



Enhancing of Heritage Awareness and  
Sustainability of Built Environment in  
Architectural and Urban Design Higher Education

# STATEMENTS



for Teaching through Design  
for Sustainability of the Built  
Environment and Heritage  
Awareness



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**2021**

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# Statements for Teaching through Design for Sustainability of the Built Environment and Heritage Awareness

IO3 lead: Vladan Djokić, Ana Nikezić, UBFA

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# INTRODUCTION

HERSUS project Intellectual Output 3, titled "Statements for Teaching through Design for Sustainability of the Built Environment and Heritage Awareness" presents a strategy containing (1) necessary qualifications that an architect has to obtain in order to be competent for architectural and urban design, as well as (2) up-to-date qualification that architectural educator needs to obtain in order to advance teaching about the sustainability of the built environment and heritage awareness. The output elaborates proposals regarding the contents and the methods of teaching of the architectural education in the initial defined fields: Sustainable Reconstruction in Urban Areas, Adaptive Reuse and Resilience and Climate Change. Having in mind that the development of IO1 and IO2, as well as, HERSUS Webinar have posed different challenges for all HERSUS researchers, the IO3 aims at reaching a consensus among the HERSUS consortium on concepts and fields of action relevant to sustainability and heritage. In this sense, the initially defined fields are reviewed and hence, the IO3 enables a consensus established through a multigeographical and multicultural perspective across Europe.

## GENERAL BACKGROUND:

In the 21st century, the cities urbanisation is passing through significant changes, and the practical arena of architectural and urban design requires the advancement in teaching about the sustainability of the built environment and heritage awareness. The main characteristic that could be distinguished behind the previous analysis is that the present teaching methods and practices of sustainability and heritage are widely questioned and have an increasing interest of the management of HEIs. More specifically, this issue has three-fold complementary perspectives:

- (1) the contemporary content of the teaching of the subject areas,
- (2) the qualitative and quantitative position of the subject areas in a school curriculum, and

- (3) the accomplished methods for the transmission and crossing of the knowledge of the subject areas.

In this context, a particularly important objective is to clarify this new condition of sustainability of the built environment and heritage teaching and discuss its characteristics.

The idea for IO3 arose from the need to bring together teaching staff and experts in disciplines of the built environment to formulate the new unique students' profiles. Statements for teaching bring the innovative element through the implementation of interdisciplinary teaching based on learning by design methodology. Upon completion of the IO3 publication, the HERSUS target groups (students/teachers/trainers/tutors) could use this book to gain a clearer picture of specific training and teaching activities that can enable the alignment of the needs of the practice and teaching of the sustainability of the urban and architectural heritage.

Recommendations on education for the sustainable architectural and urban design sector are produced. The strategy also builds on the results of Seminar C1 – SWOT Analysis. These tools serve to provide a coherent set of information and a programme of advanced teaching modules for architectural and urban design educators. A step closer to reaching an integral professional profile of an architect is primarily the case of thematic enhancement and specialisation rather than structural change of study programmes. This can be achieved through the introduction of different research and educational areas that follow the contemporary course of theory and practice. The project is striving to create a new innovative educational framework that can integrate vital educational challenges in the field of architectural and urban design. The aim is to link scales, to challenge different types of problems, to generate sustainable-based approaches, and to

It is expected that educators would create a new way of thinking and teaching of different European spatial contexts through the shared experience. The IO3 will be a set of recommendations for partners, whose aim is to strengthen and expand cooperation with practice and to strengthen and disseminate the idea of interdisciplinary teaching with respect to the immediate environment of different cultural contexts. Development of teaching strategies will contribute to the better understanding of needs in terms of defining a new professional profile of the students through the exchange of experiences between teaching staff, public and private sector on M1, C1 and E1 in terms of (1) Environmental and Contextual Issues relating to Architecture as well as (2) Collaboration & Interdisciplinarity in Architecture.

In the course of redefining the professional profile of architect through the HEI system, there is a constant striving towards achieving an integral profile - one that will have the capacity and skills:

- (1) to connect different scales (from urban to architectural),
- (2) to identify different types of problems and solve them through the design, and
- (3) to make our environment and cities sustainable for the future.

This output is the primary input for the development of "Book of courses" which will be developed by the academic institutions as a part of the project (IO5). It will be presented in the form of a pedagogical strategy and should be disseminated in all schools of the participating countries and to the broader audience as well. Therefore, the strategy will be available for discussion via the "HERSUS Sharing Platform" (IO4) and HERSUS Website among educators, professionals, and architects from all over Europe.

Based on activities M1, C1 and E1 and gathered experiences from IO1 and IO2, the Statements for teaching will provide ground for discussing content, pedagogical methods, guidelines and future structure of curriculum for teaching within the partner organisations in the relevant fields. IO3

should define and elaborate on professional competencies which need to be developed both by (1) architect/urban designers, and (2) architectural educators.

The Strategy will consist of two parts. The first part of the report connected to a new profile of an architect/urban designer should define both (1) general skills, and (2) specific skills which are needed to be developed through the implementation of new courses. The strategy should formulate students' profiles so that they are trained in the broad architectural domain, that possess technical, technological, socio-humanistic and artistic skills and, therefore, that can contribute to the socio-environmental challenges of the 21st century. The second part of the report connected to a new profile of architectural educator should define both (1) general skills, and (2) specific skills which are needed to be adopted among the educators before the implementation of new courses. The strategy should formulate educators' profiles so that they can be responsible for the improvement of the education and training of future architects/urbanists to enable them to meet the expectations of 21st-century societies worldwide for sustainable human settlements in different cultural contexts.

The IO3 study is prepared in a form of publication which consist of following sections:

Introduction: General Background, Research Phases and Methodology, Study Development,

Teaching Vademecum on Heritage and Sustainability: Statements on Notions, Ideas, Design Strategies, Design Tactics, Tools and Techniques, and Heritage Types relevant for the HERSUS scope through defining:

- General Definition/Explanation of Notion, Idea, Design Strategy, Design Tactic, Tool and Technique, and Heritage Type,
- Literature Selection relevant for Notion, Idea, Design Strategy, Design Tactic, Tool and Technique, and Heritage Type,
- Content WHAT? – Defining relevant content for learning and teaching on specific Notion, Idea, Design Strategy, Design Tactic, Tool and Technique, and Heritage Type,
- Methods HOW? - Defining relevant methods for learning and teaching on specific Notion,



Idea, Design Strategy, Design Tactic, Tool and Technique, and Heritage Type,

- Goals WHY? – Defining learning goals in line with specific Notion, Idea, Design Strategy, Design Tactic, Tool and Technique, and Heritage Type,

- Course Type – Mark course type/types which could engage specific Notion, Idea, Design Strategy, Design Tactic, Tool and Technique, and Heritage Type,

- Scale – Mark scale/scales which is relevant for learning on specific Notion, Idea, Design Strategy, Design Tactic, Tool and Technique, and Heritage Type,

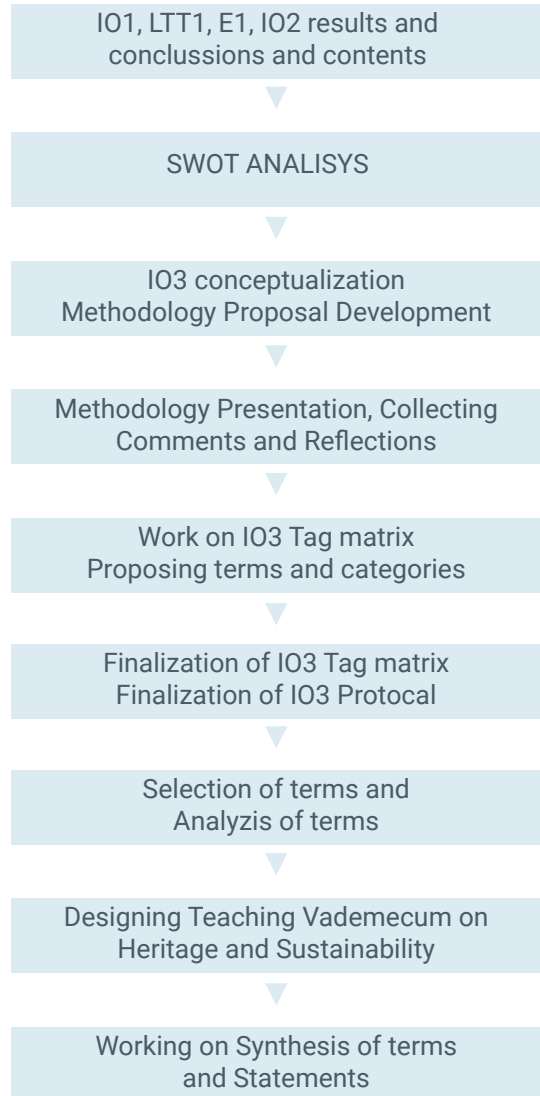
- Learning outcomes – describe expected learning outcomes for students/competencies which they could obtain through learning on specific Notion, Idea, Design Strategy, Design Tactic, Tool and Technique, and Heritage Type,

- Teachers' Competences – explain necessary competencies of teachers who could be engaged in teaching process of specific Notion, Idea, Design Strategy, Design Tactic, Tool and Technique, and Heritage Type.

Review of Statements/Strategy - defining and elaborating on professional competencies which need to be developed both by (1) architect/urban designers, and (2) architectural educators based on Teaching Vademecum on Heritage and Sustainability – synthesis of analysis.

The basic idea of the central part of IO3 entitled Vademecum on heritage and sustainability is reflected in a dual perspective: (a) establishing statements about the relevant notions, ideas, design strategies, design tactics, tools, techniques and heritage types, and (b) establishing statements about their importance for the domain of education. The Vademecum will present a series of analysed terms according to the structure from the proposed template and will together with IO1 and IO2 represent the basis for the later creation of the Book of Courses (IO5) through the intersection of different statements.

## RESEARCH PROCESS



# HOW TO READ HERSUS VADEMECUM STATEMENTS

1

GENERAL INFO  
ON TERM AND  
AUTHORS

2

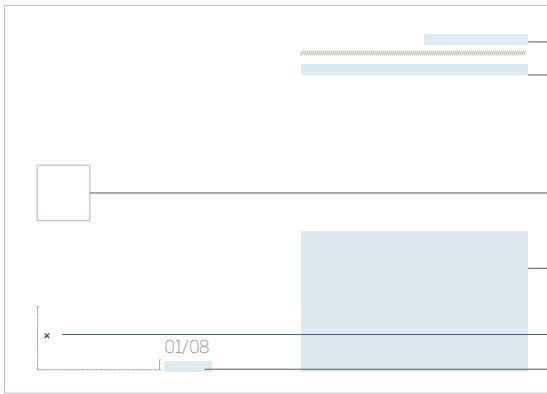
WHAT, HOW, WHY,  
BY WHOM TO BE  
TOUGHT

3

AT WHAT COURSE  
TYPE , WHICH  
SCALE AND WHAT  
OUTCOMES TO  
EXPECT

4

RELEVANT  
REFERENCES FOR  
THEORY AND  
PRACTICE

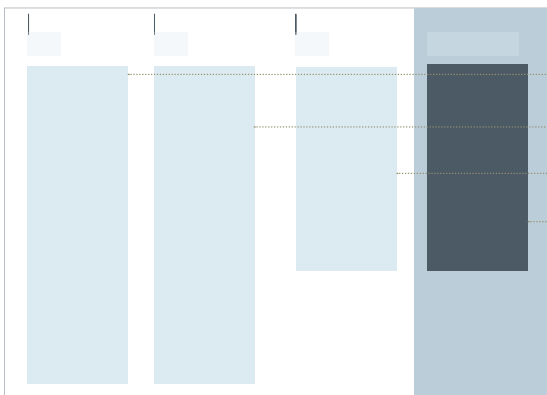


TITLE  
TRANSLATION IN HERSUS PARTNERS LANGUAGES

HERSUS PARTNERS LOGO

GENERAL DEFINITION

AUTHOR/S  
TYPE OF TERM

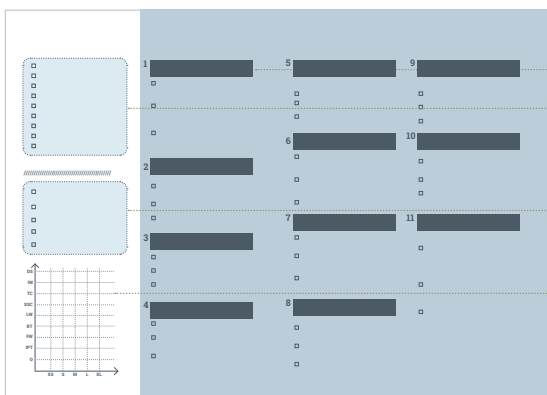


WHAT? CONTENTS

HOW? METHODS

WHY? GOALS

TEACHING COMPETENCES



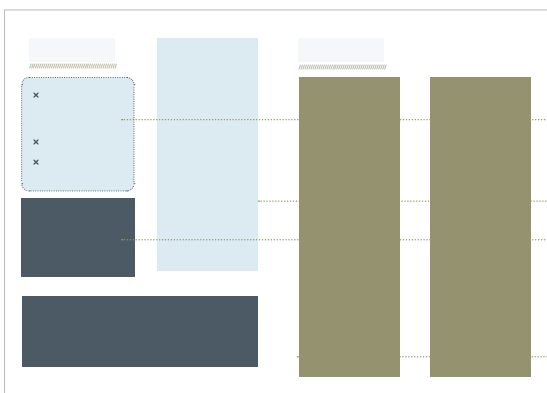
COURSE OUTCOMES

COURSE TYPE

COURSE SCALES

MATRIX - COURSE TYPE IN RELATION TO SCALE

■ □ Checklists



RELEVANT EXAMPLE ID

RELEVANT EXAMPLE EXPLANATION

RELEVANT EXAMPLE PHOTOS

KEY REFERENCES

**terms**

# NOTIONS

Cultural and Collective Memory



Urban Narratives



Resilience



Urban Patterns



Heritage genealogy



Cultural Studies



Cultural Identity



Cultural Enhancement



Cultural Heritage



UB-FA

×

Mladen Pešić

07/09

**notions**

statements

# CULTURAL IDENTITY

културни идентитет • *Identità Culturale* • Πολιτιστική  
Ταυτότητα • *Identidad Cultural*

## GENERAL DEFINITION/ EXPLANATION

**Cultural identity** is most certainly sociologically and ideologically constructed and in most cases it is part of person's self-conception and self-perception that is linked with nationality, ethnicity, religion, social or cultural class, or any other kind of particular group or identity. The concept of identity is ambiguous and it relates with the construction of a shared narrative that defines a community and differentiates them from others. At the same time culture provides diverse ways of interpreting the environment and the world, and given that identity explains and interprets the structure of the relationship between man, community and society, it can be said that identity is a kind of social mechanism of labelling and conceptualization that applies to individuals and groups and society as a whole. While conceptualising this notion in relation to the built environment it is important to observe them as two interlinked concepts (notions) that help man to evoke identity as an individual and social being. Planning and design of any built space should involve information about the activities and requirements of people who are going to use that space regarding their culture, traditions and customs. On that way cultural aspects and built environment are correlated in the process of mediating culture through spatial forms, typologies, spatial practices and representations, while creating relations between people and built environment. Built environment is therefore becoming the cultural negotiator with the ability to show itself as cultural signifier and representative. Llorenç Prats (2009) indicates that identity needs to be articulated in materiality, and heritage offers that "effective material and symbolic support for these narratives, both serving as a resource for the representation of identities and a place for its performance" (2009:1). Also according to Scheffler et al. (2009), the role of identity might follow two different perspectives; it can be seen as an "anchor" that provides continuity to development so identity is reinforced, or it is can be something that want to be changed because the "old identity is no longer productive", so identity is projected in an image that "serves as a marketing tool".

## WHAT?

### CONTENT

There are three basic facets or basic elements of any identity - contents, boundaries and contexts. Content is a basic element of any cultural identification. It has the explicit role of symbolizing or constructing a notion of the essential characteristics of a particular group or community. In fact, the content of identity is the corpus of knowledge when ideology institutionalizes and when it forms discourses. Boundaries are always important when examining this notion and there is always a selection of identity contents that a certain identity should establish in the political and cultural environment. The choice of boundaries itself depends on the context in which the identification process takes place. Although clearly set boundaries do not frame whole groups of specific culture, i.e. societies of identity. Quite the opposite, identity is always constructed in relation to other opposing identities. Identity is always constructed with the help of certain cultural contents and symbols, but always in relation to a specific context. This in fact means that identity is not defined only as a set of certain cultural material and content, but that the strategy of establishing differences in relation to another identity is an important part of defining identity. When exploring heritage and built environment it is important to examine the role of **cultural identity** and interconnection between identity and cultural heritage within this process because **cultural identity** as a notion contributes in creating the city's public image while highlighting transmitted traditional cultural features.

## HOW?

### METHODS

The ambition to view architecture and urbanism as the bearer of a certain identity first of all implies a departure from interpretations that understand them as an autonomous practice and discipline, closed system of meaning and value. It is very important to say that functional, stylistic, morphological, aesthetic and in general formal and poetic aspects of architecture that are shaped through history, theory of form, aesthetics and different interpretations, cannot be viewed outside the social, cultural and political context within which they were created. Architecture as a practice and discipline functions through a system of cultural identifications and is a socially sanctioned form of presenting and constructing knowledge. In this way, architecture determines and organizes the categorical order of reality. In that sense, the theorizing of architecture as the bearer of certain social identities presupposes a step out of focus, which is only interested in aesthetic, stylistic, functional-typological or technical aspects of architecture. It can be said that architecture is in fact a system of constructing circumstances that do not exist independently and that architecture does not actually depict, but constructs and legitimizes every social reality and every ideology.

As essential premises in the defining and research of identity, the several facts should be taken into account, that identities must be viewed as a process and not as a state, also as an interaction and through the interrelation between specific identity and context. In addition, the first challenge to the study of identity lies in the fact that each identity is, in a sense, the construction of the researcher/ reader who studies it. This means that a certain identity is not something that is characteristic of a specific community, but it is a theoretical analytical tool that is used in order to create knowledge, confirm ideological, political or some other ideas.



## WHY?

### GOALS

Each identity enables a social field to be organized and structured through culture, in such a way that the community within that field shares a certain system of values, beliefs and convictions. When studying identity, many theorists start from two mutually independent dimensions of identity - nominal and virtual, which, however, are not static but are subject to constant interaction. These two dimensions are united in the constant production and reproduction of identity and its boundaries. This means that built environment as an important segment of culture participates in the establishment of identity in the same way as political practice, philosophy, history, etc.. When it comes to identity, it must be noted that identity, as a rule, functions as a politically motivated knowledge that is always created within the institutional framework. In that case, these frameworks not only legitimize it, but also shape a concrete identity as socially comprehensible knowledge. In this context, architecture can be seen as an institutionalized regime of knowledge production, which is only one of the formation regimes of identity expression. In that case, architecture almost always intersects with other discourses, thus producing the same knowledge and power, through systems of communication, registration, regulation and archiving. At the same time, architecture as a discipline has an independent social position that allows the various cultural roles and identities it assumes to be set as more permanent structures in relation to the abstract ideological dimension presented by political theory and practice. Any "identity" as knowledge and as an ideological structure requires its own positive construction, which is built in culture, science, politics in the domains of the visual and thus in architecture.

### TEACHERS' COMPETENCIES

In this case teacher should have wide background in social sciences and humanities in order to comprehend the notion of **cultural identity**. Also it would be useful for the teacher to have understanding of spatial processes that are in connection with urban planning, urban design and architecture in general. Expert knowledge for particular subjects should be included but it should not be disconnected from general issues regarding the contemporary built environment.

## COURSE TYPE

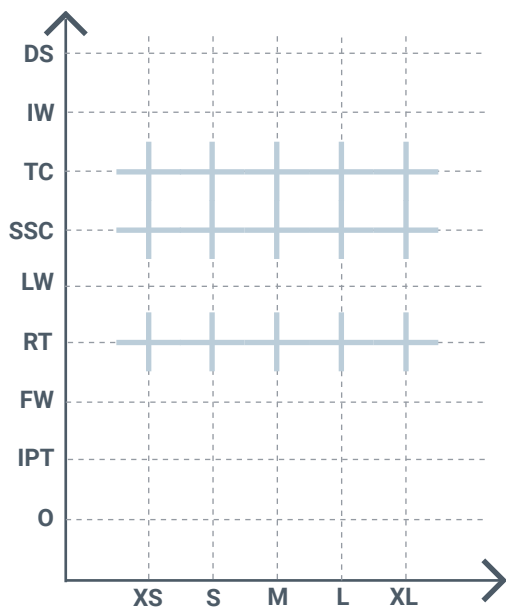


- Design Studio (DS)
- Intensive Workshop (IW)
- Theory Course (TC)
- Seminar (short comprehensive) (SSC)
- Laboratory work (LW)
- Research Thesis (RT)
- Field work (FW)
- Internship Practical training (IPT)
- Other (O)

## SCALE



- Construction Detailing and Interior Design Scale (XS)
- Architecture: Buildings Scale (S)
- Urban Design Scale (M)
- Urban and Regional Planning Scale (L)
- Landscape Scale (XL)



## LEARNING OUTCOMES

### 1 Ability to create architectural designs that satisfy both aesthetic and technical requirements. The student could have the ability to:

- prepare and present building design projects of diverse scale, complexity, and type in a variety of contexts, using a range of media, and in response to a brief;
- understand the constructional and structural systems, the environmental strategies and the regulatory requirements that apply to the design and construction of a comprehensive design project;
- develop a conceptual and critical approach to architectural design that integrates and satisfies the aesthetic aspects of a building and the technical requirements of its construction and the needs of the user.

### 2 Adequate knowledge of the histories and theories of architecture and the related arts, technologies and human sciences. The student will have knowledge of:

- the cultural, social and intellectual histories, theories and technologies that influence the design of buildings;
- the influence of history and theory on the spatial, social, and technological aspects of architecture
- the application of appropriate theoretical concepts to studio design projects, demonstrating a reflective and critical approach.

### 3 Knowledge of the fine arts as an influence on the quality of architectural design. The student will have knowledge of:

- how the theories, practices and technologies of the arts influence architectural design;
- the creative application of the fine arts and their relevance and impact on architecture;
- the creative application of such work to studio design projects, in terms of their conceptualisation and representation.

### 4 Adequate knowledge of urban design, planning and the skills involved in the planning process. The student will have knowledge of:

- theories of urban design and the planning of communities;
- the influence of the design and development of cities, past and present on the contemporary built environment;
- current planning policy and development control legislation, including social, environmental and economic aspects, and the relevance of these to design development.

**5 Understanding of the relationship between people and buildings, and between buildings and their environment, and the need to relate buildings and the spaces between them to human needs and scale. The student will have an understanding of:**

- the needs and aspirations of building users;
- the impact of buildings on the environment, and the precepts of sustainable design;
- the way in which buildings fit into their local context.

**6 Understanding of the profession of architecture and the role of the architect in society, in particular in preparing briefs that take account of social factors. The student will have an understanding of:**

- the nature of professionalism and the duties and responsibilities of architects to clients, building users, constructors, co-professionals and the wider society;
- the role of the architect within the design team and construction industry, recognising the importance of current methods and trends in the construction of the built environment;
- the potential impact of building projects on existing and proposed communities.

**7 Understanding of the methods of investigation and preparation of the brief for a design project. The student will have an understanding of:**

- the need to critically review precedents relevant to the function, organisation and technological strategy of design proposals;
- the need to appraise and prepare building briefs of diverse scales and types, to define client and user requirements and their appropriateness to site and context;
- the contributions of architects and co-professionals to the formulation of the brief, and the methods of investigation used in its preparation.

**8 Understanding of the structural design, constructional and engineering problems associated with building design. The student will have an understanding of:**

- the investigation, critical appraisal and selection of alternative structural, constructional and material systems relevant to architectural design;
- strategies for building construction, and ability to integrate knowledge of structural principles and construction techniques;
- the physical properties and characteristics of building materials, components and systems, and the environmental impact of specification choices.

**9 Adequate knowledge of physical problems and technologies and the function of buildings so as to provide them with internal conditions of comfort and protection against the climate. The student will have knowledge of:**

- principles associated with designing optimum visual, thermal and acoustic environments;
- systems for environmental comfort realised within relevant precepts of sustainable design;
- strategies for building services, and ability to integrate these in a design project.

**10 The necessary design skills to meet building users' requirements within the constraints posed by cost factors and building regulations. The student will have the skills to:**

- critically examine the financial factors implied in varying building types, constructional systems, and specification
- understand the cost control mechanisms which operate during the development of a project;
- prepare designs that will meet building users' requirements and comply with legislation, appropriate performance standards and health and safety requirements.

**11 Adequate knowledge of the industries, organisations, regulations and procedures involved in translating design concepts into buildings and integrating plans into overall planning. The student will have knowledge of:**

- the fundamental legal, professional and statutory responsibilities of the architect, and the organisations, regulations and procedures involved in the negotiation and approval of architectural designs, including land law, development control, building regulations and health and safety legislation;
- the professional inter-relationships of individuals and organisations involved in procuring and delivering architectural projects, and how these are defined through contractual and organisational structures;
- the basic management theories and business principles related to running both an architects' practice and architectural projects, recognising current and emerging trends in the construction industry.

## BUILT ARCHITECTURAL / URBAN DESIGN PROJECT EXAMPLE

Relevant examples that are connected to the issue of cultural identity are at the same time numerous and a few, or none. Having in mind the complexity of this notion, its cultural capital and significance along with its fluid definitions and misinterpretations it is not convenient to select proper example. This notion should be carefully studied in order to prevent its misuse in the built environment and broader discussion of heritage.

RELEVANT LITERATURE  
/ SOURCES FOR FURTHER  
RESEARCH



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