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Selected Aspects of Revitalisation in the Land Development of the City Moat in Jeziorany

Marek Zagroba¹, Joanna Pawlowicz¹

¹ University of Warmia and Mazury, Faculty of Geodesy, Geospatial and Civil Engineering, Institute of Building Engineering, Heweliusza str. 4, 10-724 Olsztyn, Poland

mazag@uwm.edu.pl

Abstract. Historic town quarters, as an area often referred to as the Old Town, used to be and still are perceived as playing the role of the town centre. This is almost invariably true about small towns, as there the Old Town is associated with the site where the town was established and is a manifestation of the town's historic identity. Therefore, the functional and spacial problems in many small localities face tend to concentrate in their historic centres, where they are compounded by the high density of buildings. The complexity of elements which compose the structure of historic town centres calls for such actions that will ensure a more prominent exposition of the Old Town against the backdrop of the other urban areas. This entails the necessity to solve numerous problems, not only spatial but also economic and social ones. Every town is a living organism, and a place where people live. The key to solving the above problems is by developing revitalisation programmes to improve the quality of space and to ensure sustainable development of centres in historic towns. An example is the historic quarter in Jeziorany, a town with medieval roots which lies in Warmia, a historic region situated in north-eastern Poland. This paper is devoted to a revitalisation project carried out in Jeziorany. Selected aspects are presented of a land development plan designed to revitalise the former moat in Jeziorany, a historic town in Warmia. The moat lies within the Symasarna River Valley Protected Landscape Area. Until recently, it had looked like a belt of untrimmed greenery stretching around the town's centre. Part of the programme for revitalisation of Jeziorany's centre, it was the first accomplished stage on the way of giving the town centre a new quality. Once reorganised and improved, this area now contributes to the centre-forming character of the Old Town, enables a better exposition of the Old Town's historic buildings, has a positive influence on the public urban space and attains a social dimension by improving the local community's life quality. Revitalisation of the moat in Jeziorany is an example of implementation of some positive spatial solutions in the centre of a small historic town. The process of renewing this area with respect to its functional and visual assets demonstrates that the execution of programmes dedicated to the improvement of urban structures produces a positive impact on the functions performed by town centres and on towns' economic and social growth. Analogous actions in other towns may have a profound influence on the atmosphere (*genius loci*) of certain areas in urban landscapes, which can considerably strengthen the bonds within local communities.

1. Introduction

The centres of many small towns in Warmia badly need revitalisation. The causes are hidden in their history, mainly the damage they suffered during World War Two, the way they were rebuilt afterwards and the general economic status of the whole region. The urgent need for some transformations arises



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from the desire to restore the character of historic quarters as centres of towns, and to expose heritage buildings against the background of other town areas.

The object of revitalisation discussed in this paper is a disused moat in Jeziorany. Prior to the revitalisation plan, it was a dry and hollow ditch overgrown chaotically with shrubs and trees, which ran along three sides of the Old Town in Jeziorany. The spatial layout of the whole area dates back to the Middle Ages and reveals features of an urban development that were characteristic for the medieval times. The greenery that occupies the former moat, officially referred to as the town's moat, lies in the Symsarna Valley Protected Landscape Area. Because of its high landscape and nature assets, it is legally protected and included in the revitalisation programmes developed for whole Jeziorany. Despite its high value, not long ago the moat had been so badly degraded that some parts were even used as 'unauthorised' dumping sites in the town's centre. The local council committed themselves to implementing a revitalisation programme for this area, a plan which was put to action with the help of structural funds. The spatial solutions adopted in this programme defined the functions of this area, which - by lying in the town's centre - was extremely significant. Thus, it was also necessary to consult any project concerning the moat with the local community to ensure that the development of all the areas accessible to the general public would proceed in the least annoying manner.

The aim of this study has been to present certain recommendable spatial solutions designed for the sake of revitalisation of a degraded green area in the centre of a small town. The area in question, by being a unique architectural and urban sphere, is an extremely significant element in the shaping of people's living environment.

2. Research findings

Having performed a detailed analysis of the research object, it appears that questions of the spatial development of Jeziorany as well as other small towns in Warmia have been treated rather selectively. The oldest written records describing the territories inhabited by the Old Prussian tribes appeared in the Middle Ages, and include the Bavarian Geographer from the mid-10th century, Ibrahim ibn Yaqub's writings and the chronicles penned by Gallus Anonymous [1]. Later documents are mostly sources developed by German scholars in the 19th and 20th centuries, which revolved mostly around historical questions, but which also contained some general descriptions of the towns and region. Spatial elements are typically presented in brevity, as in the work by Erich Keyser [2]. A synthetic view of the urban structure as a complete entity is presented in maps of the Warmian towns elaborated by Giese in 1826-1828, which Adolf Boetticher enclosed in his book [3]. In it, attention grabbing is the extremely interesting graphic representation of the natural conditions, which had determined the location of towns. Another meaningful document is an in-depth analysis and a subsequent classification of the location of towns in Prussia relative to the nearby watercourses, lakes and the land relief given by Hugo Bonk [4]. Differences between the Warmian towns in this respect are fundamental to any research into the influences of natural conditions on spatial solutions, a question which weighed heavily on the revitalisation project of the urban moat in Jeziorany. With respect to the urban studies, the writings of Richard Dethlefsen [5] are a valuable reference, containing a discussion of the principles underlying the formation of the urban spatial structure, which also manifested themselves during the development of towns in Warmia [6].

The research dealing with the above problems in post-war Poland cannot compete with the achievements of the German researchers, neither in the volume nor in its scope. The Polish references most often raise questions of the history of individual towns or the colonisation of the Old Prussian land [7].

The German-language studies in the post-war period continue to be distinguished by their historical and economic interests, while the accomplishments of the Polish studies into the spatial structure of

towns are now greater than before 1939. A valuable source of research material consists of the studies dedicated to castles and fortifications in towns, which document the origin and development of towns in the region [8]. Among the references describing urban centres in former East Prussia, worth mentioning is the book co-authored by Lucjan Czubiel and Tadeusz Domagała [9], who managed to provide us with very synthetic descriptions of small towns in Warmia. Other noteworthy publications raise the issues of how historical towns in north-eastern Poland function these days, for example writings by Maria Lubocka-Hoffmann [10] or Jan Salm [11]. These books, along with the previously mentioned publications by German researchers, serve as the fundamental sources for continuing studies in this field. At the same time, they are the evidence to how important it is to protect and preserve the cultural heritage of Warmia, which spans several centuries [12].

3. Localisation conditions

The diversity of landscapes and topographic features in Warmia bears heavily on the spatial structure of the towns that have developed in this region. Meandering rivers, hills or nearby lakes could all determine the urban plans, layouts and further growth of towns. Jeziorany was no exception. The town was founded in 1338, on a hill in a meander of the Symsarna River. The river defined from three sides the territory occupied by the new town, and served as its natural line of defence ‘figure 1’. The town’s main building was a fortified castle, which was erected in the western part of the town. All that has remained from it are some fragments of the castle foundation walls.

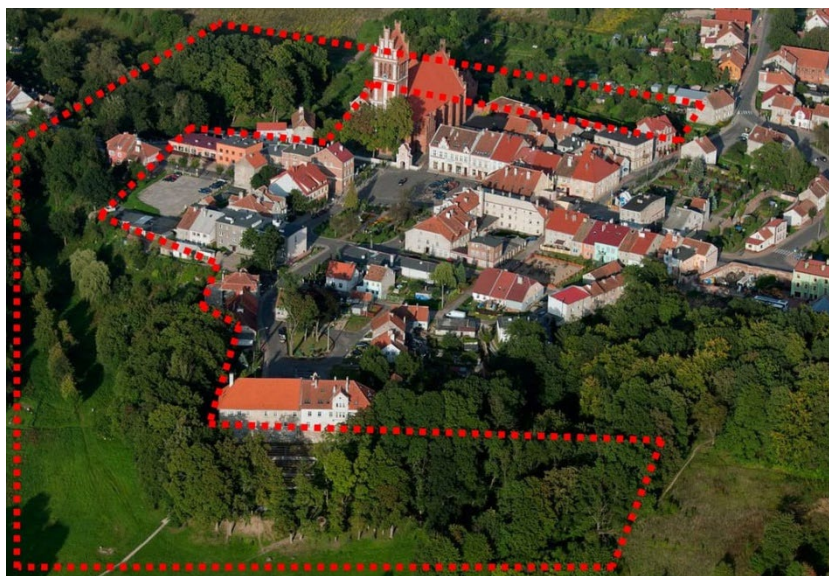


Figure 1. The town moat in Jeziorany. Explanation: the red line – the greenery surrounding the historic old town (old meander of the Symsarna River). Source: [13];

Jeziorany is characterised by a well-preserved and readable urbanistic layout originating from the Middle Ages. The town plans in all Warmian towns are quite diverse and differences most often appear in the plan of transportation routes, the location and size of market places, location and construction of main public buildings (churches, town halls, castles), and the character of townhouses in the town centres.

The current development of Jeziorany’s centre represents different degrees of the continuation of its architectural past. In places, the architecture of some buildings is disharmonious with the historic space of the Old Town, as they often resemble buildings raised in housing estates designed under the impact of Social Realism in arts. This is the consequence of certain unfortunate events in the town’s history, mostly the damage suffered at the end of World War Two, when the Red Army took to demolishing and

burning the Warmian towns, in line with the slogan ‘Down with the memory of the Prussian state’. Another factor responsible for the current quality of the architecture in these towns is the way they were raised from the ruins, oftentimes without any respect to the historically rooted town plans.

4. Spatial management

The town’s moat in Jeziorany is a dry ditch overgrown with trees and shrubs, which runs along three sides of the Old Town. It forms a distinct borderline between the centre and the rest of the town. A plan to redevelop this area was one of the priorities for the local authorities. The building plan, prepared and executed, contains urbanistic and architectural spatial solutions, in which functional zones and their composition forms are distinguished, including landscaping design, selection of plants and addition of street architecture elements. The building plan for the redevelopment of the moat in Jeziorany was commissioned by the Town Council in Jeziorany in 2013. The authors of the project concerning the urbanistic aspects, architecture and landscape architecture were: dr Marek Zagroba, an architect, and Joanna Klonowska, a landscape architect.

Until recently, the dry moat ditch, which is situated in the very heart of Jeziorany, had been filled with some unkempt vegetation. The solutions adopted in the spatial management plan for this area defined the priorities in the programme of functions and use assigned to this site, and which was expected to provide an area for various forms of recreational activities. However, the most important assumption was to divide the area into spheres according to future users who would fall into different age categories and could have different expectations.

In a town as small as Jeziorany, the discussed revitalisation project was a large one, as the construction site covered an area of 16 ha and flanked the Old Town from the north, west and, partly, the south. The depth of the ditch relative to the level of the Old Town exceeds 10 meters in some places, which meant that access to the redeveloped area was difficult and steps had to be provided ‘figure 2’.



Figure 2. The urban moat in Jeziorany. Explanation: a – difference in the levels, b – steps;

The difference in the ground levels and the high slope are the land relief features that accentuate the historic town centre, which dominates the urban landscape. This is a valuable asset of Jeziorany’s silhouette, even though only one (St Bartholomew Church) of the three historic buildings which dominated the town in the past (the church, the castle and the town hall) has survived until our days ‘figure 3’. The revitalisation of this area, extending far beyond purely spatial solutions, is very important due to the location of the moat, its surroundings and the role it plays as the backdrop of the historic Old Town. In addition, it is important in the life of the local community.



Figure 3. Jeziorany – St Bartholomew Church (Photo: by the author)

The green area in the northern part of the moat is intersected by a road bridge which carries the town's main street that cuts through the town's centre. In the proposed plan and during its implementation, this helped us to establish a clear division into two main spheres, each with its own specific functions 'figure 4'. To the east of the bridge, there is a sphere of the sacred. Because of the vicinity of the church and parish cemetery, this area favours contemplation and prayer. It is composed of an alley of tranquility, the stations of the Way of the Cross and a square for mass services. The western and south-western part of the moat compose a sphere of the profane, dedicated to various forms of relaxation, both passive and active, as well as education. It comprises walking paths, bicycle lanes, fountains, an amphitheatre, a barbecue area and landscaped vegetation.

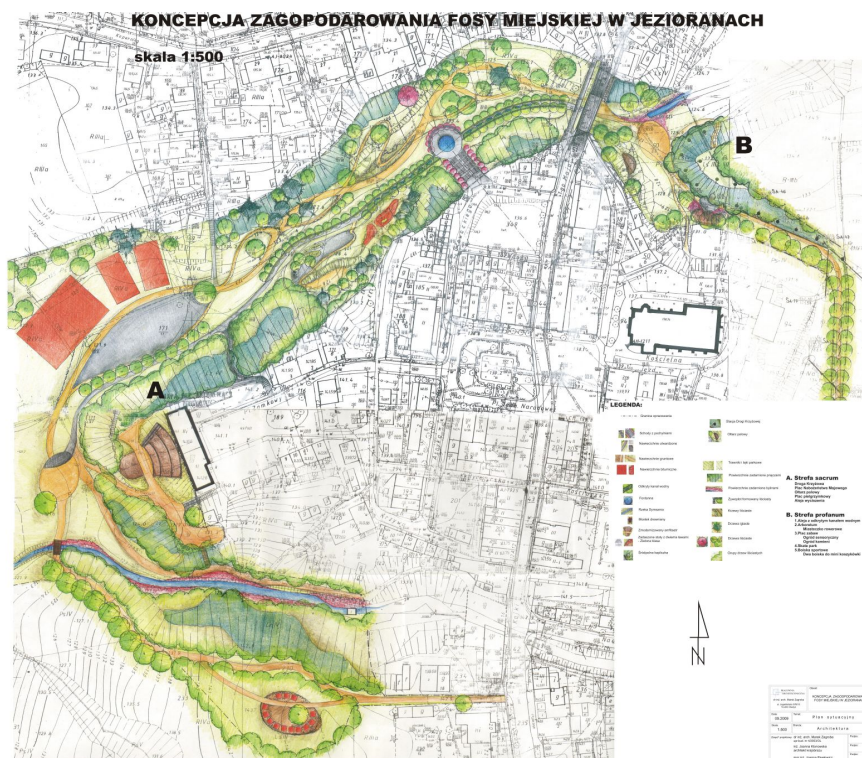


Figure 4. Jeziorany – the plan for the land management in the former moat. Explanation: A – the sphere of the profane, B – the sphere of the sacred;

The concept underlying the design and consequently its implementation was to organise the recreational function of this area and to assign to it various roles while maintaining the spatial order in what is the town's heart. The proposed functions, which include both active and passive recreational activities, as well as other elements which fill in the sacred sphere, serve to benefit social integration and to strengthen the bonds within the local community.

A significant component of the plan consisted of a variety of plants, including the existing trees (legally protected) and trees or shrubs planned to be planted. The use of eco-friendly materials (wood, ceramic brick, stone) to make street architecture elements scattered among the plants highlight the building tradition of Warmia, which is one of the principal assets of this revitalisation plan, accepted and executed in Jeziorany.

5. The spheres

The eastern part of the moat has been developed into a sphere of the sacred. From the east, it starts with an alley of tranquility, whose role is to create in the user an atmosphere of spirituality. The elements of vegetation (trees, shrubs) designed in this part as well as further on, along the Stations of the Cross, favour the mood of contemplation, prayer and meditation. Moreover, these plants have a symbolic meaning. Among the planned plant species, the following are outstanding: thorny barberry (*Berberis*) with purple leaves, sweet mock orange (*Philadelphus*), which produces a multitude of white flowers when in bloom, beech (*Fagus*) and lesser periwinkle (*Vinca*) that symbolise eternity and immortality. The Stations of the Way of the Cross have been designed in a form which refers to the tradition of building such religious objects in Warmia. They are plastered white and roofed with red ceramic tiles, which creates an eye-pleasing contrast to the surrounding green plants. The stations were purposefully built from the materials traditionally present in the region, but they are also ecologically friendly. The proposed solutions in this part of the moat are important not only in our search for spatial order, but also in the context of social circumstances, such as the role of a religion in shaping social norms 'figure 5'.



Figure 5. The sphere of the sacred. Explanation: a – Stations of the Way of the Cross, b – Stations of the Way of the Cross and the alley of tranquility;

To the west, the moat is filled with the sphere of the prophane. It is composed of several spaces, each with a different role. These sub-spheres are used for passive relaxation, mainly by adults and elderly people, and for active relaxation and education – by children and adolescents. An element which brings together individual parts of this sphere is the main alley, which becomes narrower and narrower as it leads to several narrow paths for walking and cycling 'figure 6a'. Ultimately, the main alley branches partly, and this is where the gravel surface turns into the mineral-resin one, which is suited for roller-skating and skateboarding. This solution enriches the road infrastructure of the whole area. The walking

and cycling path, along which the major land development elements in this sphere are located, changes its character every dozens of meters, by opening vistas of the surroundings.

The moat ditch can be accessed through one of the eight sets of steps or ramps, which ensures a convenient use of its vast area by visitors as well as an easy access for maintenance and technical repairs. The main entrance from the Old Town, by means of a set of wide granite steps laid on the ground, leads to a square situated on the axis of the main alley 'figure 6b'. This alley, including the fountain in the middle of the square, is one of the major compositional axes, which highlights the straight line design of the steps, the tree plantings and the gabions in the shape of DNA chains 'figure 7a'. The axis closes visually at the spire of St Bartholomew Church, which towers above the Old Town of Jeziorany 'figure 7b'. This solution endows the above part of the moat with a formal character.



Figure 6. The moat. Explanation: a – the main alley, b – the main entrance;



Figure 7. The moat. Explanation: a – fragment of the revitalised space, b – the main entrance;

In the vicinity of the main alley there are the elements connected with the educational and playful roles. They consist of a sensory garden and a rock garden. The sensory garden is the garden of the senses: touch, smell and sound. It is a secluded area, which produces a strong impact on the senses, where things can be touched, smelled and listened to. Thus, it also plays an educational role because it enables children and adults with broadly understood disabilities to learn about the environment at first hand. Another element that serves an educational part is the rock garden. It is planned to collect in it rocks from different parts of Poland. In the spring and autumn, both gardens can serve as 'a green classroom' for the nursery school and primary school in Jeziorany. Unfortunately, not all the solutions included in the building plan have been completed, even though the revitalisation works have been supervised by the design's authors. The reason is the building reality in architecture typical for Poland, where savings

are sought, cheaper and worse materials are used or some components of an investment are abandoned while the investor explains that they will be completed later, at the next stage, but this most often means never.

In the western part of the area submitted to revitalisation, there is a square which – together with the renovated amphitheatre – is a venue for meetings and festivities. It helps to integrate the local community through various cultural and educational events. The amphitheatre stage and the seats for an audience are the largest architectural structure located in the former moat ‘figure 8a’. It takes a modern shell-like form. It stands near the Town Hall and is flanked by tall trees. The construction of the amphitheatre stage and seats was a serious engineering challenge due to the high sloping elevation, on top of which, raised on the foundations of the medieval castle, stands the Town Hall. The disruption of the native ground in this site required the building of a whole system of protective walls, thus a great effort of the construction designer was put into making an adequate building plan ‘figure 8b’.



Figure 8. The moat. Explanation: a – the amphitheatre, b – the amphitheatre audience;

Green areas supplement the proposed urbanistic and architectural solutions. The main walking tract, which connects all the functional areas, was designed along the existing tree-lined alley, a decision supported by the fact that these trees were under legal protection. The natural background for the forms of spatial development designed in the moat is composed of lawns, perennial plants, shrubs as well as coniferous and deciduous trees. Well-designed groups of plants, through the interplay of light and shade, enhance the value of the moat's landscape, and the visual beauty of this site is of great importance to the local community – it integrates and helps to build stronger bonds with one's place of residence. This is true about people of all ages, interests and aspirations, and it can be achieved by having an opportunity to spend time in friendly spaces ‘figure 9’.

6. Street architecture components

Elements of street architecture add to the spatial solutions designed to revitalise the moat in Jeziorany. They fill in particular spheres harmoniously with their function and with the surroundings, both in the form and the used materials. The technical solutions specified in the construction plan and regarding some of these objects (the fountains, lights) had to be verified and possibly redesigned during the construction works, which entailed the engagement of specific branch designers (fitters) while the project was being implemented.

Depending on their purpose, street architecture items are set alone or in groups. They include: Stations of the Way of the Cross as shrines, fountains, lights, benches and gabions. They all come in non-aggressive, friendly forms that blend well with the natural landscape of greenery, and the construction materials are mostly the ones that were traditional to the region of Warmia and Mazury, that is wood, stone and red ceramic bricks. Stone in the form of granite cobblestones and slabs is the material that fills fragments of the hardened surfaces throughout the area, such as steps, access ramps and squares. The

functionality of these solutions combined with the use of natural materials has a positive effect on the new quality of space in the town centre.



Figure 9. Development of the moat. Explanation: a – a stage during the construction works, b – the revitalised moat.

The redevelopment of the town moat in Jeziorany represents a harmonious approach to the whole area, perceived as an element of a larger layout inscribed in the town's history. The revitalisation efforts, through the architectural and urbanistic solutions, have an effect on the social factors – they enhance the quality of life of the local residents. The attempt undertaken by the municipal authorities to obtain funds from the EU sources proved to be the right decision, as it enabled the town to put the plan into action.

7. Conclusions

Revitalisation of degraded green areas in the heart of a town, especially a small one, is a significant problem in the life of a local community. Revitalisation is particularly valuable when – other than areas having centre-forming roles or historic buildings – it is addressed to a public space with recreational roles. The town moat in Jeziorany, which underwent the revitalisation described in this article, is a place that all residents of the town should identify themselves with. Thus, any plan to renew this area had to be approved by the local community.

The high value of this space required careful planning and plan execution, although some compromises were unavoidable. The adopted spatial solutions respect the historical roots, while trying to meet the contemporary expectations. The green area around the Old Town in Jeziorany constitutes a natural boundary between the historical and contemporary buildings. The revitalisation of the moat has enabled a better exposition of the Old Town against the background of the other town areas.

Based on the aspects of the plan's execution presented above, the following benefits derived from the restoration of this green area in the town centre can be identified:

- the development of the former moat based on a plan which employed a set of harmonious forms has organised the space, introduced order and highlighted the Old Town, which it flanks,
- revitalisation of the area surrounding the historic center of the town may give an impetus to undertaking efforts to restore sets of buildings within the town's centre,
- positive spatial solutions have a strong social impact – a high-culture space increases the willingness to stay and to return to places that are likeable.

The revitalisation of the urban moat in Jeziorany is an example of how strongly the spatial (urbanistic and architectural) management of an area can affect the social aspect. By creating 'the atmosphere' of a place, the *genius loci*, it is possible to add strength to the words 'my town' or 'our town'. This is the

reason to feel proud of one's town but also to be responsible for it. Shaping the space in accord with the above concept helps to improve considerably social relationships and reinforces bonds between the town's residents.

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