The architectural monuments of every society form a part of its cultural heritage and must be preserved for future generations. Today this process involves a range of complex challenges. The conservation of monuments entails not only assessing and evaluating those monuments but also engaging in a wide range of public relations activities. The aim of this course is therefore to help students gain a good working knowledge of architectural fundamentals as well as architectural history and theory. As such, this lecture series is divided into three broad modules:

- History and Theory
- Methods and Tools
- Concepts and Projects

During the course students will undertake a great deal of research, developing their own questions and viewpoints and gaining academic insights. They will work their way through academic tasks and apply what they have learnt to investigate a research question of their own choice.

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14

Interior Design Concepts from the Twentieth Century

Architecture and Cultural Heritage
Interior Design Concepts from the Twentieth Century

Natascha Meuser

Hochschule Anhalt
Anhalt University of Applied Sciences

Architecture and Cultural Heritage
Interior Design Concepts from the Twentieth Century

Natascha Meuser
Born 1967 in Erlangen. Architect and publisher in Berlin. Studied in Rosenheim (Interior Architecture) and in Chicago at the Illinois Institute of Technology (Master of Architecture). Doctorate at the Technical University of Berlin. Professor at Anhalt University of Applied Sciences in Dessau. Numerous publications on design methodology and the teaching of drawing for architects, as well as architectural and historical research on zoology.

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Architecture and Cultural Heritage
Interior Design Concepts from the Twentieth Century

Prof. Dr.-Ing. Natascha Meuser
Anhalt University of Applied Sciences / Dessau

Lecture for Monumental Heritage
during the winter semester of 2018/2019

Contents

Picture: Natascha Meuser

Picture: Christian Habermeier

Course Syllabus

Natascha Meuser

The architectural monuments of every society form a part of its cultural heritage and must be preserved for future generations. Today this process involves a range of complex challenges. The conservation of monuments entails not only assessing and evaluating those monuments but also engaging in a wide range of public relations activities. The aim of this course is therefore to help students gain a good working knowledge of architectural fundamentals as well as architectural history and theory. With this series of lectures, I would like to offer a guiding hand to students who wish to take a research-oriented learning approach. As such, this lecture series is divided into three broad modules: History and Theory; Methods and Tools; and Concepts and Projects.
During the course students will undertake a great deal of research, developing their own questions and viewpoints and gaining academic insights. They will work their way through academic tasks and apply what they have learnt to investigate a research question of their own choice. The aims of the lecture series are:

- To introduce heritage conservationists to the best practices in the field
- To enable students to experience, on an emotional level, each building they are working on
- To explore buildings in great depth and to challenge preconceptions

The lecture series within the master's programme Architecture and Cultural Heritage focuses on the interface of building culture, architectural history, and the real-estate industry. Students will learn how to evaluate and classify documents, in each instance pursuing a particular motivation and writing a scholarly report. The focus of the research and teaching carried out as part of the Interior Design programme is to gain and further develop a deep understanding of the restoration of interiors of historically and architecturally significant buildings.

Modules
The first module of the lecture series will introduce students to the basic principles of architectural theory and history from the perspective of heritage conservation. The lectures will place equal emphasis on actual practice.

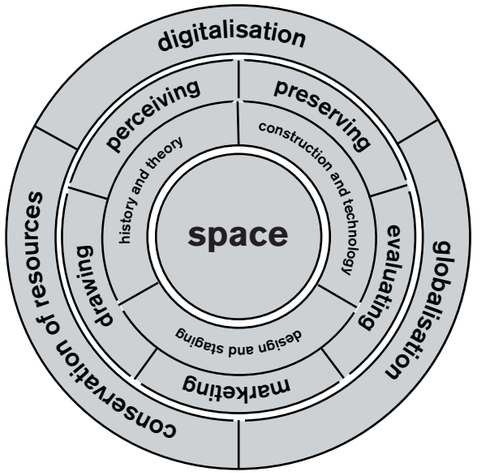
The second module will present the basic principles and methods of surveying and researching the architectural history and conditions of a building, resulting in a report produced for an academic purpose or public relations.

The third module will take the form of research-oriented learning. Students will apply what they have learnt to undertake an intensive examination of global architectural icons by answering a research question of personal choice.

Picture: Christian Habermeier

Teaching Interior Design at the Dessauer Schule

Natascha Meuser



The focus of the research and teaching carried out as part of the Interior Design programme is to revive and further develop the building approach once taught at the Bauhaus school. Walter Gropius developed his set of architectural teaching principles in 1922, before the architecture department was even established at the Bauhaus. His circular schema has been reinterpreted time and again and adapted to the challenges of subsequent epochs. With the Architekturlehre an der Dessauer Schule, I present a teaching concept that redefines Gropius's parameters for architectural training. We need to rethink what has remained of the Bauhaus, 100 years on from its founding. In other words, what impulses can the Bauhaus still offer today for the architecture of tomorrow? How do we wish to live in the future? In order to pass on the teachings of Gropius to the 21st century, we need to adapt them to contemporary parameters and requirements.

There are three influencing factors that have radically changed our lives in the last 20 years: **globalisation, digitalisation, and conservation of resources**. This is why I have made it a primary goal of my teaching to help students develop five very general but clear core skills as part of this frame of reference: **drawing, perceiving, preserving, evaluating, and marketing**, in relation to the fields of **design and staging, construction and technology, and history and theory**. The teaching focuses on a wide range of topics but clearly aims at producing a finished room or building. Students will apply the core skills in collaborative, practical exercises, becoming more attuned to the architecture of the future. Walter Gropius said 100 years ago: »the ultimate goal of all visual work is to build!«. This is how I would also like to express my approach to teaching Interior Design: »the aim of any architectural teaching is to create high-quality spaces.«
Dessau, January 2019

Breitenlohe Castle,
first recorded mention 1340
Picture: Natascha Meuser

Breitenlohe Castle,
first recorded mention 1340
Picture: Natascha Meuser

Training the Eye
Building Awareness and Engagement

A child's perception of the world is immediate, untainted by reflection. The security of a family, the sanctuary of the parental home, or the abundance of nature: a child perceives all these things as good and natural without thinking about what this perception is measured against.

I was about ten when I first realized, without of course ever having heard of aesthetics or the theory of harmony, that there were differences. I was in my grandfather's castle, which had always seemed special to me. It gave you a different kind of welcome, its rooms were pervaded by a magic that no one could resist. My aunt and uncle, who lived in the castle, made the old walls resonate like a many-voiced instrument. Each room had its own sound, and every object had its place. Yet at the same time it all felt completely effortless and natural. The centuries-old polished floors, the breakfast table in the morning sun, the simple chairs in the shady courtyard, the long corridors: the harmony of this place was incomparable. Looking back today one might say the inhabitants had come to understand the castle and had allowed its ancient pride and riches to school their awareness and vision.

The arrangement of the rooms and corridors, the interpenetration of interior and exterior, of architecture and nature – at the time I grasped all this only intuitively. Yet it was a key experience. Everything that has shaped my understanding of space and beauty I learned here, in my family's castle. Later, in Chicago of all places, I realized how strong my memories of these early experiences were. I was sitting in a lecture given by the architect Alfred Cadwell at the IIT (Illinois Institute of Technology). Cadwell had once worked with Ludwig Mies van der Rohe. As he was describing the secret of a successful garden landscape, I had a kind of déjà-vu: Suddenly I was waiting in front of the castle gate again. Waiting for someone to come down exactly sixty-six steps, to hurry across the rough cobble-stoned courtyard, and open the heavy wooden gate. What a welcome that was. You would first catch sight of the castle courtyard and then your eyes would wander upwards, scanning the building. Your steps would be directed up a long, stone spiral staircase to the second floor, where the living quarters were. This was always a sublime passage for me, arousing excitement and curiosity about what was to come.

Left: Carlo Scarpa
Gipsoteca extension in Canova, Possagno/Italy
1955–1956

During Cadwell's lecture, I learned that this little scene was what is called a sequence, in which the gaze alternately broadens and narrows, encountering surprises and then coming to rest. So what I as a child had taken for magic was simply the result of deliberate composition, and man-made? It was clear to me that I had finally found what some people refer to rather pompously as a vocation. From then on I wanted to dedicate myself to the beauty of space and nature.

How complex this work would turn out to be was something I learned only gradually in a sometimes painful process during which I realized that the greatest mistake an architect can make is to think about the interior and exterior of a building separately. Good architecture requires an eye for the whole, looking both inside – into the rooms, noticing small details, the way the light falls, a door handle – and outside, to the street, a courtyard, trees, roofs. Strangely enough it was a little anecdote that illustrated to me the significance of looking out of the window. The film director Wim Wenders, obviously a visual person by virtue of his profession, was interested in a beautiful spacious apartment in Berlin. He liked everything – the rooms, the fittings, the charm – until his gaze alighted on the house opposite. A nondescript, unremarkable 1960s building, devoid of character, not worth talking about. It was because of this view that Wim Wenders decided not to take the apartment. I can see why.

It takes a long time for the eye to become schooled enough to see the invisible qualities of a place that are never mentioned in building specifications or architectural critiques. And it takes longer still before an architect is able to design – to create from scratch – a sensually tangible harmony that gives distinction to the whole. Only few architects have succeeded in doing this. Tadao Ando's church in Ibaraki near Osaka is such a place, but also the churchlike museum rooms of Carlo Scarpa. These architects worked not only with stone and glass but also with sunrays, the shadows cast in the late afternoon, and the aloof charm of roughly polished stone. Beyond the architectural canon, too, there are examples of a creative power that, swept along by an idea, is capable of producing great things. You don't need a degree in architecture to find Ken Adam's sets perfect – the sets through which the immortal film hero James Bond moves. Adam's designs are perhaps the best example of how architecture »works«. My own work on a new project sometimes starts with these old films, or with books, music, photos, journeys. And with the memory of a ten-year-old girl in an old castle.

Pyramids in Giza/Egypt,
Pyramid of Khafre,
built in ca. 2550 BCE

Stone Architecture
A Happy Burden

Oswald Mathias Ungers, one of Germany's foremost contemporary architects, once summed up the whole of architecture in just three basic structures: Parthenon, Pantheon, and Pyramid. In his view, these three building types could be said to encompass all architecture, the Parthenon (ca. 440 BCE) representing the tent, the Pantheon (ca. 120 CE) representing the cave, and the Pyramid (ca. 3000 BCE) representing the monolith. What these fundamental structures, which Ungers regarded as the essence of all architectural development, have in common is that they were all executed in stone – be it marble, granite, or sandstone. At first glance, this may seem a banal point to make. But it is precisely our fear of the normal, and the banal, that is architecture's worst enemy today. Conventional designs are branded as »unmarketable«, while our dubious craze for all things unconventional is fuelled by the editors of architecture magazines and newspaper feature pages, where obsession with spectacular novelties reigns supreme. The Swiss architect and publicist Werner Blaser, returning to the traditional materials of architecture, described the extraordinary projects of the Portuguese architect Eduardo Souto de Moura in terms of the basic materials of wood, metal, and stone that feature in his designs. Wood provides texture, metal provides structure, stone provides mass. Wood imparts form, metal imparts discipline, stone imparts order. The parameters that define stone are mass and order. Together with age and durability, rootedness and gravity, they represent the fundamental constants of architecture. The word »stone« goes back to the Indo-European *stāi-*, which means to densify, to coalesce, or to harden. In its widest sense, therefore, the word can encompass concepts such as immobility and steadfastness. It is interesting to examine the meaning of words in the Slavic languages which also derive from the Indo-European root *stāi-*. In Serbo-Croatian, *stena* = cliff or stone. Even more interestingly, in Russian, *stena* = wall. The wall, or more loosely the stone, is what separates space into an interior and an exterior. Defining spaces and giving them fixed, immobile moorings is also the original task of architecture – a task which is in a sense anticipated by walls and stone.

Pantheon in Rome, Italy,
built in 118–125CE
Picture: Istockphoto

Parthenon in Athens, Greece,
start of construction ca. 480 BCE
Picture: Istockphoto

Detailed x-ray of a knee joint
Picture: James Steidl

Typical wooden house in the Canton
of Graubünden, Switzerland
Picture: DOM publishers

Peter Behrens: AEG turbine hall
in Berlin, built in 1908–1909
Picture: DOM publishers

Bridge of Mostar, Bosnia and
Herzegovina, built in 1556–1566
(reconstruction: 1996–2004)
Picture: Jennifer Tobolla

Tectonics

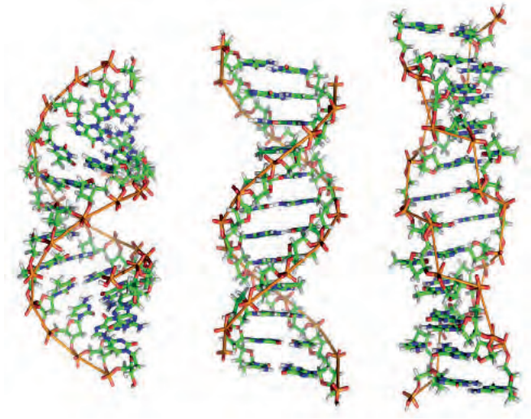
Tectonics, the science of joining structural components, is based on two fundamental parameters. The first, is the structure of the building, which is subject to the conventional laws of mathematics and physics. The second – the one in which the structure has its roots – is nature itself. Like ornamentation, every structure, too, has its equivalents in the repertoire of shapes found in nature. We typically evaluate aesthetic qualities on the basis of experience. And so our perception of beauty is a process that is governed by historical and cultural factors, and what we regard as beautiful varies depending on time and place. The same applies to architecture, the prominent urban presence of which has always been particularly conducive to triggering public discourse. Although architects are in a better position than any other professional group to shape and define the appearance of cities, most of them shy away from engaging with the concept of form.

Indeed, many architects freely admit that beauty can only be a result and never a goal. That form, like function and structure, is an integral element of architecture is an idea that they frequently push aside and ignore, even though the architect is the only person on a construction site who can be held accountable for the beauty of the building. However,as form has so often been abused in the history of architecture as a political symbol, the discipline today rarely deals with form as a more differentiated, purely aesthetic phenomenon.

In the mid-nineteenth century, Gottfried Semper compared the development of architectural forms to evolution. Just as one natural process develops out of another, so harmony, eurhythmy, proportion, and symmetry develop out of one another, while beauty was the interaction of individual forms to create an overall effect. For this reason, the process of new materials, constructions, and artistic intentions generating abstract forms should never be left to chance. According to Semper, beauty, function, and strength always form a conceptual whole.

Applying Semper's reasoning to architecture today, one would have to acknowledge that computer-assisted design methods now allow us to come up with previously unimaginable shapes that still retain the same level of structural stability. In a time when the ultimate challenge to science is to improve on nature through artificial intervention and genetic engineering, it is hard not to regard this as just another logical development. But the mere fact that the discipline is currently going through a transformative phase does not oblige us to condone the dissolution of the traditional canon of architectural forms; if architecture were to break free completely from artistic evolution and put all its faith in the digital creative powers of the computer – which would then become architecture's answer to the genetic manipulation lab – we would be on the road to an irrevocable loss of form. If we allow this to happen, beauty will no longer be the interaction of forms that Semper described. Instead, the urge to propagate will confine it in a test tube with genetic material borrowed from past generations and mixed and matched to taste, generating a laboratory architecture incapable of independent development and growth. This architecture would be like seedless fruit – a victory of science over nature that is an evolutionary *cul-de-sac*. The flawless, digitally bred strains of modern architecture have become so completely stylized into an art form and are afflicted with so great a degree of self-fixation that they cannot be taken a step further, either on the construction site or in the imagination, without dissolving their forms. In real-world contexts, where this kind of architecture inevitably looks alien and extraterrestrial, the radically eidetic nature of these designs means that they will always have the character of foreign bodies. There is no need to invent new materials to employ the abstract vocabulary of modern architecture in real buildings. Even concepts that are atypical in architecture, such as transparency and dynamism, can be expressed using traditional – in other words, mineral-based – materials. Transparency, for example, can be observed in the Gothic cathedrals of the European Middle Ages, such as the *Cathedral of Ulm*. The principle of dynamism is vividly illustrated by the *Shell House* in Berlin. Designed by Emil Fahrenkamp in 1932, the house resembles a wave carved in travertine.

Shell-Haus, Berlin (1930–1931)
Architect: Emil Fahrenkamp
Picture: DOM publishers



Deoxyribonucleic acid (DNA): model showing nitrogen (blue), oxygen (red), and carbon (green)
Picture: Pietro Savorelli

Spire of Freiburg Cathedral, built in ca. 1200–1513
Picture: Peter Zurek

A Manifesto in Stone

»Every building shape arose through the exigencies of construction before it gradually became an artistic form. We can therefore conclude with absolute certainty that new purposes and new constructions must give rise to new forms.« (Otto Wagner, 1896). The *Vienna Post Office Savings Bank* building built by Wagner in 1906 is a textbook example of this philosophy: Wagner was the first architect who deliberately turned the technical construction of the stone façade into an aesthetic feature using visible rivets to install a curtain wall of thinly cut natural stone. He created a synthesis of technology and design by redefining the different formal languages of different eras as the interplay of structural issues, available tools, and aesthetic perceptions – while simultaneously adhering to the laws of proportion, symmetry, and harmony. Another conspicuous example of this approach can be seen in the *German pavilion* at the 1929 Barcelona International Exposition (1929), designed by Ludwig Mies van der Rohe. Here we find slide-in walls panelled with stone within a load-bearing structure consisting of steel supports. The marbled texture of the onyx gives the space an almost ornamental character. »Advances in construction technology brought new materials and more efficient techniques that often stood in stark contradiction to our traditional ideas of architecture. Nevertheless, I believed in the possibility of developing a new architecture with these new methods,« said Ludwig Mies van der Rohe. He too used the classical vocabulary of architectural history to develop his new language of architecture.

Finally, another building that illustrates the same principles is James Stirling's *Staatsgalerie Stuttgart* (1977–1984). The use of yellow sandstone and the symmetrical layout centred on a courtyard touched off one of the most heated architectural controversies in postwar Germany – a controversy that went down in the history of German architecture as the »Battle for Postmodernism«. Stirling was accused of having a restorer mentality and was pigeonholed with fascist architecture – a label that continues to adhere to his work even today.

Ludwig Mies van der Rohe: exhibition pavilion of the Deutsches Reich at the 1929 Barcelona International Exposition (reconstruction: 1983–1986)

Otto Wagner: detail of the façade of the Post Office Savings Bank in Vienna, 1904–1906
Pictures: DOM publishers

Experiments with Tradition

An article titled »The Provocation of the Mundane« (»Die Provokation des Alltäglichen«) by the architectural theorist Vittorio Magnago Lampugnani, which was published in the magazine Der Spiegel 51/93, touched off the Berlin architecture debate of the 1990s. In Berlin, stone became synonymous for an allegedly retrogressive idea of architecture. Some of the architects of Berlin's new buildings had attempted to derive architectural forms from a critical analysis of architectural history, an attempt which, however, met with no more than reluctant approval from architects and critics and, in a grotesque twist, was even disparaged as the expression of an undemocratic and non-transparent idea of society. Concepts like mass and weight, monument and tradition have degenerated into ideologically and politically charged catchwords that appear to have lost their specifically architectural significance. Even using the term »tectonics« – which, after all, is a quintessential aspect of architect-ure – has become a subversive act.

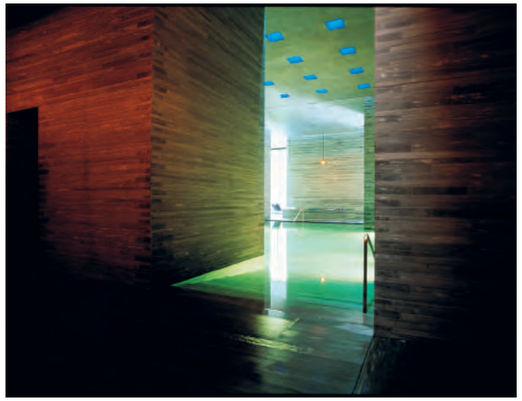
Do houses of stone really make hearts of stone, as Bruno Taut once claimed? Hardly. After all, neither did Taut's own glass house, which he built in 1914 for an exhibition by the Werkbund in Cologne, end up creating glass people. Even today, the scandal-hungry public is hugely entertained by this dispute, which has the audience appeal of the simple »for or against« strategy, but goes so far as to force the protagonists to choose one or the other ideological camp at the end. The result of this is that they find themselves almost unable to use the materials favoured by their ostensible »opponents« for fear of laying themselves open to charges of heresy. At this point the debate finally shifts from the realm of the ridiculous to the tragic.

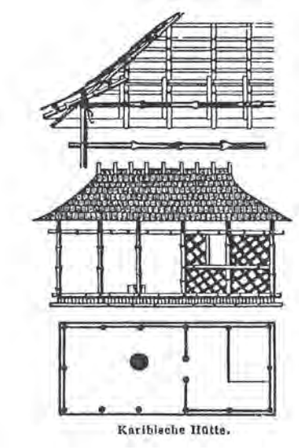
The Façade

The Berlin architecture debate, which scaled the pinnacles of absurdity between 1993 and 1995, focused mainly on the perforated stone façades in the Friedrichstadt district. This was the area where the first major urban projects were realized after the fall of the Berlin Wall. The debate fixated on façades because these represent the only link between houses and streets in the densely built-up district. Friedrichstadt was built in the Baroque period as an extension to Berlin, and the original, rigid grid layout has survived largely intact from the eighteenth century to the present day. In the narrow streets of this grid, what the viewer chiefly notices about the houses are their two-dimensional façades:
The perception of architectural form is reduced to the aesthetic impact of the part of the building that faces the street. Cornices, pilaster strips, and embrasures create an impression of load-bearing strength that is quite independent of the actual structures and functions that lie behind the façades. For in their »naked« state all the new buildings are equal, consisting as they do of reinforced concrete structures with a low-cost grid of supports and low-ceilinged rooms. It is the façades that give the buildings their individual appearance, and this is why the subtle differences can be detected only in the quality of the materials and the nature of the seams: heavy cloaks of stone, lightweight coats of metal, or transparent gowns of glass. It is in the attachment of the covering to the body – in the way, if you will, that each building wears its clothes – that the subtle differences become apparent: in the glued stone façade projecting an air of solidity, in the dense weave of stone and substructure, in the solid masonry of perfectly cut stone blocks, or – on the opposite extreme – in the ostensible dissolution of a façade virtually en dishabille. Friedrichstadt in its contemporary appearance reads like an architectural textbook on stone façades, with the three fundamental principles of tectonic façades lining the new streets: wall and cladding; structure as an art form; and the monolithic façade.

Wall and Cladding

Hans Kollhoff's tectonic façade features glued pilaster strips and cornices that create an impression of mass and weight. Like almost all of Kollhoff's buildings, the house at the corner of Friedrichstrasse and Französische Strasse has a façade of grey granite panels, the seams of which are either





Left: Peter Zumthor: Spa in Vaals/ Switzerland, 1996
Gottfried Semper: cabin in Trinidad, 1879
Pictures: DOM publishers

hidden under overlapping sections of panel or filled with sand-surfaced expansion filler – after all, Goethe himself maintained that art does not have to be true as long as it appears to be true. While the façade gives the impression of mass, in reality it is only a scant three centimetres thick. In this building, Kollhoff gives us an example of Semper's theory that the façade is a decorative element of the building: »It seems important to me to point out the principle of the outer appearance and revetment of the structural frame. All artistic activity presupposes a certain carnival mood.« (Gottfried Semper, 1860)

Structure as an Art Form

Slightly to the south of Kollhoff's building, Klaus Theo Brenner deliberately refrained from using filler on the façade of the house at the corner of Friedrichstrasse and Mohrenstrasse. Here the stone façade is punctuated by protruding aluminium swords that serve as spacers in unfilled seams, creating quite an elegant filigree. It is almost as though the architect had clothed the massive volume in a cloak woven from stone panels and their suspension system and studded with glittering pearls. The stone façade emerges as an ornamental drapery that leaves the metal ribs exposed to view in a modern reading of Otto Wagner's *Post Office Savings Bank* building in Vienna.

In 1990s Berlin, the main proponents of this interplay of construction and art form were Brenner, Josef Paul Kleihues, and Max Dudler. Any visible metal stud on any natural stone façade proclaims loudly and clearly that they were there. Their façades are the antithesis of Kollhoff's wallpaper-like expanses of stone, which simply evoke an image of weightiness. And this is a story that could easily repeat itself. For the awareness of the subtle difference between appearance and truth in architecture goes at least as far back as Otto Wagner, who criticized Semper's theory as incomplete; in Wagner's view, Semper took refuge in the symbolism of the structure instead of acknowledging the structure itself as the germ cell of all architecture. But even though we would do well to examine these distinctions more closely, the public rarely pays attention to nuances as subtle as these.

Any attempt to bring calm, discerning evaluation into play in architectural discourse is drowned out by defamation and political faction fighting in which the quality of individual buildings is rarely taken into consideration.

Gravitas and Weight

Among the buildings on Friedrichstrasse, the *Lindencorso* is something of an exception to the rule. Designed by Christoph Mäckler, this is the only new building made of massive stone blocks. This choice of material was bound to evoke associations with the buildings of the 1930s and thus could not fail to spark a controversy. The Lindencorso echoes numerous motifs from the history of architecture, from the imposing sandstone window embrasures that jut out beyond the building like enormous frames to the stone plaster cornice that tops the façade along its entire 250-metre-length. The façade is made of limestone from the Elm hills and is up to 12 centimetres thick. The mass of the house is so great that the supports of the arcade threaten to collapse onto the pavement. This vertical force is somewhat mitigated, at least visually, by horizontal fluting – a motif from classical antiquity that Kleihues, too, employed in his buildings on either side of the Brandenburg Gate. All these examples display an intelligent relationship between architectural tradition and modern technology. All are rooted in history and make no claim to embody anything new or previously unheard of. What they do claim to be is long-lived and enduring – two criteria of sustainable building. What can we conclude from all this for construction today? It would seem that there is no need to reinvent architecture from the ground up. The laws of the art were developed over millennia – the only problem is that we have forgotten how to apply them. Why, after all, should we go to vast technical and financial lengths to invent a new insulating façade when a new school building in Berlin Köpenick (by Christoph Mäckler) provides an object lesson in how 60-centimetre walls can outperform even the most intelligent façades known to science? And why are students flocking in droves to the suburbs to look at low-energy terraced houses instead of studying the issue of compact urban densification, which is more sustainable than the most ambitious ecological housing in the suburbs could ever hope to be? Truly modern construction methods must address the deficits of previous generations of builders and continue to spin the thread of history rather than trying to come up with sensational architectural gimmicks. There is more at stake than who gets to appear on the covers of glossy magazines. In the words of Jacques Herzog: »Let's be honest. It is beauty that truly moves us.«

Townhouses in Berlin-Mitte
Picture: DOM publishers

The *Altes Museum*, Berlin-Mitte
Picture: DOM publishers

To Build Is to Preserve!
Architecture, between Renovation and Restoration

»All art has been contemporary,« says the bright red neon sign behind the colonnades of the Altes Museum. At night, the light sculpture competes for attention with the venerable columns fronting Schinkel's first large building in Berlin. According to conventional standards of monument conservation, the neon sign had absolutely no business being installed on the façade of the historical museum building. The presence of the light installation is a provocation because, for the last century or so, preserving historical monuments has been synonymous with conserving the existing substance. And in the minds of most people, this translates into taking steps to ensure that a building, an architectural ensemble, or a landscape under the open sky is protected from the impact of the present as though in a glass display case. There is no way this can work in the long run, because it contradicts the nature of all created things on this earth. The world is continually changing, even in the absence of human intervention, and buildings are no different from landscapes or living things – they go through transformative processes, they change, they develop. And so even a protected monument is not an object where time suddenly ground to a halt at a specific date in history. On the contrary, it is a witness to the progress of history. It bears the marks of different eras, and among all the eras of history the present ranks on an equal footing with any bygone era that itself was once the present. *Schloss Stolzenfels* in the Rhineland is a textbook illustration of this principle.

Stolzenfels: From Castle to Palace

Part of the Upper Middle Rhine Valley UNESCO World Heritage Site, Stolzenfels originated in the thirteenth century not as a palace (Schloss), but as a castle (Burg). In the years from 1835 to 1839, when Karl Friedrich Schinkel converted the ruined castle into a Schloss in a Victorian style that is highly unusual for the region, the historical remnants of medieval castle architecture were almost entirely destroyed. The extent of this loss of authenticity can be gauged today from a model made of cork in which Schinkel documented the condition of the ruins before the construction work began.

Schinkel's design resulted in a complex so new and different that even reputable publications today list the years 1835 to 1842 as the construction date of Stolzenfels, and the medieval castle that once stood on the site has vanished entirely from public awareness. Even the sparse remnants of the medieval outer bailey were significantly altered by Schinkel in 1838 in his capacity as the king's architect.
For example, he closed several windows in the gatehouse tower and the Adjutants' Tower and added the gently sloping zinc roofs – which serve a purely functional purpose – that are a typical feature of his designs. That Schinkel's roofs were always invisible and never constituted a design element of his architecture may be attributable to the technicist influences he absorbed during his journey to England in 1826 as well as his neoclassical alignment. Thus Schinkel, who loathed medieval roofs, described Stolzenfels as a castle »almost without a roof, with battlements all around«. Schinkel's massive intervention in the substance of the castle therefore represents an explicit distortion of history. Moreover, the reconstruction was a blatant violation of a Prussian ministerial circular decree on restoration methods passed in 1843, in terms of which »it can never be the purpose of a restoration to obliterate even the smallest blemish that remains as a trace of bygone centuries and contributes to the character of the building«.

Making the Past New Again

Since time immemorial, people have been adapting, extending, and refitting old buildings to meet the requirements of their times. The recent installation of a lift for disabled persons in the gatehouse of Schloss Stolzenfels, next to the main entrance, is a measure that fully conforms with the preservation of monuments according to Article 9 of the Venice Charter of 1964, which states: »[Where reconstructions become conjectural,] any extra work which is indispensable must be distinct from the architectural composition and must bear a contemporary stamp.« The (self-)declared task of preservation consists of illustrating the biography of a place, building, or object and its development as a witness to cultural, political, and other influences – of exposing each historical stratum in full awareness of its independent value. That is why Schloss Stolzenfels, built as it is on the ruins of an older castle, is a protected monument, and why it is possible to add a new stratum in our time. We believe that it is permissible to build upon the old in order to preserve its usefulness under changing conditions.

1. For reasons of architecture
Together with structural and design aspects, barrier-free construction is one of the fundamental features of our proposal. Installing a lift in the gatekeeper's lodge addresses the justifiable desire to provide adequate access for the disabled persons among the 35,000 people who visit the complex each year.

2. For reasons of accessibility
Installing a lift in the gatekeeper's lodge was the only option for providing barrier-free access not only to the gatehouse and the ticket office, but also to all other parts of the complex. Additionally, the lift in the gatekeeper's lodge provides the only adequate means of monitoring the streams of visitors.

3. For reasons of political correctness
Now that the lift provides barrier-free access to 91 per cent of the publicly accessible areas of the complex, all visitors are able to explore the buildings independently. In addition to providing equal access for everyone in accordance with the standards of modern society, this also complies with the goal, widely accepted among conservators, of transmitting our cultural heritage and its protection as values in their own right. And one of the best ways to communicate the significance of our heritage is to enable people to experience it at first hand, while the best way to protect historical buildings is by putting them to active use in the present day.

4. For reasons of conservation
One of the crucial goals of conservators is to make Schinkel's architecture and the complex as a whole accessible and useful in the twenty-first century. The qualities of the original building have once again been made visible thanks to the installation of the lift in the gatekeeper's lodge. Additions dating from the second half of the twentieth century – the southern ward and the stairwell to the toilets – were removed to restore the building to the state envisaged by Schinkel. Additionally, the metal roof of the gatekeeper's lodge was replaced with an observation platform, while a door only 74 centimetres wide, which Schinkel inserted in the ward, was removed and widened to the modern standard of 80 centimetres in order to allow wheelchair access. All these alterations conform to the rules of the Venice Charter for the preservation of monuments, and especially to Article 5 of this document. The same rules were observed in recent work on the Museum Island in Berlin, one of the most significant complexes among UNESCO World Heritage Sites. Here, too, the aim is to adapt the buildings in the ensemble to meet the requirements of modern museums.

- *They will be renovated (from Latin renovare, »to renew« or»restore«).*
- *They will be restored (from Latin restaurare, »to restore« or »rebuild«, in the sense of »repairing«).*
- *They will be reconstructed (from Latin reconstruere, »to rebuild«, »reconstruct«, »restore something to its original condition«).*

The subtle differences in meaning between these terms, which are often used carelessly and interchangeably, must be clearly distinguished in the case of a project such as this one. Thus the *Museum Island* will receive a new subterranean access, known as the Archaeological Promenade, which will serve as a link between all the buildings. Postwar interior additions will be removed to restore the structural and aesthetic qualities of the original designs. New additions will include a modern air conditioning system and new lifts as well as wheelchair-friendly entrances and access routes.

All these things are indispensable for enabling the famous buildings by Schinkel, Stüler, Ihne, and Messel to meet the demands of the twenty-first century. But none of these things can be achieved without bitter altercations along the way, and Schloss Stolzenfels was not spared the disputes, either. Installing the lift in the gatekeeper's lodge, replacing the roof with an observation platform, widening a historical door in the Elisabeth Tower, replacing a door and a window in the gatekeeper's lodge – all these changes were accompanied by controversies, some of which reached an extremely heated pitch. Two opposing lines of argumentation can be identified in this debate: The conservative approach adheres to the injunction to »conserve, not reconstruct« enjoined in 1905 by the art theorist and proponent of conservation Georg Dehio. Its main protagonist today is Georg Mörsch, who teaches monument conservation at ETH Zurich and whose guiding philosophy is that »the quintessential task of conservators is to preserve substance.« The progressive approach follows the dictum, which goes back to Schinkel, that protecting the old means building upon it. Schinkel proclaimed this philosophy in 1816 for the cathedral in Cologne and practised it at both Schloss Ehrenburg in Coburg and Stolzenfels Castle. Many of Schinkel's unreal-

Stolzenfels Castle, Koblenz
Architect: Karl Friedrich Schinkel
Picture: DOM publishers

ized designs, such as the conversion of the *Athenian Acropolis* into a royal palace, also attest to this philosophy, a modern recasting of which was supported by the Regensburg art historian Jörg Traeger (1942–2005). Following Schinkel, Traeger declared, »The rights of history include the right to reconstruction.« In their continual quest to preserve, conservators thus have the right to reconstruct – even to reconstruct »ruins that have given rise to their own artistic or historical traditions over the centuries.« From a purely architectural perspective, this attitude can be reduced to a simple common denominator: »Reconstruction is design« (Augusto Romano Burelli).

Conservation as a Mission and a Quest for Identity

Ever since the conservation of historical monuments was institutionalized a century or so ago, and ever since 1900, when Germany celebrated its first annual Monument Conservation Day, conservators have been arguing about the »correct« way to preserve buildings. After long periods when this debate was conducted largely behind the scenes and by implication, it gained public visibility after 1990 due to the controversies surrounding the reconstruction of significant buildings that had been destroyed during or after the war, such as the *Frauenkirche* in Dresden, the *Royal Palace* in Braunschweig, the *New Museum* on the Berlin Museum Island, and the *Waidhaus buildings* and the *Library of the Augustinian Monastery* in Erfurt. The conservative attitude »the quintessential task of conservators (is) to preserve substance, not to create images, which are invariably interpretations« is to reject reconstruction, as its ultimate verdict is that what is gone is irrevocably gone. In this line of reasoning, the reconstruction of the *Duchess Anna Amalia Library* in Weimar, which was partly destroyed in a fire in 2004, should be branded as a sacrilege. This attitude conflicts with the philosophy of Karl Friedrich Schinkel, whose designs, conversions, and new buildings showcased a romantic grandeur. The same philosophy was espoused by the Prussian court and landscape painter Caspar Scheuren in his watercolour series of Schloss Stolzenfels, which he depicted as a romantic, medieval fantasy world. »The harmonious completeness and concord of the work of art that is Stolzenfels« finds its apotheosis in these paintings. Even today, many conservators invoke this fanciful veduta as the »reality« of the historical Stolzenfels. One could hardly be more completely taken in by a feigned historical reality.

On the other hand, an expert opinion by Schinkel for the Kingdom of Prussia on the »Principles of the Conservation of Old Monuments and Historical Sites of Our Country« (1815) ultimately established monument conservation in Germany as a responsibility of the state, and Schinkel himself adhered to the dictum of »conservation through reconstruction« in his work as a conservator. It is therefore legitimate to ask how faithful conservators have been to the principles of the founder of their discipline.

Schinkel as a Child of His Time

The Prussian court architect of the nineteenth century is still something of an idol in the eyes of conservators and cultural aesthetes today. The most immediate need is for an objective examination both of Schinkel himself and of the prevailing ideas that shaped him as a child of his time. The art historian Tilmann Buddensieg is one of the few experts who have undertaken such an examination, with special reference to urban development and the major urban projects designed and built by

Left: Building Academy (Bauakademie), Red Hall partly reconstructed by Tobias Nöfer, 2005
Top: Schinkelplatz, 2009
Pictures: DOM publishers

Schinkel. »In Berlin, an intellectual environment dominated by the Enlightenment, Romantic Classicism, and reflection on universal history engendered the discordant spirit of deconstructivism. For this is indeed the term that best describes what was going on at the start of the nineteenth century, when the feudal city of the eighteenth century came under attack on several levels and was stripped of its originally complete homogeneity. Schinkel may be regarded as the first opponent of the historical shape of the city of Berlin that had emerged from the eighteenth century ... The criticism of the historical shape of Berlin emanated from a confident, patriotic middle class that had been strengthened by the War of Liberation. Schinkel, Borsig, Zelter, and others were members of this class.«

But it was not only the middle class that was open to the new. Educated in the spirit of Humanist Enlightenment, the Prussian aristocracy, too, developed a sense of the sublime that ultimately infected even the Protestant royal family – though only in the form of a »fanciful ennui with the city of their fathers and grandfathers« (Buddensieg). King Frederick William III and Crown Prince Frederick William (the future King Frederick William IV) were greatly taken with Schinkel's Italian-style turreted villas, which were strongly influenced by his travels in Italy and in particular Tuscany. Set in the austere Prussian landscape, these Mediterranean buildings are precisely those »images, which are invariably interpretations, and thus always falsifications« criticized by Mörsch.

Schinkel's aristocratic and upper-class clients, however, were also fond of the idea of an ensemble of architecture and landscape design that would link Potsdam and Berlin and dominate the surroundings of both cities. This *Prussian Arcadia* was pure poetry. But there was no enthusiasm at all at court for Schinkel's plans to build a department store on Berlin's Unter den Linden boulevard. The technicist style which inspired Schinkel during his sojourn in England in 1826, which he was subsequently to realise only once, in the Building Academy, was still too progressive, middle-class,

and revolutionary in 1839. To understand this reserve towards anything new, one must bear in mind that Schinkel's time was fraught with contradictions. It was an era caught between national resurgence and a palpable desire for freedom on the part of the liberal middle classes on the one hand and retrogressive restorationist tendencies on the other. The national economy was in crisis, hesitant to embrace the first beginnings of industrialization, and the wind of social, cultural, and political protest was blowing through all the chinks in the armour of the moribund ancien régime. Finally, in 1848, revolution came to Germany and architecture ceased to be purely a matter of taste. It was politics turned masonry, Zeitgeist carved in stone, an affirmation of a philosophy. Similarly, Romanticism cannot be interpreted as mere escapism; rather, it was the expression of a national search for identity and distinction – of cultural resistance to a hidebound political system. Schinkel's enthusiasm for Gothic architecture was by no means a matter of simple aesthetics, but a by-product of his quest for building forms that would create identity. It was linked to his nationalistic patriotism, which grew to its greatest strength during the War of Liberation from 1813 to 1815.
Classicism in general and its Prussian permutation in particular can thus be read as the architectural expression of middle-class resistance that held its own in the centre of Berlin against the feudal Baroque edifices and especially against the royal palace. In its formal and material simplicity – note that brick buildings are a prominent feature – it reflects the middle-class virtues of thrift, distaste for pomp and superficial beauty, and rectilinear purity, and offers an alternative, not only on the level of architecture, to the notorious ostentatious wastefulness, coquetry, and courtly splendour of the aristocracy.

Conservation: Preserving the Old by Adding the New

Schinkel judged historical buildings solely in terms of their utility, always seeking to adapt new and old. That is why the planned conversion of Stolzenfels Castle in his hands turned into what was basically a complete reconstruction. The history of Stolzenfels exemplifies the fate of many other castles along the Rhine which were destroyed in the wars with France both before and after the French Revolution and which were repaired and rebuilt in the nineteenth century in the spirit of the emerging sense of German national identity. Schinkel was pragmatic in his ideas and his work. He adopted existing, well-established forms and styles, which he modified and developed. Strictly speaking, all Schinkel's designs, from his Gothic and neoclassical forms to his Tudor adaptations, are one vast, grandiose array of images.
So if the conservative approach to the preservation of monuments had its way, Schinkel's works would have to be struck off the list. There is a simple reason, however, why this will not be done. Schinkel's buildings embody the spirit of their times. It is for this reason that Stolzenfels and other castles reworked in the historicist style found their way onto the list of protected monuments.
At the institutional level, meanwhile, conservators still prefer to quarrel about principles rather than proceeding on a case-by-case basis. Even converting a historical castle to improve its accessibility for the disabled can represent an appropriate improvement; a technological and architectural work of contemporary art can legitimately be added as a modern stratum to an old structure. In this sense, such additions can represent conservation in the best sense of the term. What is important is

Peter Zumthor: Kolumba – Art Museum of the Roman Catholic Archdiocese of Cologne, 2007
Pictures: DOM publishers

the quality of the design. However, the two camps within the institutional discipline of conservation still prefer to wage their bitter wars for the prerogative of interpretation, failing to notice that in the heat of the battle, they have forgotten the simple and compelling dictum that might have been coined by their own spiritual father, Karl Friedrich Schinkel:

»[ALL ART HAS BEEN CONTEMPORARY]«

pages 18 to 55 taken from:
Natascha und Philipp Meuser: Meuser Architekten, Bauten und Projekte 1995 – 2010, Berlin 2011

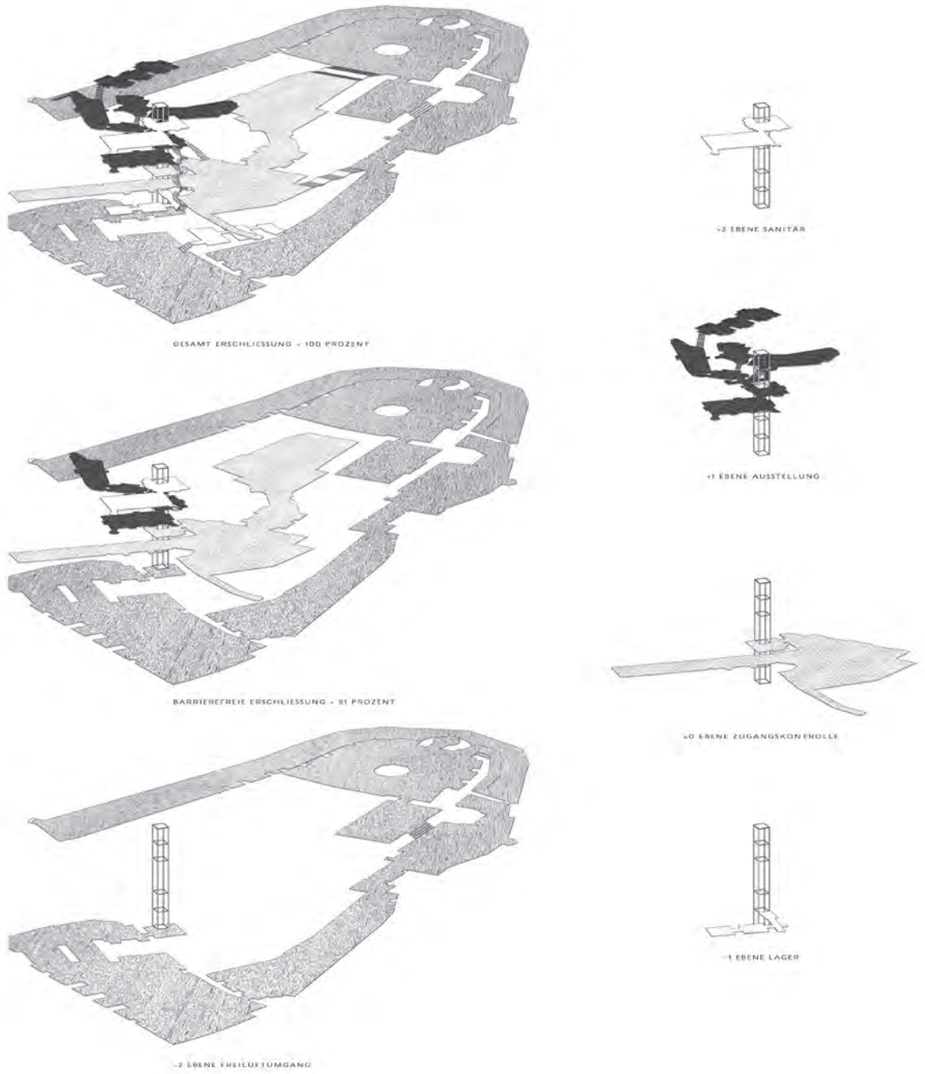
Archaeological excavation site, Carthage/Tunis (2018)
Included in the World Heritage List in 1979
Picture: Natascha Meuser

Stolzenfels Castle, Koblenz
Architect: Karl Friedrich Schinkel
Picture: DOM publishers

The lift tower next to the gatehouse, 2013 (intended)
Picture: Natascha Meuser

Stolzenfels Castle before modernization, 2007. Architect Karl Friedrich Schinkel gave his imagination free rein when in 1835 he turned the medieval ruin into a Jacobethan fairy-tale castle. Today the listed building is a popular day-trip destination.
Picture: Natascha Meuser

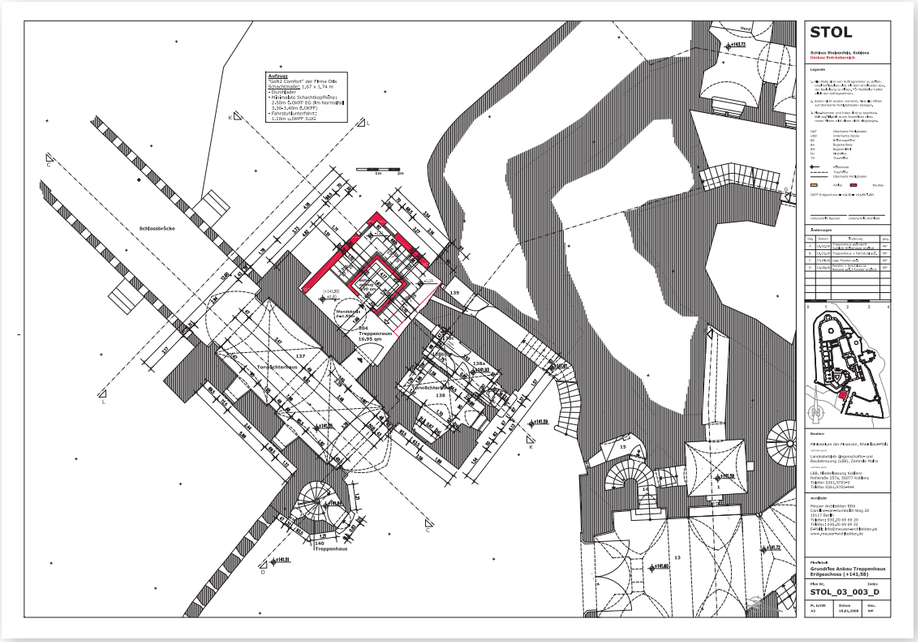
To enable wheelchair users to visit, an accessibility plan was devised and a lift installed in a washed brickwork tower erected next to the gatehouse. The renovated façade also demonstrates this successful reconciliation of preservation with progress.
Picture: Natascha Meuser



Left: Cork model of the ruined castle, ca. 1830
Top: Drawings of handicapped accessible areas at the Stolzenfels Castle
Pictures: Meuser Architekten BDA

The lift tower next to the gatehouse, 2013 (intended)
Pictures: Meuser Architekten BDA

South elevation and section



Ground floor plan

Front building,
Stolzenfels Castle
Picture: Natascha Meuser

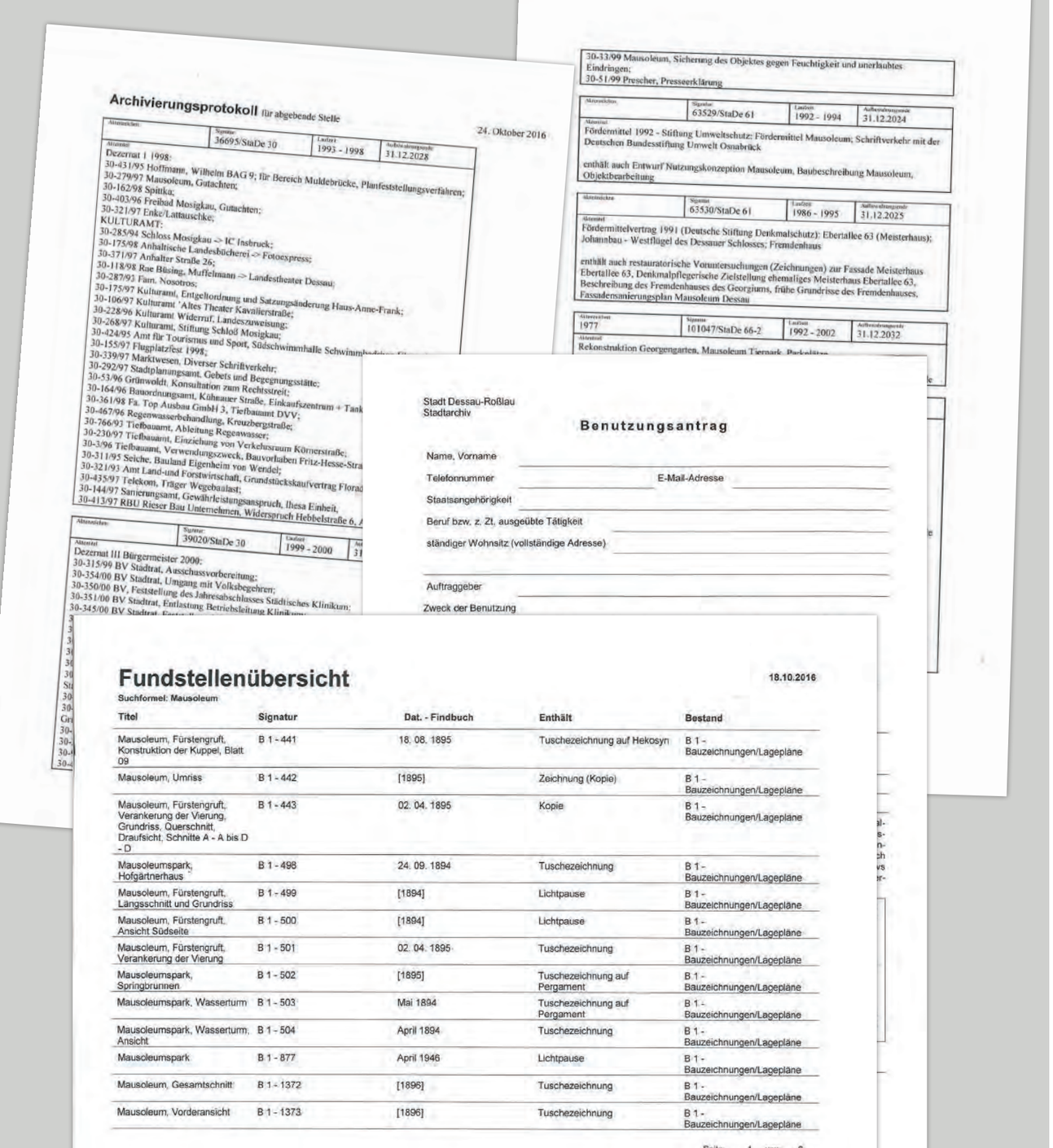
Understanding the Basic Elements of Design

How to Research a Building in Ten Steps

Each historic building has its own, often unique and eventful story which is illustrated by the mostly complex building environment. Technical modernisations, changes in usage, the switchover of clients, wars and natural catastrophes, increases in required space, a growing need for prestige, or simply the different styles of the period and much more besides are documented within the building. The results make clear the source function and should thus be regarded as core expertise in historic architectural heritage. In many respects, they tap into new approaches, thereby contributing to the valuation for owners, planners and conservationists. In terms of the preservation of historic buildings, an architectural and historical study in particular is used to document and analyse individual components in the run-up to planned restoration works or alterations. It underpins the evaluation and navigation of changes envisaged. At the same time, definite knowledge of the structure and development of a building allows for a diagnosis of damages and is helpful in preparing structural and restoration works in a goal-oriented manner.

Left: Model
Picture: Förderverein Mausoleum e.V.

Top: Front façade (2016)
Pictures: Natascha Meuser



Archivierungsprotokoll für abgebende Stelle

24. Oktober 2016

Aktenzeichen	Signatur	Laufzeit	Aufbewahrungsende
	36695/StaDe 30	1993 - 1998	31.12.2028

Aktentitel
Dezernat I 1998:
30-431/95 Hoffmann, Wilhelm BAG 9; für Bereich Muldebrücke, Planfeststellungsverfahren;
30-279/97 Mausoleum, Gutachten;
30-162/98 Spittka;
30-403/96 Freibad Mosigkau, Gutachten;
30-321/97 Enke/Lattauschke;
KULTURAMT:
30-285/94 Schloss Mosigkau -> IC Insbruck;
30-175/98 Anhaltische Landesbücherei -> Fotoexpress;
30-371/97 Anhalter Straße 26;
30-118/98 Rue Büsing, Muffelmann -> Landestheater Dessau;
30-287/93 Fam. Nosotros;
30-175/97 Kulturamt, Entgeltordnung und Satzungsänderung Haus-Anne-Frank;
30-106/97 Kulturamt 'Altes Theater Kavalierstraße;
30-228/96 Kulturamt Widerruf, Landeszuweisung;
30-268/97 Kulturamt, Stiftung Schloß Mosigkau;
30-424/95 Amt für Tourismus und Sport, Südschwimmhalle Schwimmbadneu
30-155/97 Flugplatzfest 1998;
30-339/97 Marktwesen, Diverser Schriftverkehr;
30-292/97 Stadtplanungsamt, Gebets und Begegnungsstätte;
30-53/96 Grünwoldt, Konsultation zum Rechtsstreit;
30-164/96 Bauordnungsamt, Kühnauer Straße, Einkaufszentrum + Tank
30-361/98 Fa. Top Ausbau GmbH 3, Tiefbauamt DVV;
30-467/96 Regenwasserbehandlung, Kreuzbergstraße;
30-766/93 Tiefbauamt, Ableitung Regenwasser;
30-230/97 Tiefbauamt, Einziehung von Verkehrsraum Körnerstraße;
30-3/96 Tiefbauamt, Verwendungszweck, Bauvorhaben Fritz-Hesse-Stra
30-311/95 Seiche, Bauland Eigenheim von Wendel;
30-321/93 Amt Land-und Forstwirtschaft, Grundstückskaufvertrag Florad
30-435/97 Telekom, Träger Wegebaulast;
30-144/97 Sanierungsamt, Gewährleistungsanspruch, Ihesa Einheit,
30-413/97 RBU Rieser Bau Unternehmen, Widerspruch Hebbelstraße 6,

Aktenzeichen	Signatur	Laufzeit	Aufbewahrungsende
	39020/StaDe 30	1999 - 2000	31

Aktentitel
Dezernat III Bürgermeister 2000:
30-315/99 BV Stadtrat, Ausschussvorbereitung;
30-354/00 BV Stadtrat, Umgang mit Volksbegehren;
30-350/00 BV, Feststellung des Jahresabschlusses Städtisches Klinikum;
30-351/00 BV Stadtrat, Entlastung Betriebsleitung Klinikum;
30-345/00 BV Stadtrat, Fortsetzung

30-33/99 Mausoleum, Sicherung des Objektes gegen Feuchtigkeit und unerlaubtes Eindringen;
30-51/99 Prescher, Presseerklärung

Aktenzeichen	Signatur	Laufzeit	Aufbewahrungsende
	63529/StaDe 61	1992 - 1994	31.12.2024

Aktentitel
Fördermittel 1992 - Stiftung Umweltschutz; Fördermittel Mausoleum; Schriftverkehr mit der Deutschen Bundesstiftung Umwelt Osnabrück

enthält auch Entwurf Nutzungskonzeption Mausoleum, Baubeschreibung Mausoleum, Objektbearbeitung

Aktenzeichen	Signatur	Laufzeit	Aufbewahrungsende
	63530/StaDe 61	1986 - 1995	31.12.2025

Aktentitel
Fördermittelvertrag 1991 (Deutsche Stiftung Denkmalschutz): Ebertallee 63 (Meisterhaus); Johannbau - Westflügel des Dessauer Schlosses; Fremdenhaus

enthält auch restauratorische Voruntersuchungen (Zeichnungen) zur Fassade Meisterhaus Ebertallee 63, Denkmalpflegerische Zielstellung ehemaliges Meisterhaus Ebertallee 63, Beschreibung des Fremdenhauses des Georgiums, frühe Grundrisse des Fremdenhauses, Fassadensanierungsplan Mausoleum Dessau

Aktenzeichen	Signatur	Laufzeit	Aufbewahrungsende
1977	101047/StaDe 66-2	1992 - 2002	31.12.2032

Aktentitel
Rekonstruktion Georgengarten, Mausoleum Tiergarten, Parkplätze

Stadt Dessau-Roßlau
Stadtarchiv

Benutzungsantrag

Name, Vorname

Telefonnummer E-Mail-Adresse

Staatsangehörigkeit

Beruf bzw. z. Zt. ausgeübte Tätigkeit

ständiger Wohnsitz (vollständige Adresse)

Auftraggeber

Zweck der Benutzung

Fundstellenübersicht 18.10.2016

Suchformel: Mausoleum

Titel	Signatur	Dat. - Findbuch	Enthält	Bestand
Mausoleum, Fürstengruft, Konstruktion der Kuppel, Blatt 09	B 1 - 441	18. 08. 1895	Tuschezeichnung auf Hekosyn	B 1 - Bauzeichnungen/Lagepläne
Mausoleum, Umriss	B 1 - 442	[1895]	Zeichnung (Kopie)	B 1 - Bauzeichnungen/Lagepläne
Mausoleum, Fürstengruft, Verankerung der Vierung, Grundriss, Querschnitt, Draufsicht, Schnitte A - A bis D - D	B 1 - 443	02. 04. 1895	Kopie	B 1 - Bauzeichnungen/Lagepläne
Mausoleumspark, Hofgärtnerhaus	B 1 - 498	24. 09. 1894	Tuschezeichnung	B 1 - Bauzeichnungen/Lagepläne
Mausoleum, Fürstengruft, Längsschnitt und Grundriss	B 1 - 499	[1894]	Lichtpause	B 1 - Bauzeichnungen/Lagepläne
Mausoleum, Fürstengruft, Ansicht Südseite	B 1 - 500	[1894]	Lichtpause	B 1 - Bauzeichnungen/Lagepläne
Mausoleum, Fürstengruft, Verankerung der Vierung	B 1 - 501	02. 04. 1895	Tuschezeichnung	B 1 - Bauzeichnungen/Lagepläne
Mausoleumspark, Springbrunnen	B 1 - 502	[1895]	Tuschezeichnung auf Pergament	B 1 - Bauzeichnungen/Lagepläne
Mausoleumspark, Wasserturm	B 1 - 503	Mai 1894	Tuschezeichnung auf Pergament	B 1 - Bauzeichnungen/Lagepläne
Mausoleumspark, Wasserturm, Ansicht	B 1 - 504	April 1894	Tuschezeichnung	B 1 - Bauzeichnungen/Lagepläne
Mausoleumspark	B 1 - 877	April 1946	Lichtpause	B 1 - Bauzeichnungen/Lagepläne
Mausoleum, Gesamtschnitt	B 1 - 1372	[1896]	Tuschezeichnung	B 1 - Bauzeichnungen/Lagepläne
Mausoleum, Vorderansicht	B 1 - 1373	[1896]	Tuschezeichnung	B 1 - Bauzeichnungen/Lagepläne

Sources and Archives
Where to Go for Research

Archives are collections of documents or records which have been selected for permanent preservation because of their value as evidence or as a source for historical or other research. Archival research and source studies are generally necessary in order to obtain knowledge of the building. In contrast to building surveys, these do not take place in or at the property, but rather require a visit to widely scattered archives. The interplay of findings made at the property and archival documents allows for a thorough verification and classification of knowledge. Archival investigations draw on primary sources (documents, cadastral maps, plans, drawings, historical illustrations, etc.) secondary sources (studies which have been conducted to date, acts, etc.) and literature (publications). It is recommended that historical illustrations and plans are compiled within a catalogue in chronological order so as to aid in the understanding of events as they unfolded. Archival documents on the surrounding environment – which may cover a vast array of topics, such as the local history, neighbouring buildings, etc. – should be included only if these are relevant for the evaluation.

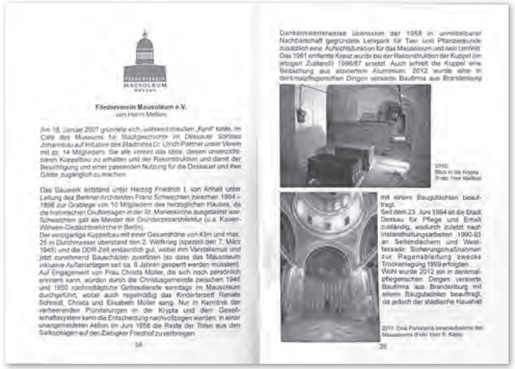
Archival research at the Bauhaus library
(documents provided by the Stadtarchiv Dessau-Rosslau)
Picture: Natascha Meuser

Forms of Documentation
How Plans and Images are Brought Together

Plans, maps, photographs and descriptions set out to document the investigation. Therefore, the submitted report of an architectural and historical study comprises, so to speak, components such as an architectural study of historic buildings (including a survey of the building, an image layout and a room programme, an appraisal of the property, archival research and an analysis of materials, as well as a follow-up architectural and historical evaluation). Within the lecture and course of the seminar, various sources were used to compile the most comprehensive documentation of the building. There were no preliminary studies or documentation. All material in this brochure has been researched solely for this project and documented with support and assistance from the Stadtarchiv and Landesarchiv Dessau-Rosslau. The building interior and fabric could not be fully accessed or hence observed. Therefore, the investigation proceeded on the basis of individual building components solely from an architectural perspective. In some cases, the building fabric was recorded in photographs, measurements, sketches and drawings during the course of several inspections.

Archival research at the Stadtarchiv Dessau-Rosslau
Pictures: Natascha Meuser

Terms and Definitions
How Content is Referred To



Förderverein Mausoleum e.V.
von Heinz Mellies

Am 18. Januar 2007 gründete sich, während draußen „Emil" tobte, im Café des Museums für Stadtgeschichte im Dessauer Schloss Johannbau auf Initiative des Stadtrates Dr. Ulrich Palmer unser Verein mit zz. 14 Mitgliedern. Sie alle vereint das Ideal, diesen unverzichtbaren Kulturbau zu erhalten und der Rekonstruktion und damit der Besichtigung und einer passenden Nutzung für die Dessauer und ihre Gäste, zugänglich zu machen.

Das Bauwerk entstand unter Herzog Friedrich I. von Anhalt unter Leitung des Berliner Architekten Franz Schwechten zwischen 1894 – 1898 zur Grablege von 10 Mitgliedern des herzoglichen Hauses, da die traditionellen Grüftanlagen in der St. Marienkirche ausgelastet war. Schwechten galt als Meister der Grunderzeitarchitektur (u.a. Kaiser-Wilhelm-Gedächtniskirche in Berlin).
Der einzigartige Kuppelbau mit einer Gesamthöhe von 43m und max. 26 m Durchmesser überstand den 2. Weltkrieg (speziell den 7. März 1945) und die DDR-Zeit einigermaßen gut, wobei dem Vandalismus und jetzt zunehmend Bauschäden zuzuschreiben sind, so dass das Mausoleum inklusive Außenanlagen seit ca. 8 Jahren gesperrt werden musste(n).
Auf Engagement von Frau Christa Müller, die sich noch persönlich erinnern kann, wurden durch die Christusgemeinde zwischen 1946 und 1950 nachmittägliche Gottesdienste sonntags im Mausoleum durchgeführt, wobei auch regelmäßig das Kinderterzett Renate Schmidt, Christa und Elisabeth Müller sang. Nur in Kenntnis der verfeindeten Parteiungen in der Krypta und dem Gesellschaftssystem kann die Entscheidung nachvollzogen werden, in einer unangemeldeten Aktion im Juni 1958 die Reste der Toten aus den Sarkophagen auf den Ziegler Friedhof zu verbringen.

Dankenswerterweise überwand der 1958 in unmittelbarer Nachbarschaft gegründete Lehrpark für Tier- und Pflanzenkunde zusätzlich eine Aufschüttung für das Mausoleum und kam (anfangs) Das 1961 entfernte Kreuz wurde bei der Rekonstruktion der Kuppel (im Zustand 1998/97 ersetzt. Auch erhielt die Kuppel eine Bedachung aus eloxiertem Aluminium. 2012 wurde eine in denkmalpflegerischen Dingen versierte Baufirma aus Brandenburg mit einem Baugutachten beauftragt.
Seit dem 23. Juni 1994 ist die Stadt Dessau für Pflege und Erhalt zuständig, wodurch zuletzt nach Instandhaltungsarbeiten 1990-93 an Seitendächern und Westfassade Sicherungsmaßnahmen zur Regenableitung zwecks Trockenlegung 1999 erfolgten.
Wohl wurde 2012 ein in denkmalpflegerischen Dingen versierte Baufirma aus Brandenburg mit einem Baugutachten beauftragt, da jedoch der städtische Haushalt

Above: Building description of the Mausoleum in Dessau.
Das herzögliche Mausoleum in Dessau. Ein Bauwerk und seine Geschichte(n).
Picture: Förderverein Mausoleum e.V., Dessau 2013
Left: Construction plan
Picture: Stadtarchiv Dessau-Rosslau

Construction Phase Plans
The construction phase plan provides a comprehensive overview of the current condition of the building with regard to its architectural history. It sets out the abstract results of the architectural and historical study according to different epochs and combines individual pieces of knowledge in diagrams.

Building Descriptions
The description is a detailed and neutral analysis (location, subject matter, attributes, etc.), arranged according to what, where, how, when, why, etc. In addition to factual information, the building description may also contain interpretations of research findings which must be identified as such.

Building Documentation
In this context, the documentation offers the most complete portfolio with regard to text, images, plans and drawings. It seeks to achieve the greatest possible degree of impartiality. Before even beginning, the form and density of the documentation must be ascertained.

1

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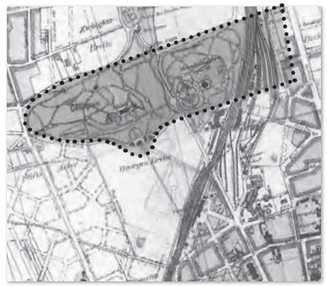

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5

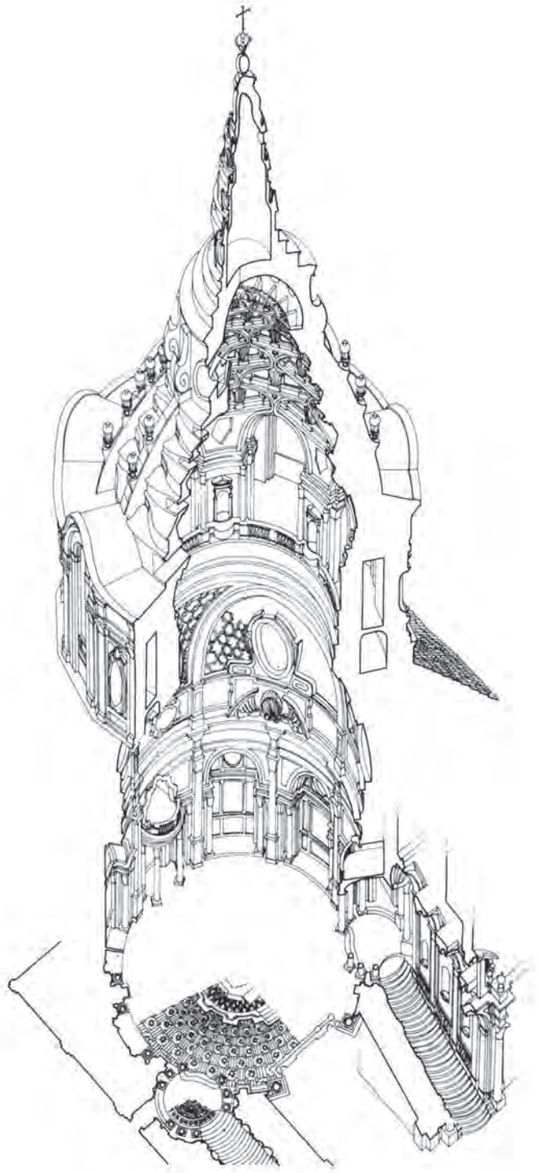
Levels of Maps
How to Read Plans

1 Albert Schwendy: Site plan of Dessau and its surroundings, 1809
2 Plan of the ducal capital and residence city of Dessau, 1900
3 Plan of the ducal mausoleum. Park near Dessau (undated)
4 Mausoleum park, 1944
5 Development plan of green spaces (Stadtarchiv Dessau-Rosslau)

A map is a footprint in time and is used to show and describe architecture. The first method of representation mentioned by Vitruvius[1] is iconography, the footprint of an object left on the soil, and traces of this method are found as early as 7200 BCE.[2] Historic maps offer a link to the past and provide information about local history and the development of a site, linked to its neighbourhood. They offer a rich source of information about land ownership and boundaries. Plans and maps are drawings that require a high level of abstraction on the part of those who carry it out and by whom it is interpreted: a client, even if not trained, can understand the intentions of the architect by looking at the plans of a project since information is conveyed in a clear and comprehensible manner.
Through plans and maps, land and buildings are described and represented graphically, including their sise and location, their development as well as the type and delimitation of their use.

They are used as evidence of site boundaries as well as for planning or land division. A method for researching is to scale the plans in the same sise and compare the most evident facts and information abut the site. How can plans be read furthermore? The views used in construction drawings are the top, front, side, and back. The top view is called a »plan drawing«. Front, side, and back views are called »elevations«. A view of the interior of the building is called »section« or »interior elevation«. Reading construction drawings is the gathering of information from a drawing. It involves two principal elements: visualisation and interpretation. Visualisation is the ability to create a mental image of a building from a set of working drawings. A study of drawing reading principles and learning to sketch will help one visualise construction drawings. Interpretation is the ability to understand lines, symbols, dimensions, notes, and other information on the working drawings.

1 Vitruvius
2 The first evidence of what we call a plan is visible in a drawing on a wall in Catal Höyuk (Turkey), dated between 7200 and 6800 BCE.



Guarino Guarini: Axonometry of SS. Sidone in Turin
Picture: Hinse, Source: The Morphology of the Times. European Cities and their Historical Growth. Berlin 2014, p. 122

Sketches and freehand drawings
Sketching is both the search for and sampling of shapes and designs, as well as a form of expression for architects to convey ideas that are confined to the most essential features. Such ideas must not always be drawn to scale and can be drawn freehand. Sketches are thus an essential component of the architectural creative process and simultaneously provide a useful tool.

Diagram
Diagrams help to communicate and visualise complex ideas, systems and contexts across language and cultural barriers in a clear and comprehensive manner. Yet, in addition to serving this function they also act as small design objects created in the unmistakable style of their author. They have long formed a new inspiring art discipline.

Preliminary design drawings
The preliminary design drawing is the representation of the planning concept with the principal dimensions, design, function, position on the building site and integration in the surrounding area – if necessary with the participation of other planning services. It forms the basis for assessing the requirements for granting planning permission.

Measured drawings
Architectural drawings accurately convey the current state of construction. These are created to the extent and scale necessary.

Design drawings
Design drawings serve as the basis for required building documentation and present a planning concept by consolidating, for example, creative, functional, economic, site-specific or ecological requirements by involving other experts involved in planning. The process may also include requirements for the protection of both nature and species.

Building instruction drawings
Building instruction drawings are draft designs supplemented by information that is required by building guideline regulations of the respective country. These drawings form the basis of the application for a building permit and serve building authorities in the legal and technical evaluation of planned construction measures.

As-built drawings
As-built drawings contain illustrations required for the completion of the project, as well as information based on blueprints, approval planning and the contributions of other experts involved in planning. Particulars mentioned in working plans and detailed drawings serve as a basis for technical specifications and the completion of construction work.

Settlement drawings
All services performed in accordance with calculations can be clearly identified.

Working drawings
Working drawings contain all relevant information on a property or enclosure for the respective purpose.

Position plans
Created by the structural engineer, these are based on the conception design and are used to explain static calculations.

Formwork drawings
In addition to as-built drawings, formwork drawings also show the components to be encased in either concrete, reinforced concrete or prestressed concrete structures.

Carcass drawings
Carcass drawings are the basis for the assembly of the structure. They contain all forms relevant to the carcass and dimensions of recesses, openings and so forth.

Reinforcement drawings
The representation contains all information required for bending and laying the reinforcement in reinforced and prestressed concrete structures.

Prefab drawings
For the construction of prefabricated structures made of either concrete, reinforced concrete, prestressed concrete or brickwork in a factory, prefab drawings and lists of parts are produced.

Image Quality and Accuracy
What is Documented and How

When it comes to the quality of image layouts, it is of crucial importance to pay heed from the outset to the resolution to be sought (at least 300 dpi). In addition to technical parameters relating to the camera and lens, the viewpoint and the frontal alignment of the image, environmental parameters must also be observed (shadows, contrasts, etc.) to offer optimum legibility of the utmost authenticity. At least two reference points or a dimension line (scale given in metres) should be displayed in the image to enable a rough comparison in terms of measurements. The following list sets out a selection of building components which may be subject to investigation.

- Wall fixtures (wallpaper, tiles, etc.)
- Surfaces (colour schemes, texture, etc.)
- Plaster (composition, granulation, etc.)
- Masonry (structure, texture, etc.)
- Ceilings (stucco ceilings, coffered ceilings, etc.)
- Special parts (window frames, stairs, etc.)
- Furniture and decoration

Documentation tools must allow providers to paint an accurate picture of the building or construction details using structured, discrete data.
Pictures: Marcel Kahmann

Structures and Surfaces
How Layers Document Construction Phases

Structures and surfaces have always been a contemporary document of the respective handicraft technology and are or great assistance in the interpretation of buildings and construction phases. Analyses involve identifying and comparing materials as well as determining composition, origin and age. The following list sets out a selection of objects and components which proved helpful in the examination of the building. A thorough understanding of the architectural, historical, physical context of the structures and the surfaces is essential in the evaluation of a building. An analysis of materials was carried out on site by observing construction elements which were still available during the various construction phases, such as:

- Floors: floor screed, parquet and linoleum
  Doors: wooden doors, doorknobs, type of wood, colour scheme
- Door frames: construction method
- Windows: construction method, colour scheme, opening directions, sealing, type of glass, ornamentation
- Wallpaper: materials, colours, patterns etc.

The identification, retention, protection, and repair of character-defining elements should be given prime consideration in every preservation project.
Pictures: Natascha Meuser

Room specification

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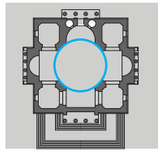
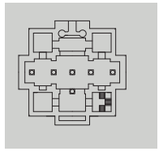
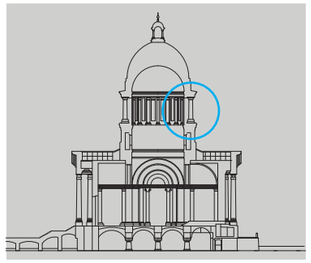




Plan Description		Plannumber
Dome		**T2–OG01–D–001**
Object **Mausoleum** **Im Tierpark** **06844 Dessau-Roßlau**	Building Part	
	Room	
	Level	
	Date	
Room specification	Nr.	



Beschreibung:

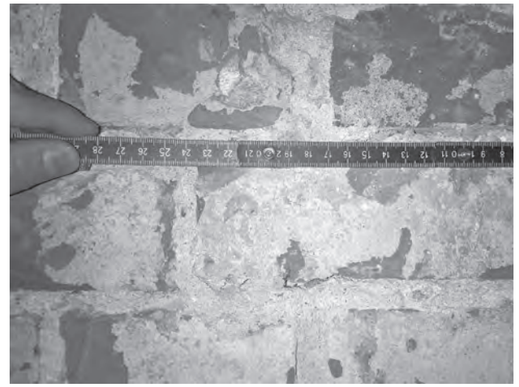
Er hörte leise Schritte hinter sich. Das bedeutete nichts Gutes. Wer würde ihm schon folgen, spät in der Nacht und dazu noch in dieser engen Gasse mitten im übel beleumundeten Hafenviertel? Gerade jetzt, wo er das Ding seines Lebens gedreht hatte und mit der Beute verschwinden wollte! Hatte einer seiner zahllosen Kollegen dieselbe Idee gehabt, ihn beobachtet und abgewartet, um ihn nun um die Früchte seiner Arbeit zu erleichtern? Oder gehörten die Schritte hinter ihm zu einem der unzähligen Gesetzeshüter dieser Stadt, und die stählerne Acht um seine Handgelenke würde gleich zuschnappen? Er konnte die Aufforderung stehen zu bleiben schon hören. Gehetzt sah er sich um. Plötzlich erblickte er den schmalen Durchgang.

1 Er hörte leise Schritte hinter sich. Das bedeutete nichts Gutes. Wer würde ihm schon folgen, spät in der Nacht und dazu noch in dieser engen
2 Gasse mitten im übel beleumundeten Hafenviertel? Gerade jetzt, wo er das Ding seines Lebens gedreht hatte.

Room Programme
How Findings are Documented

A room programme is the most comprehensive documentation instrument for any historical and architectural study. Interior components worthy of preservation may include the building's plan (sequence of spaces and circulation patterns), the building's spaces (rooms and volumes), individual architectural features, and the various finishes and materials that make up the walls, floors, and ceilings. Systematically, room programmes may also be used for other units denoting spaces, such as façades, stairs and windows. A room programme is a specific type of report (a collection of spatial protocols) and provides a systematic and complete documentation of current spatial conditions (construction, surfaces, wall décor, mobile historic inventories, damages, construction joints, etc.) on the basis of text, plans and photographs. Room programmes must be consistent and should include the following:

- Title/date/overall plan/ site plan/ Organisation numbers/drawings/text
- Details/evaluation



While the exterior of a building may be its most prominent visible aspect, or its »public face«, its interior can be even more important in conveying the building's history and development over time.
Picture: Marcel Kahmann

Graphic Representation
How to Make Drawings Legible

An initial assessment provides an overarching architectural and historical evaluation. It typically involves an inspection of the entire property, the monitoring of visible findings and research of the most important archival documents. It takes place mostly on a very tight schedule at the beginning of a project and is not a fully fledged architectural investigation. When it comes to complex and extensive buildings as well as changes envisaged with regard to construction work, it may be necessary to prepare an architectural and historical study. An initial assessment cannot act as a substitute for this. The in-depth architectural and historical study is based on the initial assessment and normally takes place at the premises in the run-up to the changes envisaged. Consequently, it may concern the entire building or sub-areas. The necessary steps are highly dependent on criteria set by the building (structural engineering, fittings, prominence, the extent of the proposed changes, etc.). In addition to building surveys and archival research, it typically involves analyses of the respective issues at stake.

Left: Design for mosaic tiles by the architect Franz Schwechten in the Capella Palatina, Palermo
Picture: Architekturmuseum, Technical University of Berlin, Inv. Nr. 46381
Top: Mosaic tiles in the Mausoleum, Dessau
Picture: Natascha Meuser

Identifying the Source
How to Evaluate Information

The evaluation is a crucial part of any architectural and historical study and is based on the individual documented findings of the building survey. It allows for a comprehensive integration of knowledge and a collective record of the building's architectural history. The evaluation of the many results in relation to materials, engineering, handicrafts, art, culture and history enables one to draw conclusions on stylistic epochs in relation to the building. This concerns construction measures (architectural history) as well as preservation and restoration measures (history of restoration). The evaluation typically involves a chronological description of the individual construction phases, in terms of their development, as well as a final statement. The evaluation may be structured systematically (site, description, dating, notes, etc.) and, if necessary, accompanied by detailed photographs and plans. It is logical to produce an argument which may be justified by verifiable references to the relevant documentation. When using written sources and literature, precise citations should be given (list of references, an index of images or a biography).

A review of the building's history will reveal why and when the building achieved significance or how it contributes to the significance of the district: Students at the Stadtarchiv Dessau-Rosslau.
Pictures: Natascha Meuser

Archaeological excavation site, Karthago/Tunis (2018)
Included in the World Heritage List in 1979
Picture: Natascha Meuser

Picture: DOM publishers

Villa Tugendhat

How noble materials become part of the architectural concept, without being decoration or ornamentation

Sneha Rajagopalar Sreedhaian

Located on a hill overlooking the city of Brno, Villa Tugendhat is a seminal work of International Style architecture by Ludwig Mies van der Rohe. Based upon innovative spatial concepts first introduced by Mies van der Rohe at the 1929 *Barcelona International Exposition*, the villa has an open floor plan and operable floor-to-ceiling steel and glass windows that visually and physically dissolve the barrier between interior and exterior living spaces. The structure combined new industrial technologies, such as steel and reinforced concrete, with chrome, travertine, and onyx. Furnishings like the famous Tugendhat chair were specifically designed by the architect for the villa.

After the Tugendhat family fled Europe during the Second World War, the house served numerous functions and underwent a number of changes to accommodate new occupants, until becoming the property of the city of Brno in 1969. The villa suffered from years of deferred maintenance, during which time the main terrace became structurally unstable and the gardens were altered into grounds that could be more easily maintained.

Project
Villa Tugendhat

Location
Cernopolní 45, 613 00 Brno, Czech Republic

Client
Fritz and Grete Tugendhat;
Restoration: Stadt Brünn

Architecture
Ludwig Mies van der Rohe (1886–1969)

Others involved
Restoration: Omnia Projekt, Brno; Archteam, Prague; Atelier Raw, Brno

Completion
1930
Restoration 2012

World Heritage Site
Since 2001

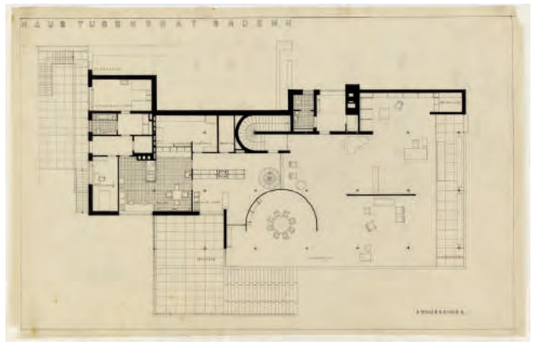
»Apart from Mies' personality and his original conception of space, the Tugendhats were also particularly impressed by his feeling for material.«

Carla Maher

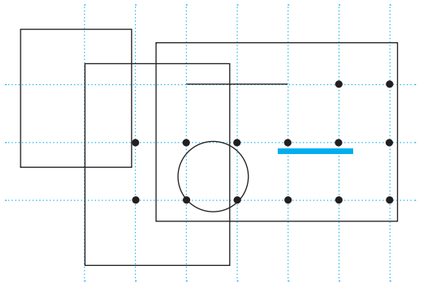
The villa's exposed location on a slope
Picture: Hochschule Anhalt

Layout plan of the city of Brno, 1890
Picture: Villa Tugendhat, Brno City Museum

Layout plan of the city of Brno, 1909
Picture: Villa Tugendhat, Brno City Museum



Ground floor (1928–1930), ink and pencil on tracing paper
Picture: ARS, New York / VG Bild-Kunst, Bonn



Geometric analysis of the ground-floor plan
Picture: Sneha Rajagopalar Sreedhaian

The Italian, almost white travertine from Tivoli ranks among the original stone elements. This was employed in the interiors on, for example, the floors of the entrance hall and the staircases, and in the exteriors on the parapet and the bases of the upper terrace and the garden terrace with the stairs. The so-called onyx wall is a truly remarkable decorative and at the same time functional stone element in the interior of the villa. The honey-coloured, rock with white veins was mined from the Atlas Mountains in former French Morocco in North Africa and is actually aragonite sediment (calcium carbonate). »I do not know which stonemason company Mies obtained the stone from. Mr. Lohan told me he found it in Hamburg where it was supposed to be used for the production of two large vases for a luxury steamer. It had been committed to be sold, consequently they did not want to oblige Mies. He was so impressed by it, however, that he refused to give in and finally obtained it in the end (…) Mies personally supervised the exact cutting and placing of the slab so as to allow the lines of the stone to stand out properly.« The special characteristics of the onyx are intensified during sunny days in winter.[1]

1 http://www.tugendhat.eu/en/the-materials.html, last viewed on 30 January 2019

Use of Stone
A Sample

The onyx, a yellowish rock with white veins, was mined from Morocco's Atlas Mountains

The natural grain runs across the onyx wall

Thickness of the onyx wall: 40 mm

The onyx wall in the main living area

Travertine floor covering from Tivoli in Italy

Travertine flush-walled skirting boards

Pictures: Hochschule Anhalt

Jointless meeting of the linoleum and stone

Travertine staircases with flush-walled skirting boards

The point where the cross-shaped steel supports meet the travertine floor covering

Travertine radiator cover

Travertine is also used on the exteriors

Travertine on the parapet and garden terrace with stairs

Archaeological excavation site, Karthago/Tunis (2018)
Included in the World Heritage List in 1979
Picture: Natascha Meuser

Natascha Meuser

Villa de Mandrot

How regional materials create a continuous harmony between landscape and architecture

Nataly Solorza Martin

Located in France, the Villa de Mandrot, designed by Le Corbusier in 1931, influenced Modern architects during the 1930s and 1940s. The masonry walls of the house were perforated with different openings. The confrontation of purist and naturalistic qualities affects the understanding of both. The way Le Corbusier uses stone, stucco, and glass shows a deep understanding of the materials. In contrast to these purist qualities are the expressive use of rough stone and the manipulation of the landscape, both of which hark back to the naturalism of his earliest Swiss architecture. In fact, the stone walls are seen as decorative patterning rather than a solid structural system in the same way that it was traditionally prescribed to a stone wall at that time. In between the stone end walls, at the centre of the house, is a concrete frame of columns and beams set in from a free façade. The thin infill panels of glass and stucco, together with the masonry, create an ambiguous composition of transparent and overlapping planes. Modernists eliminated ornamented decoration and stone became a weightless skin – a very Modern way to make a façade.

Project
Villa de Mandrot

Location
503, route de l'Artaude
83220 Le Pradet, France

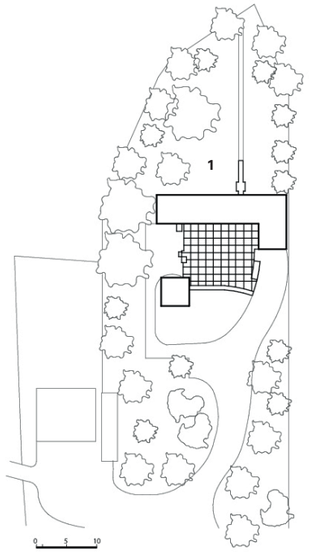
Client
Hélène de Mandrot

Architecture
Charles-Édouard Jeanneret (1887–1965), known as Le Corbusier

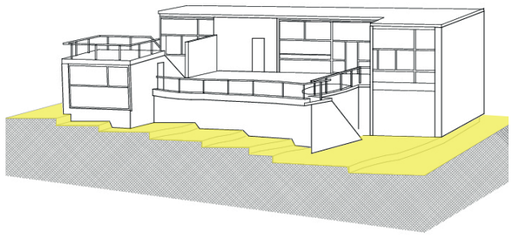
Completion
1929

1 The entrance to the house is almost like a processional staircase. The building and landscape were meant to be experienced as one.
Picture: Utzon Photos

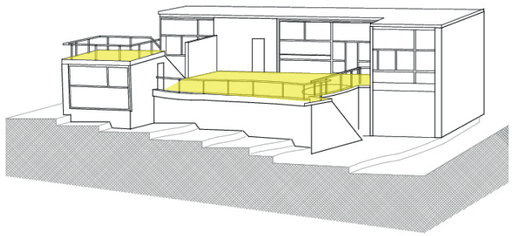
A narrow natural stone path runs in axis to the entrance.
Picture: Le Corbusier Foundation



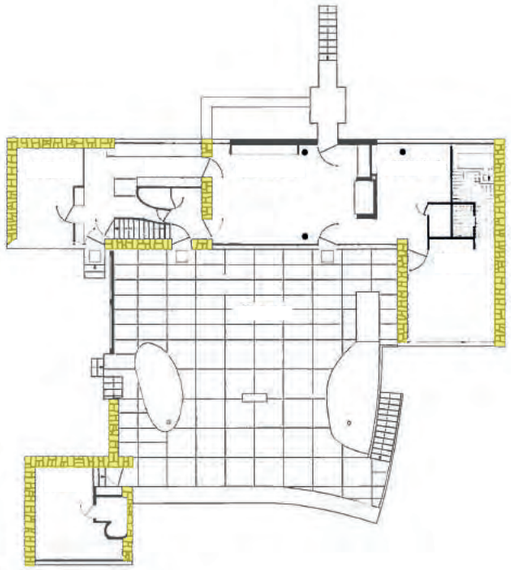
Site plan
Picture: Nataly Solorza Martin



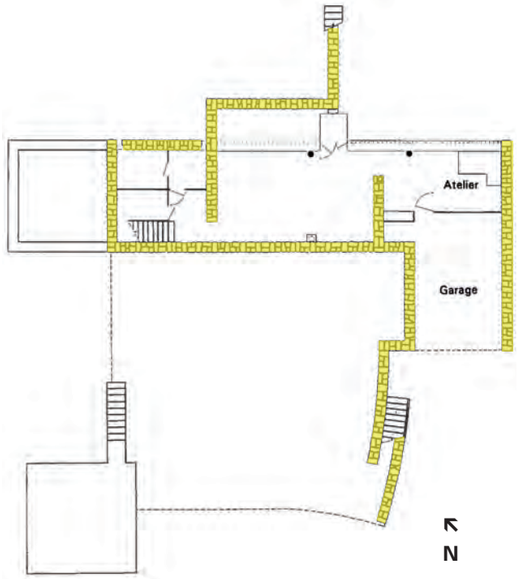
Interpretation of the processional stairs linking the house to its natural surroundings.
Picture: Nataly Solorza Martin



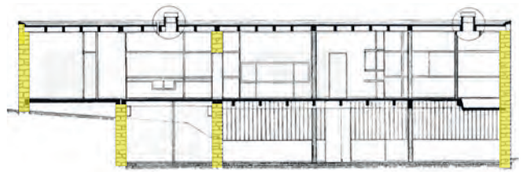
The exterior horizontal surfaces are also made of natural stone and connect the interior with the exterior.
Picture: Nataly Solorza Martin



Ground floor



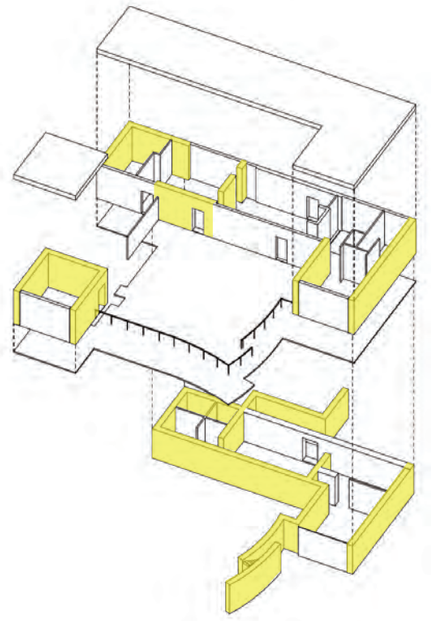
Basement



Section

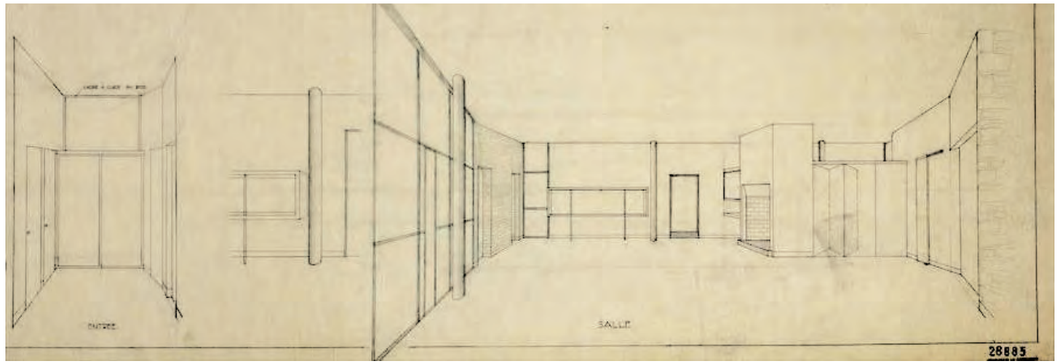
The architectural features of the building, such as the plan layouts and the façade composition, remained true to the generic schemes that Le Corbusier had worked on his previous modernist houses.
The building consists of reinforced-concrete floors, which are supported by masonry walls made from regional stone.
The classification was made very clearly between the load-bearing walls, which are considered as easels carrying the floors, and the glazed walls that fill the gaps.

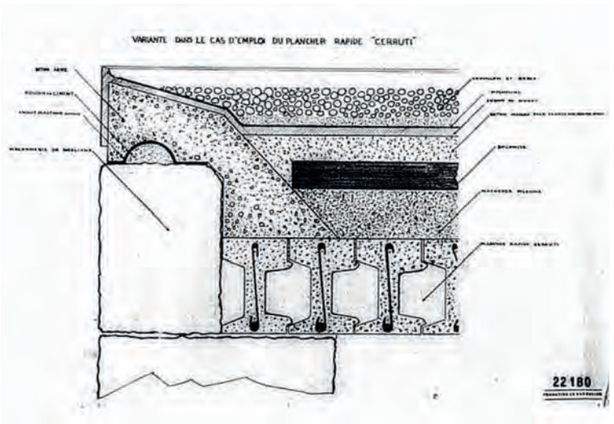
Picture: Le Corbusier Foundation



Scheme for the stone walls
Picture: Nataly Solorza Martin

The interior stone was merely limed and thus reveals its natural qualities
Picture: Le Corbusier Foundation





Top: Preliminary design: Le Corbusier left exposed stone to contrast with the metal framing, while simultaneously exploring a new relation with the landscape.
Pictures: Le Corbusier Foundation

Bottom: Roof detail of the Villa de Mandrot
Picture: Le Corbusier Foundation

Picture: Natascha Meuser

Picture: DOM publishers

Atelierhaus Georg Kolbe

The anatomy of a brick aesthetic: how Kolbe celebrated the inspiring potential of fired earth

Somayeh Akbaritakhtmeshloo
Haiyang Sun

Georg Kolbe was one of the leading German figure sculptors of his generation. He worked with various well known architects of his time, among them Walter Gropius, Bruno Taut, Henry van de Velde, and Hans Poelzig. In 1929 he collaborated with Lilly Reich and Mies van der Rohe on the Barcelona Pavilion. Mies placed Kolbe's sculpture *Morgen* in the reflection pool of the Barcelona Pavilion.

The design for Kolbe's studio was closely based on his own ideas and executed by the Swiss architect Ernst Rentsch and the former Bauhaus student Paul Linder. A sculpture garden with old pine trees lies between two parallel, strictly cubic brick buildings. Kolbe's studio is dominated by ceiling-height windows, which have a clear affinity to architectural modernism. The second building contained living quarters, including a painter's studio. After several additions in 1932 and 1995, the studio complex was renovated in 2016 and today serves as the Georg Kolbe Museum, a space dedicated to 20th-century sculpture exhibitions.

Project
Atelierhaus Georg Kolbe
Residential house/studio building
today: Georg Kolbe Museum

Location
Sensburger Allee 25–26
14055 Berlin

Client
Georg Kolbe (1877–1947)

Architecture
Ernst Rentsch
Extension 1932: Paul Linder
Extension 1995: Architekten AGP

Completion
1929
Reconstruction: 1932–1935
Extension 1: 1995
Extension 2: 2016

Execution
J. Sasse und Sohn (1929)

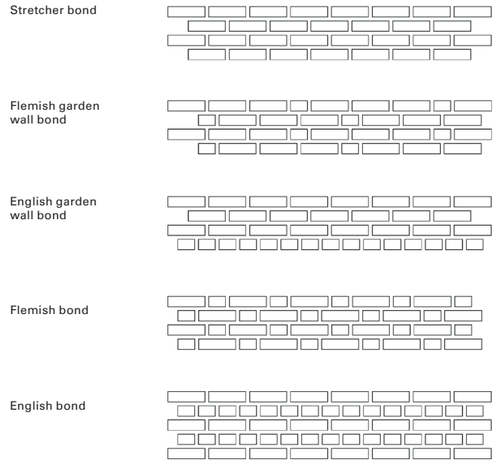
Image: Sculpture at German Pavilion for the Universal Exposition of 1929 in Barcelona.

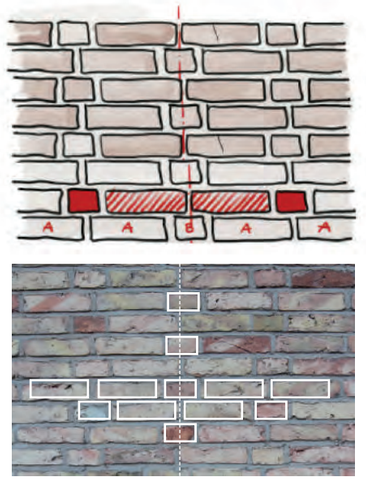
View from the studio into the garden
Picture: DOM publishers

Architecture

The architecture of this ensemble is characterised by its cubic forms and clear lines, its characteristic brick façade, and its sensitive positioning in the forest property. It is the only surviving artist's house in Berlin whose former function has remained visible despite its current use as an art museum. The exterior view of the building and the ground plan situation correspond largely to its appearance from the 1920s, but since the construction of the extension and the associated repairs to the studio building, no further holistic repair measures have been carried out. The physical condition of the Georg Kolbe Museum therefore required a great deal of refurbishment in several areas. In close coordination with the German Federal Monuments Office, the studio building was adapted to meet the current standards of museum operation through the renovation of the historic building, the technical building equipment and the security requirements. Great emphasis was placed on preserving the authenticity of the architectural language. The concept was to preserve the building's structure through careful measures and to retain the exterior and interior appearance of the building. The performed and documented analyses and inventory studies formed the basis for the planning.

Brickwork Bonds





The monolithic façade is modulated with powerful, simple shapes that reference the relationship to nature. Kolbe used a brickwork bond based on the A–A–B rhythm for the brick bond pattern. Large covering plates on top of the walls accentuate their horizontal aspects. Vertically-arranged stones highlight the window lintels. The corner of the building is sharp-edged without interrupting the rhythm of the brickwork.

Material

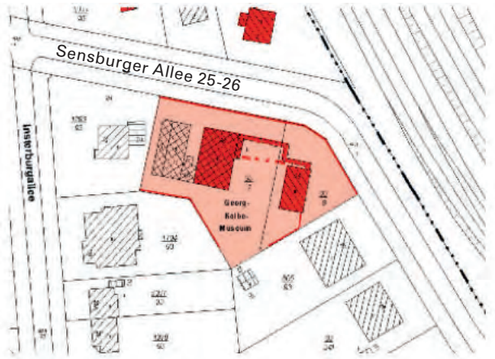
Fired bricks are one of the longest lasting and strongest building materials. Sometimes referred to as artificial stone, they are also one of the oldest construction materials. The brick blocks are almost like Lego blocks, and can be combined together to form creative masterpieces through innovative thinking and skilled craftsmanship.
The monolithic façade is modulated with powerful, simple shapes that reference the relationship to nature. For the pattern in the brick bond, Kolbe used a brickwork bond based on the A–A–B rhythm. Concrete covering plates accentuate the horizontal elements. The window lintels are accented with vertically arranged stones that break the strict horizontal and highlight the windows. The corners of the building are sharp yet do not interrupt the rhythm of the brickwork.

Bricks and Building Physics

Bricks are primarily made of sand and clay. The sand acts as a filler, and clay is a substance that has some rather remarkable qualities. The building physics concept is based on the least possible interference with the building fabric and at the same time leads to significant energy savings. Therefore sustainability has been improved.

Picture: DOM publishers

Georg Kolbe's wife, Benjamine; the original building; the living quarters; Georg Kolbe with the German diplomat Herbert von Dirksen. In: Wallner, Julia: *Georg Kolbe*, Berlin, 2017, pp. 168–169



Monument area: complete complex consisting of two building blocks with a courtyard, within a sculpture park
Picture: Denkmalkarte Berlin

Excerpt from the monuments in Berlin
Web link: https://www.berlin.de/landesdenkmalamt/denkmale/liste-karte-datenbank/denkmalkarte/

Picture: DOM publishers

Brick and Stone
A Sample

The inner courtyard is protected from view by a 2-metre-high wall. This protective wall merges with the house wall.

Concrete cover plates with an overhang accentuate the strong horizontal appearance of the building.

Concrete and brick dress walls and floors.

In the courtyard, the natural stone is in harmony with the brick.

Horizontal concrete details run through the brick wall.

Concrete cover plates finish the brick wall with its bond pattern.

Pictures: HSA

Appendix

Appendix

Bibliography

Bibliography

Benton, Tim, ‘The Villa de Mandrot and the Place of the Imagination’, in: Richard, Michel, Annuaire d’Études Corbuséennes, 2011, pp. 92–105.

Boxer, Sarah, ‘Mies Villa, Jostled by History, is in a Race Against Time’, in: The New York Times21 August 2004.

Colvin, Howard, Architecture and the Afterlife, New Haven/London, 1991.

Emden, Cemal, Le Corbusier. The Complete Buildings, Munich/London /New York 2017.

Gans, Deborah, The Le Corbusier Guide, New York, 1987.

Hawkes, Dean, The Environmental Imagination: Technics and Poetics of the Architectural Environment, New York, 2008.

Jencks, Charles: Le Corbusier and the Continual Revolution in Architecture, New York, 2000.

Kurrent, Friedrich, Le Corbusier: 40 Wohnhäuser/40 Houses, Salzburg, 1997.

Rentsch, Ernst, ‘Atelier und Wohnhaus zu Berlin-Charlottenburg’, in: Deutsche Kunst und Dekoration, 33/1930, pp. 119–122.

Rawsthorn, Alice, ‘Reopening a Mies Modernist Landmark’, in: The New York Times, February 24, 2012.

Villa Tugendhat, ‘The Commissioners’, online: http://www.tugendhat.eu/en/the-commissioners-.html, accessed 19 January 2019.

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