

THE CONTEMPORARY MODEL OF PRISON ARCHITECTURE: SPATIAL RESPONSE TO THE RE-SOCIALIZATION PROGRAMME

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The history of prison architecture concerns the development of various design formats. In contemporary terms, punishment and re-socialization are the two equally important purposes of a prison institution. Rightfully, the contemporary model of prison architecture may be viewed, *inter alia*, as a spatial response to the re-socialization programme. Based on a comprehensive literature review, critical discussion, and scientific description, this paper defines the main qualitative elements of prison architecture, which responds to the requirements for re-socialization of inmates, and further explains the way in which each response is provided. From these architectural and design attributes, a list of 30 indicators of the spatial response to re-socialization was established. Furthermore, by using the derived indicators, a comparative analysis of four contemporary European prisons was conducted. The results showed both similarities and differences in the spatial response to the re-socialization programme, indicating that the spatial potential for re-socialization of inmates may be developed by using various approaches to prison design.

Key words: contemporary prison architecture and design, contemporary European case examples, punishment, re-socialization, spatial indicators.

INTRODUCTION

Prison is the most complex form of punishment (Pollock, 2005), a social institution designed to meet a multiplicity of functions (Galtung, 1958), a mixture of personalities, background stories, ways of thinking, and living habits motivated by the common desire to be free. Prison is also a physical environment with controlled closed and open areas in which individuals are forcibly confined. Through spatial elements and characteristics, prison architecture reflects the bonds between typology, function, and content (Crnič, 2012), while its evolution reflects the changing societal attitude towards crime and punishment (Johnson, 2013). Good prison architecture allows for the development of good relationship between staff and prisoners, provides space and opportunity for a full range of activities, and

offers decent working and living conditions (Lord Hurd of Westwell, 2000).

Further, Pevsner (1986) argued that prison and hospital programmes have a lot in common. Developing from the 18th century analogy studies (Dixon, 1850), the meaning of the two types started to significantly overlap during the post-war Treatment Era in the United States, when the "medical model" of prison was born, based on the belief that convicts are merely sick individuals, while their cure is a matter of finding a suitable treatment. The parallels between innovative health centres and progressive prisons are as obvious as are the similarities between traditional hospitals and penal institutions. Both are inscribed with narratives about the individuals confined within them, their supposed characteristics and how they are expected to behave (Jewkes, in: Simon *et al.*, 2013).

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Unfavourable social circumstances and an individual's psychological state define the risk of individuals acting beyond legal boundaries as well as their behaviour in prison. On the other hand, the imprisonment itself may in different ways lead to the social exclusion of ex-prisoners. In fact, prisoners and their families appear to be some of the most disadvantaged people in the modern society, even before imprisonment takes place (Murray, 2007). An important role of the contemporary prison is to apply the concept of re-socialization by which an existing identity or social role is adjusted, altered or replaced, by retraining a person psychologically to fit the expectations and behaviour of the common society (Hohnen *et al.*, 2012). This inclusion, however, will be successful only when the society accepts the prison and the prisoners.

PUNISHMENT AND RE-SOCIALIZATION

The general association with the meaning of a prison institution developed until the mid-18th century is punishment, often corporal. Prison reform and the work of several reformers, such as that of John Howard and Jeremy Bentham (Dixon, 1850; Johnston, 2009), provided more humane treatment of prisoners, improved hygienic conditions, introduced single-celling established to reduce chaos, and raised hope for individual reform, accentuating positive aspects of work and changes in the administration system and criminal law. The turn of the 18th to 19th century was marked by the transition to statutory prison sentencing and by the introduction of the principle of not publicizing the penalty. On 22 January 1840, according to Foucault (2004), the body was "freed" from torture; this was the day when the reformatory at Mettray was opened. The philosophy of imprisonment significantly changed in the 19th century; prison was seen as redemptive and capable of changing the individuals within to become better people (Conley, in: Pollock, 2005). The separation and silence of the cell, in which the convict was confronted with himself, gradually became the main corrective measures. The additions to secure the "deserved suffering" (e.g. darkness, lack of space, humidity, or cold) started to decrease until the prison punishment finally obtained its present form: deprivation of liberty for a certain period of time (Kanduč, 2003).

While explaining the approaches to interpret punishment, Pollock (2005) emphasised other important characteristics of incarceration unrelated to punishment: incapacitation, which prevents an individual from inflicting further harm for at least as long as the individual is under control, and rehabilitation. Rehabilitation is defined as the internal change that results in a cessation of the targeted negative behaviour. It may include the punishment as a tool of reform (behavioural modification) and other interventions which are not painful, such as self-esteem groups, education, or religion, for example (Pollock, 2005).

The accomplishment of the difficult goal of changing strong habitual behaviour and attitudes (Johnston, 2009) certainly contributes to the (re)integration of ex-prisoners, but there is another significant factor – the outside society that influences the overall success of the process. Foucault (2004) argued that the conditions to which free inmates are faced (such as forbidden others, or the inability to find

work) necessarily condemn them to recidivism. In this sense, the prison produces delinquents and encourages their organisation. Garland (1990) addressed the wider scope of events in prisons, such as psychological and physical violence and fatal injuries, and noticed that the exclusion from the society is, in some cases, immoral and inadmissible. The same author concludes that many prisoners are not a danger to the society and could be reintegrated into the society under certain conditions, and proposes that the prison sentence could be, in some cases, replaced by other penalties. Baratta (1991) suggested that, in terms of social reintegration of a prisoner, the best prison is no prison: a prison that is nonexistent. Stating that the "shorter is better", the author proposed fewer custodial sentences, shorter sentences, and fewer "confinements" or closed prisons.

On the basis of these considerations, it may be concluded that re-socialization encompasses rehabilitation as well as the activities involving the society outside the prison. The two aspects of the re-socialization programme meet and mix in the prison environment.

CONTEMPORARY PRISON ARCHITECTURE AND RE-SOCIALIZATION

Contemporary prison architecture, set in a civilized and humane socio-political milieu, can be viewed as a connection between two equally significant, yet contradictory (Hohnen *et al.*, 2012), purposes of incarceration. The prison provides the spatial and social context within which the punishment and the deprivation of freedom occur. At the same time, it is the environment in which the re-socialisation programme is conducted. Observed from the perspective of designers (who generally view prisons merely in terms of a building type), the value of contemporary prison architecture depends not only on the typical design principles, but also on sociological, psychological, and ecological aspects.

The contribution of contemporary prison architecture and design to the rehabilitation of prisoners and their integration with the outside world may be explained by several attributes. These are: Location; Spatial concept and design; Appearance of the prison as a whole; Accommodation cells and blocks; and Content and functionality.

The Location shapes the social impact of a prison on the external environment and, vice versa, and hence affects re-socialisation.

Isolated locations, presumably situated in the natural environment, provide the inmates with the therapeutic effects of the landscape. Nevertheless, accessibility, transport communications, visit rate, and links with external institutions (e.g. court or hospital) and the public require special attention when a prison is located far from the built environment. The integration, on the other hand, allows for better links, shorter distances and potentially firmer relationship with the public, but at the same time brings to the fore the deliberation on community's thoughts and feelings (Jewkes and Moran, 2014b). The spatial concept and design, and the appearance of the prison as a whole may, to a certain extent, alleviate the negative attitude towards prisons and prisoners; nevertheless, external factors, such

as local stakeholders and decision makers, have a more important role in achieving this goal. The prisoners' opinion on the obvious dilemma whether it is better to isolate or integrate the facility with the existing built environment still needs to be researched.

The characteristics, especially natural, social, and cultural values of the immediate surroundings, are also the factors that impact the prisoners and the re-socialisation programme.

The spatial concept and design of the contemporary prison should give a message to those arriving to it, i.e. that they are worth something and entitled to treatment that is respectful and humane, as they should give a message to those working there that the people they are guarding are fellow human-beings (Baroness Stern, in: Simon *et al.*, 2013).

The prison format with its main characteristics: size, layout, and volume, has an important role in the creation of a socially functional environment.

Referring to the research results, Jewkes and Moran (2014b) suggest that prisons are healthier, more humane, and more effective when kept to a modest size.

The layout is in direct function of achieving a functional spatial and social context; at the same time, it also provides an efficient application of safety, security, and surveillance measures, while the goal to "punish" through form loses its significance in the contemporary design.

Distribution of volumes, their form, and materialisation shape inmates' impression, create analogy with external built entities, and enable better interaction among various prison contents. Daylight, colours, flexibility, and the level of openness impact prisoners' well-being and perception, as one of the two basic psychological stages (Vasilski, 2013).

Equipment, size, and materialisation of outdoor prison spaces form the image which inmates tend to compare with the motifs existing in the external environment. Landscape design should be based on the measures to draw the surroundings into prison space and to draw the vegetation into the prison interior, with the common goal to raise the awareness and enhance the sense of belonging to the outside world (Kosorić, 2011).

The bars and the wall are both security and design elements. While the bars are reminiscent of a cage, both from the inside and the outside, the wall is reminiscent of a clear separation and a firm border (observed from the outside), i.e. a forbidden free territory (understood from the inside). Contemporary prison architecture should find the way to alter the rooted interpretations by applying interventions in the physical characteristics of these two typical prison elements.

The effects of design elements are joined in the **appearance of the prison as a whole**. From the outside, the prison appearance should give two equally important messages: first, that those who reside inside are there for their punishment and correction; second, that they are human beings who deserve "one more chance". In practice, when contemporary prisons are given a pleasant aesthetic appearance, this chance will, more probably, be their second

chance. In Norway, the leading country in developing new, humane prison architecture, the recidivism rate is 20%, while, for comparison, in US and Great Britain it amounts to 50–60% (Adams, 2010).

Indeed, architectural and aesthetic features matter to most people in prison's wider community (Jewkes and Moran, 2014a); design which enhances dignity and promotes rehabilitation through a normalized aesthetic may not appear sufficiently punitive to the public with an appetite for punishment (Jewkes, in: Simon *et al.*, 2013). A compromise can be achieved by involving the external community in the design concept formulation. Apart from the obviously needed unobtrusive expression, prison architecture should establish a proper relationship with the immediate built environment, where visual and aesthetic integration would have an advantage over intrusive accentuation.

Accommodation cells and blocks are the key elements in the prison social and spatial organisation. The cell is the "first place" of prison facility, "the home within a home", the basic personalized space. Cell features, such as size, capacity, daylight, organisation, materialisation, furniture and equipment, safety, security and surveillance, all impact the production of the psychological response. The accommodation block in social terms represents the "first neighbourhood" in the prison living environment, which means that the characteristics such as the number of inmates, the existence of common spaces, or adjustment to various groups of users, all have an impact on the re-socialization process.

Re-socialization-oriented prison **content and functionality** reflect the dynamics of the life outside the walls. Prisoners are compulsorily or voluntarily grouped according to their age, gender, common profile, and interests. A progressive prison environment is enriched by the introduction of "second" and "third" places, typical for healthy communities (Kosanović *et al.*, 2015), and by their diversification, especially of "third" places.

There is a whole range of outdoor or indoor, single or group activities that help an individual in the prison to rehabilitate, (re)socialize and prepare for the (re)integration into external conditions. These include: therapies, work, education, vocational trainings, sports and leisure, religious practice, hobbies and arts, even shopping. Zoning of these activities should include their physical determination to the point of separation, just as this is the case in the outside world.

Various indoor and outdoor common spaces enable prisoners to satisfy their "normal life" requirements and to (re)develop social skills at the same time. The existence of in-prison indoor or outdoor public activities and related spaces, such as that of a training centre or a cultural point, helps prisoners to establish tangible links with the external community and institutions. Extending the programme beyond the physical boundary of a prison facility, such as the purpose of going to work, is even more beneficial. Well-developed spatial communications and mobility assist in connecting the aforementioned activities physically.

INDICATORS OF THE SPATIAL RESPONSE TO RE-SOCIALIZATION

The aforementioned characteristics of prison architecture and design allow for the establishment of indicators based on which the type and scope of the spatial response to the re-socialization programme may be analysed. Below, 30 indicators are grouped into five categories corresponding to the main attributes of prison architecture and design (Table 1).

Table 1. List of indicators of the spatial response to re-socialization

Category	Indicator
LOCATION	1. Prison isolation/integration with the existing built environment 2. Characteristics of the immediate surroundings
SPATIAL CONCEPT AND DESIGN	3. Prison size/capacity 4. Layout characteristics 5. Form characteristics 6. Daylight quality 7. Characteristics of building materials 8. Application of colour and artwork 9. Correlation between surrounding and prison space 10. Correlation between outdoor vegetation and prison interior 11. Available size of outdoor areas 12. Materialisation of outdoor areas 13. Characteristics of urban furniture 14. Analogy to motifs typical of the outside world 15. Existence of bars 16. Existence, appearance and visibility of the wall
APPEARANCE OF THE PRISON AS A WHOLE	17. Design aesthetics 18. Relationship with the immediate built environment 19. Impression about the prison from the inside
ACCOMODATION CELLS AND BLOCKS	20. Number of persons per cell 21. Standard cell size 22. Cell design, materialization, equipment, and daylight 23. Number of cells/inmates per block
CONTENT AND FUNCTIONALITY	24. Adjustment to age, gender, and security level 25. Analogy with day-to-day life outside the walls 26. Programme diversity 27. Characteristics of spaces for common activities 28. Establishment of links with external institutions 29. Inclusion of the public 30. Development of spatial communications and mobility

COMPARATIVE ANALYSIS OF CONTEMPORARY PRISONS

Four contemporary examples of European prisons were selected to demonstrate the application of the established indicators in determining the spatial response to re-socialization; the comparison enables the study of similarities and differences in the response characteristics (Table 2). The selection is based on the availability of information, geographical settings (all examples are from the countries with low recidivism rates), and positive

professional opinions and reviews. These examples are the following:

- Leoben Justice and Detention Centre in Austria by Josef Hohensinn of Hohensinn Architektur, completed in 2004 (Lewis, 2009),
- Halden Prison in Norway by Erik Møller Architects and HLM Architects, opened in 2010 (Adams, 2010; Fassino, 2012; Vinnitskaya, 2011),
- East Jutland State Prison in Denmark by Friis & Moltke A/S, completed in 2006 (Brun, 2013; Friis & Moltke), and
- New Lenzburg Central Prison in Switzerland by Bollhalder&Eberle Architektur, completed in 2011 (Serafin, 2011; Bollhalder & Eberle Architektur).

DISCUSSION

Four cases of contemporary prisons were analysed and compared to determine the similarities and differences in the spatial response to the re-socialization programme.

There is no universal recommendation for **location** selection; the comparative analysis of new examples of prison architecture confirms that both isolated and integrated locations have their advantages. Moreover, there is a conjunction between location and some other design issues, such as the overall concept, the transferred outside-world motif, or the tendency to draw near or dissociate the external and prison space.

The spatial concept and design of contemporary prison clearly differ from the past models which primarily reflected punishment, security and surveillance; modern technologies and new psychological and social views brought greater freedom in design. However, the prevailing rectangular, atrium, and branched layouts were noticed. The mainly compact form of separate structures and their envelopes reflects contemporary architectural trends in general, and, most likely, represents the response to the local natural settings. The structures built on orthogonal plan are often grouped in a way to form atria with courtyards. The applied method is very efficient to optimize daylight level increment, as well as for bringing the surrounding landscape inside the prison.

The dynamic form and diversification of volumes mimic the vivid built environment and create analogy with active lifestyle; on the contrary, compact forms and concentration of spaces in a single structure resemble rigidity and strictness.

Construction materials applied in the studied examples vary from traditional, local, and natural ones to more modern and universal ones. The glass is used variably, from a modest to a greater extent (Figure 1).

The colour in contemporary prison architecture is applied in a meaningful way and carefully. Artwork is applied to the point of becoming a basic requirement in the contemporary prison design.

The size of prison exterior is adjusted to the overall design concept, varying from the countryside settlement-like concept with abundant outdoor areas, to the imitation of an urban residential block with a compressed open

Table 2. Comparative analysis of the re-socialization potential of four European prisons

	LEOBEN	HALDEN	EAST JUTLAND	NEW LENZBURG
1	Location in the city suburbs	Isolated, remote location	Rather isolated, remote location outside the city	Location within the city boundaries
2	The prison is surrounded by urban tissue from three sides; the southern part is in proximity of motorway and woodland	The prison is surrounded by woodland	The prison is surrounded by agricultural land and farms	The prison is surrounded by agricultural land
3	205 inmates	252 inmates	228 inmates	107 inmates
4	Rectangular and atrium layout	Branched and atrium layout	Branched and atrium layout	Rectangular layout
5	Jagged composition of compact forms and open space partitions	Main longitudinal structure joined with four branches	Multiplied sections of jagged atrium-like structures	Compact, monolithic, longitudinal, all-in-one structure
6	Abundant daylight in the interior	Sufficient daylight in the interior	Sufficient daylight in the interior	Scarce daylight in the interior
7	Materials: concrete, wood and glass	Materials: wood and brick	Material: native brick	Materials: concrete and local slate
8	Colourful interior spaces, wall murals, woodwork, artistic objects	Coloured surfaces used to demarcate space purposes, large-scale photographs and graffiti	Neutral colour scheme, paintings and an artistic "hole in the wall" in the prison chapel	Modest use of colours and wall artwork
9	Drawing the surroundings near prison space achieved by its position on the hill	Exterior space partially represents an extension of the surrounding woodland	Exterior space designed as a continuation of the cultivated landscape	Prison space is cut from its surroundings
10	Integration of the vegetation with and the interior achieved partially, due to the lack of tall trees	Drawing the vegetation into the prison interior achieved by atrium layout and tall trees	Drawing the vegetation into the interior achieved partially, due to the lack of tall trees	Drawing the vegetation into the interior not achieved
11	Modest size of outdoor space	Abundant outdoor space	Abundant outdoor space	Scarce outdoor space
12	Outdoor materialisation: paved and green ground areas and vegetated roof	Outdoor materialisation: large grassland areas, gravel, middle and tall vegetation	Outdoor materialisation: mostly grassland, paving, water body	Outdoor materialization: space is "sealed" with concrete, vegetation is scarce
13	Urban furniture: cast concrete benches	Urban furniture: benches, overhangs, trash cans	Urban furniture: benches and tables	Urban furniture nonexistent
14	Resemblance to a dense urban residential area	Resemblance to motifs of a town, a natural forest and a cultivated garden	Resemblance to motifs of a settlement, a square, a garden lake	Resemblance to motifs typical of the outside world not achieved
15	Barred windows	Windows without bars	Windows without bars	Barred windows
16	Discreet concrete wall appearance from the outside; inner spaces seems "pressed" by the wall	Concrete wall appearance softened both from the inside and the outside with landscape features	Concrete wall appearance softened with its organic form, both from the outside and the inside	Concrete wall almost invisible from the outside; inner space seems "pressed" by the wall
17	Contemporary design, light and open	Simple and deliberated design	Simple and restrained design	Simple and unobtrusive design
18	Court building dominates in the surroundings, while the prison is hidden behind and partially set below grade	Design with non-obtrusive emphases, in compliance with Norwegian building tradition	Design in compliance with typical Danish architecture and settlement pattern	From the outside, modest visibility and unobtrusive appearance achieved with below-grade construction
19	Dynamic appearance from the inside	Synergy with the cultivated nature from the inside	Impression of monotony from the inside, due to equal spacing and uniform design	Rigidity and impression of entrapment from inside
20	Mostly single cells	Mostly single cells	Single cells	Mostly single cells
21	Standard cell size: N/A	Standard cell size: 10 m ²	Standard cell size: 12.6 m ²	Standard cell size: 12 m ²
22	Cells with a sanitary unit, white walls, contemporary simple wooden furniture, refrigerator, TV; sufficient to abundant daylight	Cells with a sanitary unit, white walls, contemporary simple wooden furniture; sufficient daylight	Cells with a sanitary unit, white walls, wooden furniture, refrigerator, TV; moderate daylight	Cells with a sink, toilet, bed, table, chair, cabinet; mostly white walls, few coloured surfaces; sparing daylight
23	10 inmates per block	Up to 12 inmates per block	Up to 6 inmates per block	3 or 10 inmates per block, depending on age/gender

24	Adjustment to age, gender and security level	Adjustment to security level	Adjustment to security level	Adjustment to age, gender and security level
25	Analogy with "urban living"	Analogy with "contemporary living in the village"	Analogy with "living in the countryside"	Analogy with "basic living", without spatial association
26	Programme includes: cooking and dining, washing-up, socializing, work, education, outdoor and indoor recreation, meditation, healthcare	Programme includes: cooking and dining, washing-up, cleaning, socialising, work, education, religious activities, shopping, leisure-time activities and hobbies, sports and recreation, nature walks, private visits, healthcare	Programme includes: cooking and dining, washing-up, cleaning, gardening, work, education, religious activities, sports and recreation, shopping, leisure-time activities, healthcare	Programme includes: cooking and dining, washing-up, work, education, sports, healthcare
27	Common spaces: kitchens, dining rooms, balconies, laundry rooms, areas for random meetings and socialising, sports hall, fitness facilities, outdoor sports fields, library, classroom, meditation space	Common spaces: kitchens, dining and living room areas, laundry rooms, multi-purpose gym, workshops, indoor area for religious purpose, cultural centre, guest house and visit rooms, classrooms, shop, library, designed walking paths, outdoor yards	Common spaces: kitchens, dining rooms, laundry rooms, table tennis and billiards rooms, various workshops, classrooms, computer rooms, small gyms and large central gym, church, prayer room, library, supermarket, music room, visiting area, outdoor yards	Common areas: kitchen, dining room, laundry room, games room, recreation room, classrooms, outdoor yard
28	Work provided outside the facility; various external institutions operate in prison	Links with external institutions: N/A	Links with external institutions: N/A	Links with external institutions: N/A
29	Public included in acceptance and work programmes	Inclusion of the public: N/A	Inclusion of the public: N/A	Inclusion of the public: N/A
30	Division of outdoor space into smaller segments limits communications/movement	The established main footpath connects buildings, inmates and landscape	Inmates move within one of the two large fenced areas demarcating the security level	Communications and movement only inside the building



Figure 1. The interior of the entrance building in Leoben prison (© paul ott fotografiert)



Figure 2. Leoben prison façade and designed courtyard (© paul ott fotografiert)

space (Figure 2). Larger exterior areas enhance spatial communications and mobility, and contribute to more successful mirroring of the outside life. Observed from the inside, the size of the available outdoor space directly impacts the perception of the whole complex. The ratio between green and paved areas varies; similarly to the overall size, it is compatible with the general concept. Simple and modern urban furniture most often includes benches made of wood or concrete.

The bars placed over glazed surfaces are the best indication of the contemporary prison architecture's tendency to steer away from the traditional meaning; out of four analysed cases, two were free of bars. On the other hand, the concrete wall is still present in all cases. Its appearance, however, is shaped with attention; by carefully levelling and softening the lines, it now seems less blatant. It is expected that the future improvement in the wall appearance will be achieved by its greening.

Appearance of the prison as a whole is treated as a sensitive issue. New architecture tends to be discreet, simple, less visible, unobtrusive, and aesthetically pleasing. Integration with the surroundings is achieved by application of local materials and patterns interpreted in a contemporary way.

Accommodation cells and blocks remain the basic part of the prison complex. The series of single-cell purpose transformations throughout history (from the application of corrective measures, improvement of hygienic conditions, isolation for punishment or achievement of better control over the prisoners, separation for prisoners' rehabilitation, etc.) finally resulted in its establishment as a contemporary response to the necessity for privacy while resting, sleeping, thinking, learning, or maintaining hygiene.

The average size of a cell in the studied examples is 12.6 m², meaning that the comfort level is often above the prescribed minimum. Cell design, materialization, and furniture are simple and minimalist. Daylight level and the corresponding window size vary from one case to another. The smaller number of cells (inmates) per block enables the formation of a neighbourhood-like atmosphere and stimulates the socialization within an optimally-sized group.

Content and functionality of contemporary prisons are, according to the analysed examples, adjusted to the age, gender, and/or security level. Analogies with day-to-day outside life in a specific spatial context are present in three of the reviewed examples. The spatial scheme follows the programme which ranges from a basic one to a socially opulent one. All the basic activities carried out under regular circumstances, such as cooking, work, education, or shopping, are translated to the prison environment. The tendency is to create as many common places as possible, in order to enhance the interaction and socialisation. In one of the four studied cases, work activities extend beyond the prison physical boundary; at the same time, certain public activities are carried out within the prison physical space (Figure 3).



Figure 3. The Court of the Leoben Justice and Detention Centre
(© paul ott fotografiert)

CONCLUSION

Contemporary prison architecture is a multi-layered and multi-scalar contributor to the prisoners' positive psychological and behavioural change and their acceptance

by the common society. Based on the considerations as to the meaning and purpose of the contemporary prison, the key qualitative elements of architecture and design that impact the re-socialization of inmates are identified. These are: Location; Spatial concept and design; Appearance of the prison as a whole; Accommodation cells and blocks; and Content and functionality.

The study has shown that the socially functional environment of a prison may be achieved by applying various design approaches. In this regard, the establishment of a common format of new prison architecture seems unnecessary; instead, the model of contemporary prison architecture may actually be interpreted, *inter alia*, as the spatial response to the ultimate requirement for re-socialization. Architecture responds to the space-time context in which it is set, and prison architecture is no exception.

Prisons built in the 20th century, or earlier, open a new research topic on harmonization with present-day requirements. On this point, the set of indicators, established in order to analyse the response of contemporary cases, may be used to determine the potential for re-socialization of older existing facilities, with the aim of future improvement. Finally, these same indicators may also be used as guidelines in new prison planning and design.

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