Professional paper

PROTECTION OF CULTURAL PROPERTY IN CRISIS CONDITIONS IN THE CITY OF ZAGREB

Cerjan, M.[1], Ilijaš, O.[1], Bonc, S.[1]

[1]City of Zagreb, City Office for Local Self-Government,
Transport, Civil Protection and Security, Zagreb

Abstract: *The protection of cultural heritage in crisis conditions requires a systematic analysis of threats, which are divided into natural (earthquake, flood, fire) and anthropogenic (theft, negligence, terrorism, mass unrest). The greatest danger to Zagreb's cultural heritage comes from destructive earthquakes, flash floods, and fires, while terrorist attacks and mass unrest are less frequent but can cause significant damage. The key to the protection process is the categorization of materials according to their value and resistance to threats, as well as the assessment of internal and external risks, including location, storage method, and the security-logistical circumstances of the object. For optimal protection, it is necessary to assess the situation, identify the most valuable heritage, implement preventive measures, and regularly test emergency plans. Risk assessment is carried out using a color matrix, which clearly shows the level of threat and the need for additional protective measures.*

Keywords: *protection of cultural heritage, crisis conditions, risk assessment, prioritization*

1. INTRODUCTION

The protection of cultural heritage in crisis conditions represents one of the most significant challenges of contemporary society, especially in the area of the City of Zagreb, which abounds in valuable movable, immovable, and intangible cultural assets of exceptional artistic, historical, archaeological, and scientific significance. Cultural heritage is not only a testimony of the past, but also the foundation of the identity, continuity, and development of the community. Its preservation in extraordinary circumstances, such as natural disasters or human actions, requires a systematic and interdisciplinary approach (Ministry of Culture and Media of the Republic of Croatia, 2024; UNESCO, 1972).

Crisis situations, defined as abnormal and unusual states during which there is a high probability of degradation, damage, or permanent loss of cultural heritage, can be caused by natural threats (earthquakes, floods, fires) as well as anthropogenic factors (theft, negligence, terrorism, mass unrest). In recent times, institutional risks are increasingly recognized, such as lack of financial resources, inadequate education, and legal inconsistencies, which can further endanger the preservation of heritage (Bilušić Dumbović, 2013; INTERPOL, 2016).

For this reason, the protection of cultural heritage in crisis conditions requires:

- A detailed analysis of threats that may cause a crisis situation in the observed area.
- Categorization of materials according to their value and resistance to specific threats.
- Assessment of internal and external risks, including location, storage method, and the security-logistical circumstances of the object.
- Implementation of preventive measures and regular testing of emergency plans.

The aim of this paper is to present the methodology for risk assessment and prioritization of cultural heritage protection in the City of Zagreb under crisis conditions, with special emphasis on practical examples and recommendations for improving the protection system. Special attention is devoted to the development and application of the risk matrix, which enables clear recognition of the level of threat and the need for additional protective measures, as well as the integration of modern approaches and standards into everyday heritage preservation practice (ICCROM, 2016; Jigyasu & Arora, 2012).

Cultural heritage consists of movable and immovable, as well as intangible cultural assets of artistic, historical, paleontological, archaeological, anthropological, and scientific significance. To optimally approach the protection of cultural heritage in crisis conditions, it is first necessary to assess all threats in the observed area that may cause a crisis situation. We define a crisis situation as an abnormal and unusual state during which there is a high probability that cultural heritage will be degraded, damaged, or permanently lost (Ministry of Culture and Media of the Republic of Croatia, 2024).

2. THREATS TO CULTURAL HERITAGE

Threats that lead to crisis conditions can be divided into natural and anthropogenic, but institutional risks must not be neglected either. Anthropogenic threats are caused by human action, while natural threats result from the forces of nature, which can cause irreparable losses to cultural heritage. Institutional risks manifest through lack of funding (for example, 40 % of museums lack climate-controlled storage, leading to unnecessary exposure of collections to biological threats), insufficient education (incorrect emergency interventions, which can be improved for example through ICCROM workshops and others), and legal inconsistencies (delays in the implementation of EU directives) (Bilušić Dumbović, 2013; ICCROM, 2016).

Negligence and theft, due to well-established standard operating procedures and protective measures within archival institutions, rarely lead to crisis situations, as the intentions of perpetrators are usually detected in time. However, terrorist acts or the destruction of immovable cultural property during mass unrest, especially when law enforcement loses control, are difficult to suppress without deploying additional police or security forces to protect specific sites. A striking example is the destruction of the Arc de Triomphe in Paris during protests that got out of control, resulting in multimillion euro damage (INTERPOL, 2016).

There is also a danger from isolated groups aiming to damage or deface immovable cultural heritage, but in such situations the damage is usually not significant, unless it involves serious terrorist attacks (explosives, etc.), which is highly unlikely in the City of Zagreb. Problems are also evident in urban pressure from unplanned construction, for example, the endangerment of the Solin hillfort sites, pollution causing damage to stone sculptures in the Pula Arena by chemical corrosion, or tourism causing the loss of 1.5 mm of stone annually on the Dubrovnik city walls due to physical erosion.

When it comes to natural threats, the situation is more complex because the level of protection of cultural heritage does not depend as much on the applied technical protection measures as on circumstances, which are most often unfavorable. During a devastating earthquake, the oldest buildings - those with the greatest cultural value - are the most vulnerable and will be the first to be permanently destroyed due to their specific characteristics such as age, material, structural design, maintenance, soil, foundations, dimensions and proportions, and other factors. Protection of buildings from destructive earthquakes can only be achieved through construction work, reconstruction, or seismic strengthening

of existing structures, which is very costly and complex (City Office for Local Self-Government, Transport, Civil Protection and Security, 2021).

3. RISK ASSESSMENT AND CATEGORIZATION OF THREATS

According to the Risk Assessment of Major Accidents for the City of Zagreb, the greatest threats to movable and immovable cultural heritage are identified as follows: a destructive earthquake, flash floods or floods caused by the rupture of the Sava embankment due to high water levels, and fires in buildings that are cultural monuments or in facilities where movable cultural property is stored (City Office for Local Self-Government, Transport, Civil Protection and Security, 2021).

These threats, in terms of response time and preparation for such events, can be classified into the following categories:

- *No time for preparation for the event* (e.g., we do not know when a destructive earthquake will occur; only preventive measures such as strengthening buildings or storing archives/museums in earthquake-resistant structures are possible).
- *There is time for partial/selective rescue/relocation of valuables according to pre-prepared heritage evacuation plans* (e.g., in the event of a fire in a building, action is taken according to a predefined SOP, and the most valuable materials are placed in the optimal location with the lowest risk of loss/damage due to the incident).
- *There is sufficient time to implement measures that will reduce the risk of loss/damage to materials/heritage* (in this case, continuous risk assessment is very important, with taking into account new circumstances, e.g., in case that underground water has started to appear in a room/basement where particularly valuable materials are kept, such materials should be preventively moved to the ground or first floor).

For the successful preparation of cultural heritage protection, it is first necessary to approach the categorization/selection of materials. Movable material heritage can be divided according to value and resistance to specific threats. For example, among library materials, the highest priority for protection will be given to old manuscripts or books of inestimable value that are kept in only one place and exist in a single copy. The prescribed storage method according to regulations will be considered, as well as resistance to assessed threats (e.g., sensitivity to moisture), but also the location within the premises, considering sources of risk (such as water pipes in the building, areas with increased fire risk like boiler rooms, etc.). It will also be assessed which materials are more resistant to flooding and can be more easily restored or recovered after such events, and which one would be permanently lost if the room in which they are stored is flooded. The storage of materials will be determined according to the analysis conclusions.

After assessing the value and degree of resistance to threats (including the storage method, e.g., metal boxes, glass, microfilms, etc.), and primarily threats such as fire, flood, and earthquake that can irreversibly destroy cultural heritage, an internal and external risk assessment is carried out. First, it is assessed in what ways the materials can be endangered by internal events, which include theft/negligence, fire, or flood originating within the building, and then how external circumstances can affect the materials (e.g., the possibility of roof leakage or rising groundwater levels in the event of floods caused by extreme rainfall, building collapse in the event of a destructive earthquake, etc.).

When assessing external threats, the following sources are used:

- Data on the building's resistance (year of construction, modifications, earthquake resistance, previous experience with adverse events).
- Data on the location/surroundings of the building concerning the possibility of external risks/threats (is it in a potential flood zone/near a watercourse, embankment that may rupture, is the building in a depression, in an area where groundwater may rise due to high water levels of the Sava River).
- Security-logistical assessment (number/type of roads surrounding the building, proximity to buildings that may collapse and hinder access during the evacuation of cultural heritage, number of exits from the building and accessibility of evacuation routes for materials, etc., information relevant for planning the evacuation of cultural property).

For immovable cultural property, it is necessary to assess which protected buildings represent the highest value for the state in terms of purpose and touristic/historical value, and to categorize such buildings to decide which should be seismically strengthened. It is highly likely that if such strengthening is not carried out and a destructive earthquake occurs, most of these buildings will be permanently destroyed (City Office for Local Self-Government, Transport, Civil Protection and Security, 2021).

4. EXAMPLE OF GOOD PRACTICE IN THE CITY OF ZAGREB: NATIONAL AND UNIVERSITY LIBRARY (NSK)

The National and University Library (NSK) represents a leading example of an institution that has developed systematic measures for the protection of movable cultural heritage in crisis conditions. Their good practice includes:

- *Planning and continuous risk assessment* – Regular risk assessments are carried out for the collections, considering storage location, storage method, and potential threats (Ministry of Culture and Media of the Republic of Croatia, 2023).
- *Evacuation plans* – Clear protocols are defined for the evacuation of the most valuable materials in case of fire, flood, or other crisis situations.
- *Fire protection* – NSK is equipped with modern fire detection and suppression systems, which is crucial for the protection of books and manuscripts.
- *Reinforcement and improvement of infrastructure* – Special attention is given to the earthquake resistance of buildings and security measures in basements and storage rooms.
- *Digitization and backup* – NSK are intensively digitizing its most valuable collections to ensure their preservation even in the event of physical destruction.
- *Cooperation with external institutions* – NSK cooperates with the Ministry of Culture and Media, the City of Zagreb, and other institutions to improve security standards and crisis response.

During the COVID-19 pandemic, NSK additionally developed protocols for the protection of staff and collections, including restricted access, enhanced hygiene, and regular ventilation of rooms. In the event of a flood or earthquake threat, particularly valuable materials are relocated to safer parts of the building or to other institutions according to pre-arranged plans.

To achieve the goal of optimal protection of cultural heritage in crisis conditions in the City of Zagreb, it is necessary to:

1. assess the situation,
2. identify the most valuable cultural heritage,

3. implement risk reduction measures (relocation of materials, reinforcement of buildings),
4. check, test, and implement plans when needed (e.g., evacuation of particularly valuable materials in case of fire).

5. RISK ASSESSMENT – COLOR MATRIX

The following table presents a risk assessment of the total destruction of materials, depending on the type of threat and the type of cultural property. Red indicates a high probability of total irreparable destruction, orange represents severe damage/destruction of a larger portion of the material with the possibility of partial restoration of a smaller number of destroyed items, yellow indicates degradation and partial destruction of objects/materials, while green represents a very low risk of total destruction due to existing protection measures in accordance with legal and by-law acts.

Table 1: Risk assessment of total destruction of cultural property
Source: authors

No.	Type of Threat	Protective Measures	Risk of Total Destruction	
			Immovable Cultural Property	Movable Cultural Property
1.	*Devastating earthquake of intensity IX MCS*	Buildings constructed before the 1960s are particularly at risk. Strengthening of existing cultural monument buildings, relocation of especially valuable materials to more earthquake-resistant buildings		
2.	*Fire in the building*	Implementation of existing plans, verification and updating of existing cultural heritage evacuation plans, installation and regular inspection of fire protection systems, storing materials away from high-risk sectors (potential fire outbreak locations)		
3.	*Flood inside the building*	Storing especially valuable materials away from water pipes/possible sources of flooding within the building		
4.	*Flood caused by extremely heavy rainfall/flood caused by rising groundwater levels*	Higher risk for buildings located closer to the Sava River (especially the Trnje area). Raising especially valuable materials to higher levels, storing such materials in rooms far from windows, external walls		
5.	*Flood caused by the rupture of the Sava*	Higher risk for buildings located closer to the Sava River. Raising especially valuable materials to higher levels, developing a		

No.	Type of Threat	Protective Measures	Risk of Total Destruction	
			Immovable Cultural Property	Movable Cultural Property
	embankment during high water levels	plan for moving materials to upper floors in such events		
6.	*Mass unrest/terrorism*	Plan for engaging police officers or security services to prevent looting/destruction of property		

The above table can be applied in the risk analysis of total destruction for each immovable cultural heritage object (e.g., building, church, palace, monument) and for specific sets of movable cultural property that may be located within the same endangered object and share common characteristics of resistance, depending on the location of the collection (e.g., basement, first floor, proximity to windows, heating and water pipes), storage methods, and storage media (e.g., glass, metal boxes, microfilms).

By conducting a risk assessment, it is possible to identify the most endangered immovable cultural heritage objects, as well as the most at-risk collections/parts of collections within a particular building/institution, which need additional protection or relocation (ICCROM, 2016; Jigyasu & Arora, 2012).

6. CATEGORIZATION OF CULTURAL PROPERTY AND THREATS – TABULAR OVERVIEW

Cultural property in the Republic of Croatia is categorized by type, source and mechanism of threats, risk level and response, obligations and rights of owners/holders, and by value and significance, in accordance with the Act on the Protection and Preservation of Cultural Property (Official Gazette 145/24) and related regulations (Ministry of Culture and Media of the Republic of Croatia, 2024).

Key categorizations include:

Table 2: Categorization of cultural property by type
Source: authors

Type of Property	Practical Example (Republic of Croatia)	Legal Basis (Article)
Immovable cultural property	Dubrovnik City Walls, Diocletian's Palace, Eltz Manor in Vukovar	Art. 1., 2., 13., 24.
Movable cultural property	Archival materials of the State Archives in Zagreb, the painting "Judita" by Vlaho Bukovac, the weapons collection in the Museum of Slavonia	Art. 1., 2., 13., 24.

Type of Property	Practical Example (Republic of Croatia)	Legal Basis (Article)
Intangible cultural property	Klapa singing, Sinjska Alka, The art of making Licitar, The golden formula ča-kaj-što	Art. 1., 2., 13., 24.

Table 2 explains the classical division of cultural goods into immovable, movable, and intangible, with examples from Croatian practice (e.g., the walls of Dubrovnik, Judita by Vlaho Bukovac, Sinjska Alka). The protection of human life represents a fundamental prerequisite for the preservation of intangible cultural heritage and collective memory. During major disasters and catastrophes, the civil protection system implements effective measures and activities aimed at preserving life, while material records such as recordings of folk songs or musical scores are protected through specific cultural heritage protection measures. In this way, the protection of life and heritage act as complementary elements in preserving cultural identity and collective memory. This classification plays a crucial role in planning protection during crisis situations, as each type requires different preservation mechanisms, logistics, and legal interventions. The table results from a synthesis of legal provisions and real examples in the cultural heritage protection system (Ministry of Culture and Media of the Republic of Croatia, 2024).

Table 3: Categorization of threats by source and mechanism of action
Source: authors

Threat Category	Description / Practical Example	Legal Basis (Article)
Natural threats	Zagreb earthquake 2020 – damage to the cathedral and museums; Vukovar flood 2014 – threat to the Vučedol Culture Museum	Art. 24.
Anthropogenic threats	Vandalism and theft in St. Mark's Church in Zagreb; inadequate restoration of historic facades in Split; construction works near Salona	Art. 20., 21., 24.
Institutional threats	Lack of funding for climate-controlled museum depots (e.g., 40 % of museums without adequate conditions); untimely response to damage	Art. 20., 21., 24.

Table 3 classifies threats into natural (e.g., earthquakes, floods), anthropogenic (vandalism, illegal construction), and institutional (inadequate funding, legal inconsistencies). This clearly shows that crisis management must integrate internal system weaknesses – not just physical threats. In the paper, this categorization forms the basis of a unified risk model that links sources of threats with response mechanisms and legal articles that regulate the responsibility and response of the system (Bilušić Dumbović, 2013; ICCROM, 2016).

Table 4: Categorization by risk level and response
Source: authors

Risk Level	Criteria (according to assessment in Article 24)	Practical Example	Recommended Protective Measures (Article)
Critical	Immediate threat to authenticity/integrity	Damage to Eltz Manor in Vukovar during the Homeland War	Emergency intervention, temporary measures (Art. 21, 24)
High	Endangerment of essential features or function of the asset	Historic centers of Zagreb damaged by earthquake	Planning and implementation of protective measures (Art. 24)
Medium	Limited degradation, partial endangerment	Gradual erosion of stone facades in Pula and Trogir due to pollution	Regular monitoring and maintenance (Art. 20, 24)

Table 4 establishes a hierarchy of risks - from critical to moderate - with practical examples and proposed protective measures. It emphasizes the operational dimension of cultural heritage crisis management by distinguishing situations requiring urgent response (e.g., war damage or a devastating earthquake) from those demanding long-term monitoring (e.g., erosion or pollution). The table contributes to standardizing vulnerability assessment criteria by linking them with the law (Articles 20–24) and risk assessment methodology (Ministry of Culture and Media of the Republic of Croatia, 2024; ICCROM, 2016).

Table 5: Categorization by obligations and rights of owners/holders
Source: authors

Obligation of Owner/Holder	Legal Basis (Article)	Practical Example
Careful preservation and maintenance	Art. 20	Regular maintenance of roofs and walls of Diocletian's Palace
Enabling access and research	Art. 20	Allowing archaeological research at Starogradsko polje
Implementation of protective measures as determined by decision	Art. 21, 24	Execution of conservation measures on the HAZU building as ordered by the Ministry

This table provides an overview of the legal obligations of owners and users of cultural goods, including maintenance, enabling research, and implementing protective measures at the request of competent authorities. This emphasizes the managerial and legal aspect of crisis preparedness – owners are active participants in the protection system, not passive subjects. The table serves an educational and normative function, important for professionals in civil protection and conservation services (Ministry of Culture and Media of the Republic of Croatia, 2024).

Table 6: Categorization by value and significance
Source: authors

Criterion	Legal Basis (Article)	Impact on Protection Prioritization	Practical Example
Cultural significance	Art. 24	Greater significance = higher protection priority	Dubrovnik City Walls – national symbol
Condition and endangerment	Art. 24	Greater endangerment = more urgent measures	Zagreb Cathedral after the earthquake
Historical and artistic value	Art. 24	Greater value = higher investment	Painting "Judita" by Vlaho Bukovac – restoration

Table 6 synthesizes the criteria that determine the priority in the protection of cultural goods: cultural significance, condition and level of endangerment, as well as historical and artistic value. It serves as the basis for shaping investment strategies, determining the order of interventions, and transitioning to quantitative assessment methods. The table links the analytical framework with the principles of crisis management - directing resources toward the most valuable and most endangered assets (Ministry of Culture and Media of the Republic of Croatia, 2024; ICCROM, 2016).

All the tables in the paper collectively constitute an original, comprehensive model of cultural heritage categorization and risk assessment, aligned with the contemporary legislative framework of the Republic of Croatia and international best practice references such as ICCROM and UNESCO guidelines. This model is not merely a theoretical framework but is pragmatically designed for application in crisis management, especially in an urban context like the City of Zagreb, which is rich in various forms of cultural heritage (UNESCO, 1972; ICCROM, 2016).

7. INTEGRATED APPROACH AND INNOVATIVE PROTECTION METHODS

The Croatian system combines legal, technical, and value-based criteria to identify and rank threats. For example, the illegal export of archaeological artifacts is treated as a high-risk activity due to the loss of national identity, while the erosion of historic buildings is gradually addressed through EU restoration projects.

An integrated approach to the protection of cultural property is essential. According to ICCROM guidelines, the optimal strategy includes:

- Quantitative analysis (SCoRE methodology) (ICCROM, 2016)
- Prioritization of interventions based on the “frequency X consequence” factor
- Implementation of hybrid protective measures that combine physical protection with digital backup.

Recent research warns that 23 % of protected cultural property in Croatia lacks adequate risk management plans (City Office for Local Self-Government, Transport, Civil Protection and Security, 2021).

It is also necessary to consider innovative approaches to categorization, such as the ARCH project. This categorization enables targeted investment in protection, which is especially important in conditions of limited resources (geological stability + cultural significance = prioritization matrix). The use of hybrid models (for example, combining the SCoRE methodology and FAR tools) has proven effective in reducing risk by 30–40 % in pilot projects (ICCROM, 2016).

8. CONCLUSION

The strategy for the protection of cultural property in crisis conditions in the Republic of Croatia should be based on a systematic, interdisciplinary approach that connects the legal framework, risk analysis, effective resource management, and active community involvement. Cultural property forms the foundation of national identity and historical heritage, and its protection requires clearly defined priorities and continuous adaptation to contemporary challenges. The first key element of the strategy is the consistent application of the Act on the Protection and Preservation of Cultural Property and alignment with international standards, such as UNESCO conventions. The legal framework ensures clear regulation of protection procedures, prescribes the obligations of owners, and guarantees the community's right to preserve cultural heritage. Additionally, it is necessary to develop and regularly update management plans for individual properties and ensembles, which enables timely response to threats and more efficient use of available resources.

Risk analysis is the second fundamental pillar of strategy. By using modern methodologies, such as the SCoRE model for quantitative risk assessment, it is possible to identify the most endangered properties and threats with the greatest potential consequences. Earthquakes, floods, fires, climate change, as well as human factors such as vandalism or inadequate maintenance, are assessed according to the probability of occurrence and the level of possible damage. This approach enables prioritization of investments in the protection of those properties that are most important for national identity and most exposed to risks (ICCROM, 2016; Jigyasu & Arora, 2012; Ministry of Culture and Media of the Republic of Croatia, 2024).

Resource management and strengthening of professional capacities are the third key segment of the strategy. It is necessary to ensure sufficient financial resources for preventive maintenance, emergency interventions, and long-term restoration, using national sources as well as European funds. Special attention is devoted to the education of professionals and owners of cultural property, as well as the development of new technologies, from 3D scanning and digitization of archival materials to the implementation of GIS systems for monitoring the condition of immovable property. Active involvement of the local community and the public is essential for the sustainability of protection. Programs such as "Adopt a Monument" and citizen participation in the revitalization of cultural events foster a sense of shared responsibility and contribute to the preservation of heritage values. At the same time, sustainable tourism and clearly defined visitor management plans ensure a balance between economic benefits and the preservation of the authenticity of cultural sites.

Investment priorities are defined according to risk level, cultural significance, and economic sustainability. The highest priority is given to assets at high risk of destruction (for example, historic

buildings in earthquake zones), sites of exceptional national importance, and projects that enable a return on investment through the development of cultural tourism and education. Digitization and the creation of national repositories of archival materials are also among the priorities, as is the continuous monitoring of the condition of properties and the adaptation of strategies to new challenges.

Modern approaches to crisis management in cultural heritage also include practical frameworks for emergency response, such as those proposed by Pietrek (2018), which emphasize the need for coordinated action between institutions and professionals. The protection of cultural property, both in the City of Zagreb and in the Republic of Croatia, requires an integrated approach, a balance between tradition and innovation, and clear criteria for resource allocation. Only through joint action by the state, experts, and local communities it is possible to ensure the preservation of heritage for future generations and simultaneously encourage its sustainable development.

REFERENCES

Bilušić Dumbović, B. (2013). Cultural Heritage in Croatia Facing New Challenges. Quarterly: Chronicle of Art History in Croatia, 6-11. Retrieved from https://hrcak.srce.hr/175051

City Office for Local Self-Government, Transport, Civil Protection and Security. (2021). Study: Cultural Property – Earthquake Risk Assessment of Cultural Heritage Buildings in the City of Zagreb. Zagreb, Croatia: City of Zagreb. Retrieved from https://potresnirizik.zagreb.hr/UserDocsImages/elaborati/PRZGB_elaborati publikacija_KULTURNA DOBRA.pdf

ICCROM. (2016). Guidance on risk management for cultural heritage. Rome, Italy: ICCROM.

INTERPOL. (2016). Protecting Cultural Heritage. United Nations Publication, Vienna, Austria. Retrieved from https://www.unodc.org/documents/publications/SRIUN_Protecting_Cultural_Heritage_2016.09.12_LR.pdf

Jigyasu, R., & Arora, V. (2012). Disaster risk management of cultural heritage in urban areas: A training guide. Kyoto, Japan: Research Center for Disaster Mitigation of Urban Cultural Heritage, Ritsumeikan University (RitsDMUCH).

Ministry of Culture and Media of the Republic of Croatia. (2023). Methodology for the Registration of Movable Cultural Heritage. Zagreb, Croatia: Ministry of Culture and Media RH.

Ministry of Culture and Media of the Republic of Croatia. (2024). Act on the Protection and Preservation of Cultural Property (Official Gazette 145/24). Zagreb, Croatia: Narodne novine.

Pietrek, G. (2018). Protection of Cultural Heritage During Crisis Situations. Internal Security, WSB University, Gdańsk, Poland. Retrieved from https://publisherspanel.com/api/files/view/1096974.pdf

UNESCO. (1972). Convention concerning the protection of the world cultural and natural heritage. Paris, France: UNESCO.

United Nations Educational, Scientific and Cultural Organization. (2010). Managing disaster risks for World Heritage. Paris, France: UNESCO.