a joint World Heritage Centre/ICOMOS/IUCN Reactive Monitoring mission to the property in 2016 to assess its state of conservation and to provide technical advice to the State Party with regards to the development of the above-mentioned SEA and HIA;
- 7. <u>Also welcomes</u> the participatory approach to the revisions of the Management Plan for the property but <u>strongly encourages</u> the State Party to:
  - a) Finalize the Management Plan for the property, and the Integrated Protection Plan for the Old Town Nucleus of Ohrid, and submit an electronic and three printed copies of the revised Management Plan to the World Heritage Centre, for review by the Advisory Bodies, prior to the above-mentioned Reactive Monitoring Mission,
  - b) Finalize the detailed urban plans for each of the 19 complexes which are part of the monumental ensemble, in line with the existing regulatory framework, to ensure the enforcement of provisions and the control of activities that might impact the OUV of the property,
  - c) Strictly enforce legal and regulatory provisions, and establish, as a matter of urgency, the foreseen Commission to coordinate natural and cultural heritage activities, as a management structure to control development pressures and interventions at the property,
  - d) Develop a comprehensive action plan for the lakeshore to provide adequate guidance on the type and extent of potential developments in relation to the attributes of OUV of the property and its setting;

8. <u>Also encourages</u> the States Parties of Albania and the former Yugoslav Republic of Macedonia, with the support of the World Heritage Centre and the Advisory Bodies, to continue to cooperate in the framework of the Upstream Process towards the preparation of a transboundary extension of the property to possibly include the Albanian part of Lake Ohrid, in order to strengthen the values and integrity of the property;

<u>Further requests</u> the State Party to submit to the World Heritage Centre, by **1 February 2017**, a report on the state of conservation of the property and on the steps taken to implement the above recommendations, for examination by the World Heritage Committee at its 41st session in 2017, with a view to considering, in the case of confirmation of the ascertained or potential danger to OUV, the possible inscription of the property on the List of World Heritage in Danger.

#### 6.8.2 WORLD HERITAGE COMMITTEE DECISION 38 COM 7B.58 (DOHA, 2014)

Decision Adopted: 38 COM 7B.58

The World Heritage Committee,

- 1. Having examined Document WHC-14/38.COM/7B.Add,
- 2. Recalling Decision **22 COM VII.30** and **33 COM 8B.40** adopted at its 22nd (Kyoto, 1998) and 33rd (Seville, 2009) sessions respectively,
- 3. Welcomes the actions undertaken by the State Party in response to the recommendations made by the 2013 Advisory Mission related to the project for the Instauration of St. Clement's University at Plaoshnik and <u>recommends</u> that dialogue between the State Party and the Advisory Bodies continue as the project progresses further;
- 4. <u>Encourages</u> the State Party to implement all recommendations made by the 2013 Advisory Mission for improving the state of conservation of the property with particular attention to the following:
  - a) Finalise the Management Plan for the property and the Integrated Protection Plan for the Old Town Nucleus of Ohrid and submit an electronic and three printed copies of the draft revised management plan for review by the World Heritage Centre and the Advisory Bodies.
  - b) Develop a detailed urban plan for the entire monumental ensemble, in line with the existing regulatory framework, to ensure the enforcement of provisions and to control activities that might impact the entire protected area,
  - c) Strictly enforce legal and regulatory provisions and establish a management structure to control development pressures and interventions at the property,
  - d) Develop a comprehensive action plan for the lakeshore to provide adequate guidance on the type and extent of potential developments in relation to the attributes of Outstanding Universal Value (OUV) of the property and its setting;
- 5. Expresses its concern over several planned major infrastructure projects within the property, including the Ljubanishta 1 and 2 coastal developments, the Ohrid-Peshtani road, and the Galičica Ski Centre and Resort, and requests that technical details, including Environmental and Heritage Impact Assessments (EIAs/HIAs), for projects under consideration within the property be submitted to the World Heritage Centre for review prior to making any decisions that would be difficult to reverse, in accordance with Paragraph 172 of the Operational Guidelines;
- Considers that the planned construction of the Galicica Ski Centre and Resort is likely to have significant direct and indirect impacts on the OUV of the property, and <u>requests</u> the State Party to halt the project until the abovementioned impact assessment has been completed and reviewed;
- 7. <u>Also requests</u> that selected project proposals for the implementation of the Pan European Railway Corridor VIII be submitted to the World Heritage Centre upon completion for review by the Advisory Bodies and <u>urges</u> the State Party to identify alternative routes that do not cross the property;
- 8. <u>Also encourages</u> the States Parties of Albania and the former Yugoslav Republic of Macedonia, with the support of the World Heritage Centre and Advisory Bodies, to continue to cooperate in the framework of the Upstream process towards the preparation of a new nomination for a transboundary extension of the property to include the Albanian part of Lake Ohrid and its watershed, in order to strengthen the values and integrity of the property;

<u>Further requests</u> the State Party to submit to the World Heritage Centre, by **1 February 2015**, a report, including a 1-page executive summary, on urgent progress required to address the issues mentioned above, and by **1 December 2015**, an updated report, including a 1-page executive summary, on the state of conservation of the property and the implementation of the above, for examination by the World Heritage Committee at its 40th session in 2016.

#### 6.9 ANNEX 9: STATE OF CONSERVATION

## 6.9.1 STATE OF CONSERVATION, NATURAL AND CULTURAL HERITAGE OF THE OHRID REGION (THE FORMER YUGOSLAV REPUBLIC OF MACEDONIA), 40 COM (ISTANBUL/UNESCO, 2016)

Natural and Cultural Heritage of the Ohrid region (the Former Yugoslav Republic of Macedonia) (C/N 99ter)

Year of inscription on the World Heritage List 1979

Criteria (i)(iii)(iv)(vii)

Year(s) of inscription on the List of World Heritage in Danger N/A

Previous Committee Decisions see page http://whc.unesco.org/en/list/99/documents/

#### International Assistance

Requests approved: 0 (from 1986-2011)
Total amount approved: USD 20,000

For details, see page <a href="http://whc.unesco.org/en/list/99/assistance/">http://whc.unesco.org/en/list/99/assistance/</a>

#### UNESCO Extra-budgetary Funds

Total amount granted: USD 20 000 (UNESCO Regional Bureau for Science and Culture in Europe, Venice)

#### Previous monitoring missions

September 1998: joint World Heritage Centre/ICOMOS/IUCN mission. December 2013: ICOMOS/UNESCO Advisory mission

#### Factors affecting the property identified in previous reports

- Management and planning
- Economic and demographic developments
- Buildings and development
- Ground transport infrastructure
- Major visitor accommodation and associated infrastructure
- Impacts of tourism / visitor / recreation

Illustrative material see page http://whc.unesco.org/en/list/99/

#### Conservation issues presented to the World Heritage Committee in 2016

On 3 December 2015, the State Party submitted a state of conservation report, which is available at <a href="http://whc.unesco.org/en/list/99/documents">http://whc.unesco.org/en/list/99/documents</a>, as well as additional documentation on 28 February 2016 following a request of the World Heritage Centre dated 28 January 2016. Progress in addressing a number of requests made by the Committee at its 38th session (Doha, 2014) is presented as follows:

- The design for the "Instauration of St. Clement's University at Plaoshnik" was revised taking into account recommendations of the 2013 UNESCO/ICOMOS Advisory mission, with regards to the size, elevation, scale and scope of planned constructions;
- The draft Management Plan for the property was finalized with support of the UNESCO Regional Bureau for Science and Culture in Europe, Venice, and is currently in consultation process by relevant authorities;

- The preparation of a detailed urban plan for the entire monumental ensemble in Ohrid was abandoned in favour of 19 urban plans, one for each of the complexes, which are expected by September 2017;
- The establishment of a Commission with an advisory and coordinating role for natural and cultural heritage to control development pressures and interventions at the property is pending the adoption of the Management Plan;
- A Comprehensive Action Plan for the lakeshore is planned in the future;
- The coastal development plans at Ljubanishte 1 and 2 by the investor "Sahara India, Pariwar" were cancelled:
- The 2015 Strategic Environmental Assessment (SEA) for amendments to the Management Plan of the Galičica National Park submitted by the State Party provides information on the potential significant negative impacts on the Outstanding Universal Value (OUV) of the property from the proposed change of zoning of the Galičica National Park, aimed at accommodating the proposed Galičica Ski Centre and Resort and the planned construction of the Express Road A3 (Ohrid-Peshtani);
- Lin (Albania)-Struga-Kicevo section of the Railway Corridor VIII: an Environmental Impact
  Assessment (EIA), prepared in June 2010, provides information on a number of potential
  negative environmental impacts. The EIA of the Highway A2 (Trebenishte-Struga) project
  notes negative impacts on the environment, cultural heritage and landscape and proposes
  mitigation measures to minimize impact. The Heritage Impact Assessment (HIA) notes no
  significant impact of the highway on the OUV of the property;
- Port construction in the town of Ohrid: a feasibility study and public consultation were undertaken;
- The State Party continues to cooperate in the framework of the Upstream Process towards the extension of the property to the Albanian side of the lake.

#### Analysis and Conclusions of the World Heritage Centre and the Advisory Bodies

The State Party has taken significant measures to respond to the recommendations of the 2013 Advisory mission and the requests by the Committee, in particular by reviewing the project St. Clements University at Plaoshnik and progressing in finalizing the Management Plan for the property. The decision to cancel the coastal developments at Ljubanishte by the investor is also noted.

However, large-scale projects continue to be proposed within the property. The SEA of the Draft Amendments to the Management Plan for Galičica National Park (2011-2020) notes that changes to the park's zoning were proposed by the Government to accommodate development projects, including the Galičica Ski Centre, associated ski lift base and the Gradiste Lakeside Village, which would conflict with the World Heritage status of the property. The SEA also notes cumulative impacts of the combination of the Ski Centre and the A3 road, which would lead to increased human activity and additional pressures on the property. It is recommended that the Committee urge the State Party not to approve the proposed amendments and to consider alternative locations for ski developments outside of the boundaries of the property and the Galičica National Park.

The EIA of the Pan European Railway Corridor VIII notes that incidents of substance run-offs during construction and operation phases would result in pollution of Lake Ohrid. This raises particular concern since part of the railway is planned very close to the lake shore in one of the last well preserved stretches. Given the high sensitivity of its aquatic ecosystems and the lake shore's visual integrity of this stretch, alternatives with minimal potential impact on the lake and its shoreline should be preferred and all necessary impact mitigation measures should be adopted during the construction and operation phases.

The EIA and HIA of Highway A2 (Trebenishte-Struga) have been developed for only a 8km-long stretch, which is only a portion of a much wider planned transportation infrastructure upgrading. Therefore they do not provide a comprehensive assessment of the entire stretch of infrastructure which should also consider potential cross-border impacts on the Albanian side of the lake and the possible alternatives for its location.

The conclusions of the above mentioned SEA, and concerns for the A2 Highway and the Railway Corridor VIII indicate that these projects represent a potential danger to the property, in line with paragraphs 179 and 180 of the *Operational Guidelines* and would represent a case for inscription of the property on the List of World Heritage in Danger.

A comprehensive action plan for the lakeshore and a SEA and HIA for all the above-mentioned infrastructure projects should be developed as a matter of urgency, in order to assess their potential cumulative impacts on the OUV of the property and to consider possible alternative routes and locations for these major projects to ensure they do not impact adversely on OUV.

It is recommended that the Committee request the State Party to invite a joint World Heritage Centre/ICOMOS/IUCN Reactive Monitoring mission to the property to assess its state of conservation and to provide technical advice on the development of a SEA and HIA for all proposed infrastructure projects.

It is further recommended that the Committee encourage the State Party to finalize the Management Plan and to establish, as a matter of urgency, the envisaged Commission which would provide a management structure to coordinate actions at different levels. It is also recommended that the Committee reiterate its request for the Integrated Protection Plan for the Old Town Nucleus of Ohrid for which no information was provided by the State Party.

Finally, the continued cooperation of the State Party in the framework of the World Heritage Upstream Process aimed at a possible transboundary extension of the property to the Albanian part of Lake Ohrid should be commended, as effective transboundary management will ensure the long-term conservation and protection of the property and enhance its integrity.

## 6.9.2 STATE OF CONSERVATION, NATURAL AND CULTURAL HERITAGE OF THE OHRID REGION (THE FORMER YUGOSLAV REPUBLIC OF MACEDONIA), 38 COM (DOHA, 2014)

Natural and Cultural Heritage of the Ohrid region (the Former Yugoslav Republic of Macedonia) (C/N 99ter)

Year of inscription on the World Heritage List 1979

Criteria (i)(iii)(iv)(vii)

Year(s) of inscription on the List of World Heritage in Danger N/A

Previous Committee Decisions see page http://whc.unesco.org/en/list/99/documents/

#### International Assistance

Requests approved: 0 (from 1986-2011) Total amount approved: USD 20,000

For details, see page <a href="http://whc.unesco.org/en/list/99/assistance/">http://whc.unesco.org/en/list/99/assistance/</a>

#### UNESCO Extra-budgetary Funds

N/A

#### Previous monitoring missions

September 1998: joint World Heritage Centre/ICOMOS/IUCN mission. December 2013: ICOMOS/UNESCO advisory mission

#### Factors affecting the property identified in previous reports

- Management and planning
- Economic and demographic developments

<u>Illustrative material</u> see page <a href="http://whc.unesco.org/en/list/99/">http://whc.unesco.org/en/list/99/</a>

#### Conservation issues presented to the World Heritage Committee in 2014

In December 2013, the State Party invited an ICOMOS/UNESCO advisory mission to assess the general state of conservation of the property and to evaluate the project for the "Instauration of St. Clement's University in Plaoshnik". On 28 March 2014, the State Party submitted a state of conservation report. Both reports are available at <a href="http://whc.unesco.org/en/list/99/documents">http://whc.unesco.org/en/list/99/documents</a>. The State Party's report underscores the actions implemented in response to the mission recommendations as follows:

- A comprehensive review has been carried out of the construction plans for the "Instauration of St. Clement's University at Plaoshnik" which took into consideration the Outstanding Universal Value (OUV) of the property as well as historical and physical aspects of the location and intangible associations. New project designs have followed the detailed mission recommendations and include changes in scale, heights and architectural finishes. An expert board will closely monitor the implementation of the architectural projects for each component to ensure that no negative impact on the property occurs. As further recommended, archaeological research is being carried out and alternatives are being explored for the relocation of Complex IV.
- Permits have been granted for the coastal development Ljubanishta 1 (investor "Sahara India Pariwar") and for a development at the Struga Municipality. The Ljubanishta 2 tourism development (289.5 ha) is in initial stages of preparation. The State Party reports that Environmental and/or Heritage Impact Assessments (EIAs/HIAs) will be carried out and submitted for review. No further development of new ports or a water aerodrome is foreseen at this time.
- The full project documentation for the Pan European Railway Corridor VIII is expected to be completed by 2017, including EIA and HIAs. On the basis of the assessments, alternative

routes that do not cross the property and nor affect the lake's watershed are being considered.

A regional road A3 from Ohrid to Peshtani is under development and guidance has been
provided by the Ministry of Culture to ensure no impacts on registered cultural or historic
sites occur during construction. No reference is made to an assessment of impacts on
natural aspects of the OUV.

The State Party also reports on conservation interventions carried out at historical houses and archaeological sites. As for planning tools, the Management Plan is under review and an Integrated Protection Plan for the Old Town Nucleus of Ohrid will be prepared; no timeframe has been provided for their finalisation and approval.

#### Analysis and Conclusions of the World Heritage Centre and the Advisory Bodies

The State Party's positive response to the recommendations of the mission and the substantial review that has been made to the St. Clement's University Project should be welcomed. The careful monitoring during the implementation of the architectural projects will ensure that development at the Plaoshnik area does not impact on the OUV of the property. Continued dialogue with the State Party is also important in this respect as the project progresses further. The new specific architectural projects should be submitted for review.

The findings of the mission in regard to uncontrolled interventions and development in past years and their impact on the conditions of authenticity and integrity are well noted. Strict control and operational management arrangements are required so that the attributes are not eroded to an extent that would compromise the OUV of the property. The new laws for the World Heritage property need to be fully enforced and a management structure is required to coordinate actions at the different levels and among institutions with relevant mandates and decision-making authority. This is particularly important in regard to granting permits for development or restoration of historic buildings.

Effective implementation of planning tools and regulatory measures is necessary to adequately control development pressures, densification and interventions that impact on the character of the historic fabric and the setting of the property. The update and review process for regulatory measures must include provisions to conduct Environmental and Heritage Impact Assessments (EIAs/HIAs), in relation to the OUV of the property, to better inform decision-making at the national and local level. Revised regulations should be fully integrated through the process of the review of the Management Plan, the Urban Plans for the ensemble and during the development of the Integrated Protection Plan for the Old Town Nucleus of Ohrid.

In addition to the recently approved development of the Ljubanishta 1 coastal tourism and development zone and the Ohrid-Peshtani regional road, the World Heritage Centre and the Bodies note publicly available information (http://www.mepso.com.mk/enus/Vesti.aspx?itemVID=267) regarding the State Party's intentions to develop a Ski Centre and Resort in Galicica National Park, within the boundaries of the property and have requested further information from the State Party in April 2014. There is some concern about the potential individual and cumulative negative impacts of the planned infrastructure projects on the OUV of the property, and ski developments in the property would be likely to be incompatible with its World Heritage status. The mission's recommendations should be recalled, in particular that a comprehensive action plan for the lakeshore be developed before the projects progress further and that Environmental and Heritage Impact Assessments of these projects be prepared in conformity with IUCN's World Heritage Advice Note on Environmental Assessment, and the ICOMOS Guidelines on Heritage Impact Assessments for World Heritage cultural properties. and submitted along with further technical details of these projects to the World Heritage Centre for review by the Advisory Bodies before any decisions are taken that would be difficult to reverse, in accordance with Paragraph 172 of the Operational Guidelines.

As for the Pan European Railway Corridor VIII, the EIA and HIA will be crucial for the development of the project and strong consideration should be given to alternative routes that do not cross the property.

Finally, it is noted that missions to the property have highlighted the importance of effective cross-border cooperation and it is recommended that efforts towards seeking a transboundary extension with Albania be prioritized to ensure the long-term conservation and protection of the property in the framework of the World Heritage Upstream process.

# 6.9.3 STATE OF CONSERVATION, NATURAL AND CULTURAL HERITAGE OF THE OHRID REGION (THE FORMER YUGOSLAV REPUBLIC OF MACEDONIA), CONF 203 (KYOTO, 1998)

Natural and Cultural Heritage of the Ohrid region (the Former Yugoslav Republic of Macedonia) (C/N 99ter)

Year of inscription on the World Heritage List 1979

Criteria (i)(iii)(iv)(vii)

Year(s) of inscription on the List of World Heritage in Danger N/A

Previous Committee Decisions see page http://whc.unesco.org/en/list/99/documents/

International Assistance

Requests approved: 0 (from 1986-1986) Total amount approved: USD 20,000

For details, see page <a href="http://whc.unesco.org/en/list/99/assistance/">http://whc.unesco.org/en/list/99/assistance/</a>

UNESCO Extra-budgetary Funds

N/A

Previous monitoring missions

September 1998: joint World Heritage Centre / ICOMOS /IUCN mission

Factors affecting the property identified in previous reports

<u>Illustrative material</u> see page <a href="http://whc.unesco.org/en/list/99/">http://whc.unesco.org/en/list/99/</a>

Information presented to the Bureau of the World Heritage Committee in 1998

A joint UNESCO-ICOMOS-IUCN monitoring mission was carried out from 6 to 11 September 1998 for the first time since the inscription of the site on the World Heritage List in 1979. The mission included an on-site visit and meetings with representatives of the national authorities in Skopje. A high awareness for the need of specific conservation and protection measures at Ohrid exists in the country. However, the site is large in extension, situated in a densely populated and economically prosperous area and bordering an international lake. Several factors, such as traffic, tourism, rural exodus, are threatening the site. These threats can only be reduced through an integrated approach of protection measures linking the natural and cultural heritage. Special attention should be paid to effective legal and operational instruments for

The report of the mission was not available at the time of preparation of this document. The main conclusions and recommendations will be presented to the Bureau during its session.

**Action Required** 

Decision required:

The Bureau may wish to examine information that will be made available at the time of its session and take appropriate action thereupon.

#### Conservation issues presented to the World Heritage Committee in 1998

A joint UNESCO-ICOMOS-IUCN monitoring mission was carried out in September 1998 for the first time since the inscription of the site on the World Heritage List in 1979.

The mission report draws particular attention to the fact that at the time of inscription of this mixed property on the List, the well preserved old towns of and Struga were set in an almost untouched natural environment on the shores of the Lake. As to cultural heritage, only specifically listed monuments are inscribed on the World Heritage List. These monuments are very well preserved. The natural heritage includes part of the Lake which is territory of the country (and excludes the part on the territory of Albania) and part of the Galicia National Park. Now, the enormous increase in constructions and settlement activities has seriously altered the

original balance in the region: for example, the town of Struga has incorporated ten new sub-communities.

The mission observed that the authorities undertake great efforts for the preservation of the natural and cultural heritage of the site. However, economic and demographic developments pose threats to the values of the site that can only be addressed through an integrated approach and protective measures that link the cultural and the natural heritage preservation.

The mission report includes a set of recommendations calling for a special legal framework for the World Heritage site (integrating culture and nature), the strengthening of the management, the preparation of Spatial Plan for the area and the towns, and the extension of the site to include the whole of the Galicia National Park.

The Bureau took note of the report of the joint UNESCO-IUCN-ICOMOS mission to the mixed World Heritage site of the Ohrid Region with its Cultural and Historical Aspect and its Natural Environment (Macedonia, Former Yugoslav Republic of). It commended the Government of the country for the efforts taken for the preservation of the monuments and environment of the Ohrid Region. It recommended the Government to consider the recommendations of the mission carefully, particularly with regard to integrated planning and legal protection of the natural and cultural heritage. It also requested the authorities to review the definition of the cultural heritage, to define and propose revised boundaries, if appropriate, and to establish adequate buffer zones. It requested the Government to provide a response to the report by 15 April 1999, for consideration by the Bureau at its twenty-third session.

Analysis and Conclusions of the World Heritage Centre and the Advisory Bodies

N/A

### 6.10 ANNEX 10: RETROSPECTIVE STATEMENT OF OUTSTANDING UNIVERSAL VALUE OF NATURAL AND CULTURAL HERITAGE OF THE OHRID REGION

#### **Brief synthesis**

The Lake Ohrid region, a mixed World Heritage property covering 83,350 ha, was inscribed for its natural values in 1979 and for its cultural values a year later. Lake Ohrid is a superlative natural phenomenon, providing refuge for numerous endemic and relict freshwater species of flora and fauna dating from the tertiary period. As a deep and ancient lake of tectonic origin, Lake Ohrid has existed continuously for approximately two to three million years. Its oligotrophic waters conserve over 200 species of plants and animals unique to the lake, including algae, turbellarian flatworms, snails, crustaceans and 17 endemic species of fish including two species of trout, as well as a rich birdlife.

Situated on the shores of Lake Ohrid, the town of Ohrid is one of the oldest human settlements in Europe. Built mostly between the 7th and 19th centuries, Ohrid is home to the oldest Slav monastery (dedicated to St. Pantelejmon) and more than 800 Byzantine-style icons of worldwide fame dating from the 11th century to the end of the 14th century. Ohrid's architecture represents the best preserved and most complete ensemble of ancient urban architecture of this part of Europe. Slav culture spread from Ohrid to other parts of Europe. Seven basilicas have thus far been discovered in archaeological excavations in the old part of Ohrid. These basilicas were built during the 4th, 5th and beginning of the 6th centuries and contain architectural and decorative characteristics that indisputably point to a strong ascent and glory of Lychnidos, the former name of the town. The structure of the city nucleus is also enriched by a large number of archaeological sites, with an emphasis on early Christian basilicas, which are also known for their mosaic floors. Special emphasis regarding Ohrid's old urban architecture must be given to the town's masonry heritage. In particular, Ohrid's traditional local influence can be seen among its well-preserved late-Ottoman urban residential architecture dating from the 18th and 19th centuries. The limited space for construction activities has led to the formation of a very narrow network of streets.

Although the town of Struga is located along the shores of Lake Ohrid, town life is concentrated along the banks of the Crn Drim River, which flows out of the lake. The existence of Struga is connected with several fishermen settlements on wooden piles situated along the lake shore. A great number of archaeological sites testify to origins from the Neolithic period, the Bronze Age, the Macedonian Hellenistic period, the Roman and the early Middle Age period.

The convergence of well-conserved natural values with the quality and diversity of its cultural, material and spiritual heritage makes this region truly unique.

**Criterion (i):** The town of Ohrid is one of the oldest human settlements in Europe. As one of the best preserved complete ensembles encompassing archaeological remains from the Bronze Age up to the Middle Ages, Ohrid boasts exemplary religious architecture dating from the 7th to 19th centuries as well as an urban structure showcasing vernacular architecture from the 18th and 19th centuries. All of them possess real historic, architectural, cultural and artistic values. The concentration of the archaeological remains and urban structures within the old urban centre of Ohrid, along the coast of Lake Ohrid as well as the surrounding area creates an exceptional harmonious ensemble, which is one of the key features that make this region truly unique.

**Criterion (iii):** The property is a testimony of Byzantine arts, displayed by more than 2,500 square metres of frescoes and more than 800 icons of worldwide fame. The churches of St. Sophia (11th century), Holy Mother of God Perivleptos and St. John Kaneo notably display a high level of artistic achievements in their frescoes and theological representations, executed by local as well as foreign artists. Ancient architects erected immense basilicas, which were to serve as models for other basilicas for centuries. The development of ecclesiastical life along the shores of the lake, along with its own religious architecture, frescoes and icons, testifies to the significance of this region as a religious and cultural centre over the centuries.

Criterion (iv): The Lake Ohrid region boasts the most ancient Slavonic monastery and the first Slavonic University in the Balkans – the Ohrid literary school that spread writing, education and culture throughout the old Slavonic world. The old centre of Ohrid is a uniquely preserved, authentic ancient urban entity, adjusted to its coastal lake position and terrain, which is characterised by exceptional sacred and profane architecture. The architectural remains comprising a forum, public buildings, housing and sacred buildings with their infrastructure date back to the ancient town of Lychnidos (the former name of the town). The presence of early Christian architecture with the lofty basilicas from 4th to 6th centuries, together with the Byzantine architecture with a great number of preserved sacred buildings of different types from 9th to 14th centuries, is of paramount importance and contributes to the unity of the urban architecture of the city.

*Criterion (vii)*: The preservation of Lake Ohrid dating from pre-glacial times is a superlative natural phenomenon. As a result of its geographic isolation and uninterrupted biological activity, Lake Ohrid provides a unique refuge for numerous endemic and relict freshwater species of flora and fauna. Its oligotrophic waters contain over 200 endemic species with high levels of endemism for benthic species in particular, including algae, diatoms, turbellarian flatworms, snails, crustaceans and 17 endemic species of fish. The Lake Ohrid region also harbours a rich birdlife.

#### Integrity

Despite a minor modification in 2009, the current boundary of the property still does not fully encompass all of the features that convey the property's Outstanding Universal Value. Most notably in relation to its natural values, the integrity of the property is limited since only two-thirds of Lake Ohrid located in the former Yugoslav Republic of Macedonia as well as a small part of the lake's basin have been inscribed. The integrity of the property could be strengthened by extending it to the remaining one-third of Lake Ohrid located in Albania and including other areas essential to the protection of the lake's watershed, in order to adequately protect the lake's exceptional biodiversity. Main threats to the integrity of the property include uncoordinated urban development, increasing population, inadequate treatment of wastewater and solid waste, and tourism pressure. In addition, pollution from increased traffic influences the quality of the water, which leads to the depletion of natural resources.

The integrity of the property suffered to some extent, as several houses built at the end of 19th century were demolished in order to exhibit the excavated remains of the Roman Theatre. The overall coherence of the property, and particularly the relationship between urban buildings and the landscape, is vulnerable to the lack of adequate control of new development.

#### **Authenticity**

The town of Ohrid is reasonably well preserved, although uncontrolled incremental interventions have impacted the overall form of the monumental urban ensemble as well as the lakeshore and wider landscape. These are also vulnerable to major infrastructure projects and other developments.

Concerning the religious buildings, important conservation and restoration works have been carried out since the 1990s. Conservation works on the monuments in the region have been thoroughly researched and documented, but some have impacted the property's authenticity. The icons and frescoes are in good condition and kept in the churches.

The originally residential function of some buildings has changed over time, as have some of the interior outfitting of residential buildings, which were altered to improve living conditions. While reconstructions often used materials identical to those used at the time of construction, new materials have also been used on occasion, which presents a threat for the authenticity of the property.

#### Protection and management requirements

The Natural and Cultural Heritage of the Ohrid region has several layers of legal protection. The protection of cultural heritage is regulated by the Law on Cultural Heritage Protection (Official Gazette of RM No. 20/04, 115/07), by-laws and a law declaring the old city core of Ohrid as a cultural heritage of particular importance (Official Gazette of RM No. 47/11). The protection of natural heritage is regulated by the Law on Nature Protection (Official Gazette of RM No. 67/2004, 14/2006 and 84/2007), including within and outside of protected areas. There is also the Law on Managing the World Cultural and Natural Heritage of the Ohrid Region (Official Gazette of RM No. 75/10). Legal instruments need to be kept updated and implemented to protect the property.

The property is managed and protected through a range of relevant management documents, and an effective overall management plan is a clear long-term requirement. The "Physical Plan of the Republic of Macedonia" of 2004 provides the most successful long-term and integrated document for land management, providing a vision for the purpose, protection, organization and landscape of the country and how to manage it. This plan needs to be maintained and updated regularly, although some deficiencies have been noted in the general implementation of urban planning regulations and plans.

The property is managed by two ministries (the Ministry of Culture and the Ministry of Environment), via three municipalities (Ohrid, Struga and Debrca), although the municipalities legally do not have the authority to protect cultural and natural heritage. The Institute for Protection of Monuments of Culture and Museums in Ohrid has the authority to protect cultural heritage, and the Natural History Museum Dr Nikola Nezlobinski in Struga is responsible for protecting movable heritage. The Galichica National Park is authorized to manage natural heritage within the park as a whole, and part of the cultural heritage located within the territory of the Park. The Institute for Hydrobiology in Ohrid is responsible for the continuous monitoring of the Lake Ohrid ecosystem, the research and care for Lake Ohrid's flora and fauna, as well as the management of the fish hatchery, also to enrich the Lake's fish stocks.

Integrated management of natural and cultural heritage through a joint coordinating body and joint management planning are urgently needed to ensure that the values of the property are conserved. Given the vulnerabilities of the property related to the development and impacts of tourism, the management requirements for the property need strengthening and new cooperation mechanisms and management practices must be put into place. This may include re-evaluating the existing protected areas, and ensuring adequate financial and human resources for management as well as effective management planning and proper law enforcement.

The complexity of Lake Ohrid's shared natural and cultural heritage requires innovative governance models able to deal with a multitude of management objectives in the broader transboundary Lake Ohrid region. Cooperation between the cultural and natural sectors is essential, and the capacities of site management must be strengthened in order to effectively protect both the cultural and natural values of the property. Effective integration and implementation of planning processes at various levels, cross-sectorial cooperation, community participation and transboundary conservation are all preconditions for the successful long-term management of Lake Ohrid.