The Art and Science of Conservation

Robert Campbell, Jorge Silvetti, and Jerry Podany

Welcome by James Wood

This panel discussion was given at the 1924th Stated Meeting, held at the Getty Villa in Malibu, California, on February 23, 2008.

Inner Peristyle at the J. Paul Getty Museum at the Getty Villa in Malibu. Photo by Julius Shulman and Juergen Nogai. © 2006 J. Paul Getty Trust.

James Wood

James Wood is President and Chief Executive Officer of the J. Paul Getty Trust. He has been a Fellow of the American Academy of Arts and Sciences since 1997.

Welcome

The subject of tonight's discussion at the Getty Villa, the art and science of conservation, is central to our complex identity. We are quite unique in the mix of expertise and viewpoints that resides under several roofs on two campuses, which, in their totality, make up a community that is university and laboratory, art museum and public gardens. Therefore, it is particularly appropriate for us to be hosting the Academy, with its diverse membership and focus on the arts and the sciences.

Of our two campuses – I hope you all have a chance to visit both – it is ideal that we are meeting at the Villa tonight. While a vital part of the J. Paul Getty Museum, it has also evolved into a center for comparative archaeology, with a mission beyond the study of the ancient Mediterranean. In fact, in the years ahead we are planning exhibitions and research programs that will deal with pre-Columbian Mexico and ancient bronzes from Southeast Asia, among several other topics.

The J. Paul Getty Trust is a young institution, emerging from adolescence to young adulthood. And at this crucial juncture we have reviewed and refocused our mission. Central to its new wording is the phrase "To further knowledge and nurture critical seeing." Our means should and must be as broad as the Academy's membership, while our ends need to be tightly focused on enhancing the individual's experience of specific and exemplary examples of the visual arts.

Robert Campbell

Robert Campbell, a Fellow of the American Academy of Arts and Sciences since 1993, is the Pulitzer Prize-winning architecture critic of The Boston Globe *and writes a regular column, "Critique," for the magazine* Architectural Record.

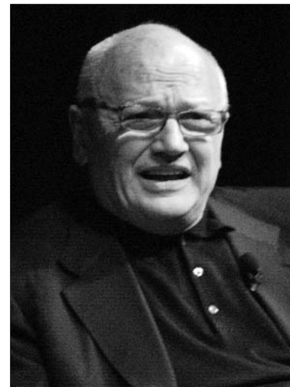
Presentation

My first experience at the Getty Villa was probably 20 or 30 years ago, and although it was certainly elegant, it was also very strange. Back then you drove your car into an enormous hole that seemed to be the basement, and you found your way into a rather dark place with a collection that has changed a great deal since then. I'm glad I had the opportunity to visit so many years ago because it gave me a chance to understand the transformation that has taken place.

That is, for me, a definition of architecture: the art of making places and expressing time.

We will be talking tonight about conservation – conservation of artifacts certainly. But also, for me, a subtler and more interesting kind of conservation: the conservation of an idea of place, a conservation of cultural continuity. This place is quite wonderful, and I hope one of the things we leave with tonight is a realization of why it is so wonderful. It is a place within California. You can see the ocean, the cliffs, the plantings. What was a Villa that was isolated from the rest of the world has now, as it were, been given a place in which to exist. And it's also been given a time, because we can see changes that have taken place on this site over the course of a couple of generations, changes that have taken place in the Getty Villa itself. So it has been linked into a continuum of time that goes back to ancient Romans but comes up to the present. For me, that is a definition of architecture: the art of making places and expressing time.

There is for me, and I think for Jorge Silvetti, a governing metaphor, a fictitious story about this site – often the case with architecture – that gives it meaning. Do you want to try to define that, Jorge?



Jorge Silvetti

Jorge Silvetti is the Nelson Robinson, Jr. Professor of Architecture at the Harvard University Graduate School of Design and a Principal of the architectural firm Machado and Silvetti Associates.

Presentation

I was listening today to some of the docents give tours. They have done a tremendous job at understanding what was here, and what it took to get to where the Villa is now. They tend to start with the same image: the idea of the excavation. To describe the way in which the Villa was reimagined or reconceived is to imagine that it is part of an excavation; that's how you discover. Sure, you enter from above and you see from above. However, what is important for those interested in process is to understand how it came about, how we followed an idea that wasn't our original one. That new idea, like most things in architecture, emerges as you work

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and get hints from solutions or other ideas that are being tested. Our idea also had to take into account what the Getty wanted – not an entirely clear and specific desire – and a few very important functional issues that needed to be solved.

Campbell: Your real idea came by attempting to solve problems then?

Silvetti: Solve problems, yes, including the big, big problem (that now seems to be so simple) of changing the entrance, which is a problem that a lot of museums seem to have had at the end of the twentieth century. In this case, the new design actually corrects the entrance to be authentic to a Roman house. Since its opening in the early 1970s, the Villa was entered at the south end of the outer peristyle from an elevator coming from the garage. Today you enter the museum, the house, from the proper door. This was an interest that the Getty had and something that we approved and adopted as a goal from the very beginning. We wanted to make this replica of a Roman villa a better tool to understand classical art.

The Getty Villa creates a governing story, a metaphor: that this is an archaeological excavation site.

Campbell: The original villa in Herculaneum, on which this was modeled, has never been fully excavated. Scholars have drilled through to it and examined pieces of it to try to find out as much as possible, but nobody knows exactly what it was. The Getty Villa here in California now picks up that history by creating a governing story, a metaphor: that this is an archaeological excavation site; that we cut down and down, and, amazingly enough, we found this temple at the bottom of the excavation. I know that the metaphor did not come at the beginning; it was something

that grew out of the process of investigation and design. But it is the reason why you now see horizontal striations in the walls as you approach the Villa, as if archeologists had dug down, level after level, through civilization after civilization. It's why you have what we never had before, the processional entrance, with views down into the fictional excavation site. That entrance pulls the place together in one powerful, artistic idea that doesn't need to be articulated to the visitor: you sense it in any case. How did you arrive at that?

Silvetti: Again, it's the result of attempting to solve problems. We needed to figure out how to bring people to this door because this building is at the bottom of a canyon. In its original state, and with the new large program incorporating many new functional components on the site besides the Museum that emerged after the programming phase,

We are very interested in materials and materiality, and in the quality of the materiality – the sensory aspects of architecture.

we all realized there was no place to put those new buildings and facilities unless you spread it into 60-some acres. But then you would have to move people, hundreds of people, in this site, which is incredibly difficult, especially given the topography. And we knew there were some things that needed to be located between the two buildings that were going to be preserved. So how could we bring people to that door of the Museum?

There seemed to be no place to do that, so one idea – there were many – was to bring people from above. As that idea began to take form, we questioned whether we should bring people up and then bring them down; that seems counter to the idea of something functional. We realized, though, that we would always have to bring people up: even parking requires using elevators or stairs to come to the level of the Villa. The canyon naturally creates the difference of levels. Once we knew that, no matter what, visitors would always have to climb in an elevator or take stairs, that didn't seem to be a wrong thing.

Then there was testing, risking life and limb in the hills, looking and thinking about height. As we moved around at that higher level, we realized for the first time that the Villa did not appear so imposing from above. And when looking from a distance and from above, we saw partial fragments and vignettes of the building framed by trees and such, that only then threw us back to something we said in passing at the beginning: during the competition we mentioned the idea of an archeological dig. It was, though, more or less a poetic idea about looking at this project at that point.

Campbell: Six architects were invited to compete for the job of redoing the Getty, and each was given a sketchbook and told to take it away for two weeks and bring it back. On the basis of what was in the sketchbook, the architect would be chosen. How did you respond when you saw these blank sketchbook pages?

Silvetti: At that time the Getty did not have a clear program, and the site was so difficult that nobody really knew what could be done. It wasn't really possible to run a traditional competition to choose a design and build that. So we were brought here and briefed for one day, with a second day of visits. At the end of those two days, we were each given one blank sketchbook and told that in two weeks, exactly, it had to be postmarked and sent back with our thoughts; that was all. Nobody really submitted a project in the end, and that was the beauty. We recorded thoughts and vignettes; we pasted together some things we liked. We said, "You know, it would be nice if something like this happens."

Campbell: Like what, for example?

Silvetti: Postcards of things that we collected, cutouts from papers, lots of sketches, and writing. It was, in our case, interesting because we were two architects. There was opportunity for dialogue between my partner Rodolfo Machado and me, in which we asked questions of each other and attempted to answer them and register that.

This went on until one day we realized that we had to put it in an envelope and send it. But since there was nothing that we had to finish, there was no pressure.

Real horizontal strata gave us a vocabulary, which is an essential component in any work of architecture – to know the vocabulary you are using in your building allows you to begin to make decisions that are consistent with each other.

Campbell: Has there ever been an exhibition of the six sketchbooks?

Silvetti: Some of the other sketchbooks are absolutely fantastic. They're very hard to exhibit, though, because they are sketchbooks. They are all here, and they were on exhibit when the Villa opened in 2006, to document the project and the process. But, again, they were opened to just one page, so you could see something, but not the whole content.

Campbell: At the time of submitting the sketchbook, what was your idea about what you might do?

Silvetti: We explored all the things that they posed to us in those two days, in terms of access. We talked about a palette of materials. We are very interested in materials and materiality, and in the quality of the materiality – the sensory aspects of architecture. We did talk about materials at that stage, too, although we thought at that time that it was going to be more of a masonry type of building in the more conventional way, rather than the concrete; the concrete came later.

The concrete is also the result of a very pressing need here in this very difficult site. Everybody knows about the technical issues of building in hillsides in California, but they are exacerbated here because you have the big jewel of the crown at the bottom of a canyon. You can't let these hills fall over the museum.

This project starts with, and is resolved with, retaining walls. That's why the language begins to be horizontal language, because we realized that we were building retaining walls from the garage all the way up to the hill and

that they will become a dominant feature of buildings and landscape. That becomes the vocabulary, and then you begin to think about it in aesthetic terms. You begin to think, what is the architectural expression of all these retaining walls, because we knew we were going to have them. The idea of horizontal strata appeared to us because they're not only long but also cover an incredible depth when you look at the difference of level in the whole site, which led us to think about the idea of continuity and how we could weave all of this together.

We fixed on using board-form concrete. For those who know a little bit of the history of architecture, concrete still has an association with Roman architecture. The Romans were the first builders to use concrete in an imaginative way. One thing led to the other, and

Rather than striving for an authenticity that it could never have, we decided that this building needed to create an atmosphere that would evoke and provide a setting for the display, study, and enjoyment of the art of antiquity.

we came up with the banding that is incredibly consistent throughout the project. You almost know at what height you are if you look at the material on which you're walking. Real horizontal strata gave us a vocabulary, which is an essential component in any work of architecture – I think in any work of art. To know the vocabulary you are using in your building allows you to begin to make decisions that are consistent with each other. Like a grammar.

Campbell: It's fascinating to me that what I call the governing metaphor grew out of this process; it was not some thing you dreamed up and imposed on the project.

Silvetti: I mentioned that there was an early manifestation of the metaphor, but it was in a purely poetic way, more or less a writing. It was somewhat forgotten, but then reappeared when we realized we would have the retaining walls and knew that people would enter from above and look down into something.

Campbell: For me, the single boldest thing that you did was put the outdoor theater face to face with the facade of the temple, the Villa, which creates a moment of centeredness and energy that I think is extraordinary.

Silvetti: Early on we realized that there would be a trap in this project – if our pursuit was to restore authenticity to the Villa. This building is not a villa from antiquity; it's a building from the twentieth century. Rather than striving for an authenticity that it could never have, we decided that this building needed to create an atmosphere that would evoke and provide a setting for the display, study, and enjoyment of the art of antiquity. The idea was to do that, but not to try to build something as close as possible to a Roman villa, in part because nobody knows exactly what the villa from Herculaneum looked like. And, of course, it was a house, not a museum.

The Getty has a good, successful program of ancient drama every summer, so somewhere on the property we had to incorporate an outdoor theater modeled on a classical theater. Our first attempt – it was fantastic – was to put the theater up in the hill. The property is very big (it's 60-some acres), and it goes fast up after the house. The theater would have been really high up, with the Pacific as the background and the proscenium below, with the Villa at your feet. It would have been spectacular, but that idea, even for the Getty, was a little too expensive. We knew then we needed to put a theater somewhere, and, particularly, somewhere that was easily accessible to the many people who come to public functions hosted at the Getty.

Campbell: And the Villa becomes the set?

Silvetti: Exactly. It's been very rewarding to see two different companies in the last two years stage classical plays in the theater, with the Villa, the portico, in the background.

Campbell: Let's turn to the question of conservation. The common ground between Jorge Silvetti and Jerry Podany is conservation. How did you consider conservation in your design?

Silvetti: In the construction, Jerry and I worked together on many features of the design of the Villa because there are aspects of the architecture that are directly related to conservation: considerations of how the building is built and how that might affect artifacts. That part of the collaboration helps illuminate what was at stake in this building, in the renovation.

Jerry Podany

Jerry Podany is Senior Conservator of Antiquities at the J. Paul Getty Museum. He is also President of the International Institute for Conservation of Historic and Artistic Works.

Presentation

What Jorge is referring to is one of the greatest threats we face here in Southern California: if you look at a chart of the numbers and intensities of earthquakes around the world, a lot of that data focus on Southern California. This is a great concern to us, and we've spent a number of decades and a great deal of effort to try to protect the collection from earthquake damage, leading to a lot of research and collaboration with engineers and scientists. We learned how to protect individual objects and cases, using specially designed mounts and base isolators that allow the earth to move freely under the object and the object to remain unaffected.

The renovation gave us a wonderful opportunity to look at the structure of the building. The Villa Museum is an incredibly stable building: it's built essentially on bedrock, the walls are hugely thick, and it will move with the earth during an earthquake. Our attention, then, really is on the contents, the

collection. We were able to strengthen a number of the floors and embed anchoring systems behind the walls for hanging objects. There are also anchor points that Jorge's team incorporated into the design of the terrazzo floors. As you go into the galleries, you see regular repeated circles or squares in these designs. These are covers for anchor points. The covers lift up and allow us to secure pedestals or objects to the gallery floor.

Jorge and I had a very interesting conversation about how numerous and how strong the wall anchors should be. Jorge asked, "What's the heaviest object you'd think about hanging there?" and I said, "Oh, three or four tons." "Three or four tons? Are you crazy? That's like a Volkswagen," he replied. However, in the first year of our new Villa, we had a series of monumental mosaics from Tunisia that were very close to that weight. Now we're able to put objects like these up safely and easily.

Our work involves not only restoration and responding to the needs of individual objects on display, but also questions of authenticity, issues of material science, preservation, and preventative conservation.

Campbell: Could you say a word about the objects? I am particularly interested in this question: to what stage of its life do you restore a particular object?

Podany: Most of our collection came from the marketplace, so the majority of the works have been restored or treated at some point in the past – all the way back to the eighteenth century in some cases. We're doing a project with Dresden right now that involves a wonderful object that was excavated, and entered the princely collections of Dresden in the late seventeenth century, and was restored as an Alexander the Great. However, that ended up to be the wrong restoration (it's an Antinous or Dionysus), so it had three different restorations between its discovery and the nineteenth century. During the war it was taken off to Moscow as war booty, and a train accident left it in about 150 pieces . . . until just recently, when we brought it here to the Getty. The debate now is, when we re-restore and repair the object, should it go back to the Baroque restoration or the nineteenth-century restorations – or should it be restored at all, or restored again but in a new way, since we now know more?

Campbell: What is the decision-making process then?

Podany: The decision-making process in a lot of these situations, but particularly with the Dresden object since it's not ours, is to gather together as many people as possible, who have particular ideas to bring to the table – scholars, scientists, and geologists, as a start. We work with many people and manage all of that input, all for the sake of long-term care and preservation of the collection.

Campbell: So that raises the question of what is conservation?

Podany: Conservation is a matter of stabilizing an object. Restoration, in its traditional definition, is bringing an object back to what it might have looked like originally, based on the state of knowledge at the time. Of course, that denies its entire history, and most of the time early restorations involved a lot of imagination, which led to a lot of misunderstanding. Conservation takes into account the issue of restoration, but it increasingly takes into account preservation: trying to make sure objects last as long as possible but are also accessible – which is sometimes contradictory.

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Campbell: I'm curious about the issue of forgery. Someone once told me that a forger can fool only his own generation, because later generations will see the original in a different way and forgeries will be spotted much more easily. Do you think that's true, and is it true of the Getty's objects?

Podany: I think it's true of the pieces that we've discovered to be forgeries. I think there may well be objects in galleries and museums across the world that are extraordinary forgeries, in which the forger has learned to overcome his or her own time. But I also think that there may well be a number of pieces that have been condemned as forgeries because they didn't present what the art historian, the scholar, or the archaeologist was used to, and as a result they've been hidden for a period of time, taken off view, but could very well be rediscovered again.

Campbell: These are fascinating subjects, and they all raise the question of what we mean by *conserve*, *conservator*, and *restore*: all of these words are so complicated that seem so simple. Other than by making objects safe – by ensuring, down to the foundations of the building, that nothing would ever be moved or damaged – how did you think of presenting these objects within the museum?

Silvetti: Through a fantastic process of collaboration. The way the museum operates as a museum, that is, the way it displays its objects, is not entirely our idea. The project alone was three years long, but it really took 12 years in total, working with, among others, Marion True and her staff. The museum was a project in itself, and we all worked together. The design of the cases was particularly collaborative. I always call them the Rolls Royce of cases because on the outside they are very good looking, but inside they have this incredible machinery that you can't see.

Campbell: They're climate controlled inside, are they not?

Silvetti: Yes, and they have the amazing capability to balance earthquakes. Some of the objects are floating, although you don't notice that. If there is movement, the rest of the world moves; they don't.

By collaborating so closely for so many years, we ensured that neither the architecture nor the objects take over one another. I think the harmony of the place is one of the most rewarding aspects of this unique process. It was always productive, and I learned so much. For example, for all of my years in school and all the things I've done in my life, in my life of painting, I realize that I learned color doing this project. I learned it because I brought my own knowledge, but I was surrounded by people who knew as much and more than I did.

Campbell: Do you mean the historicity of color? What aspect of color?

Silvetti: Color is one of the most difficult things. Everyone in the art world knows that there is the science of color, but, in the end, you either have it or you don't – the idea of how to combine colors and how to put them together. Here I worked with people with an extremely well-developed, sophisticated sensibility for colors. (Marion, in this sense, was spectacular.) In the museum, there were certainly technical issues that were really very difficult. But the color issue was one that probably involved the most hours – sample after sample, and testing and combining.

Conservation takes into account the issue of restoration, but it increasingly takes into account preservation: trying to make sure objects last as long as possible but are also accessible.

Campbell: Was this intuitive on your part, or were you trying to recapture colors that were traditional Roman colors?

Silvetti: Color, in my experience, can only be resolved by testing. You have to see it and then say what you think; you can't think of a color – at least I can't. Although we didn't paint, it was really hands-on. We were making these colors, changing them, accepting them, and sometimes trying again. It was a very long process.

Campbell: In the old Getty Museum, there were paintings. And paintings are damaged by sunlight. Now you have a museum in which, almost entirely, you have objects that are not easily damaged by sunlight. How did that affect the way you redesigned the building?

Silvetti: The amount of work and the transformation of the museum building are radical. I would say that high up on the list of things that changed so much is natural light. The previous Villa did not have natural light in any gallery. The windows you see in the atrium and around the inner peristyle were closed. They were fake blank windows, which we have now opened. In total, we opened approximately 60 windows and three skylights. The place is flooded with natural light, which provides that very rich sense of liveliness that natural light gives because it changes every second.

An additional benefit of the windows, something we didn't necessarily think would be a result, is that they help orient you everywhere you are: you see across, you see out, you see people that you saw five minutes ago, but you see them in the garden; you know exactly where you came from and where you're going. That's totally changed the experience of the building, which before, because it did not have any windows, was really more like a labyrinth. (But, of course, the Villa as it was then couldn't have natural light.) Most museums today are trying to bring in natural light, and there are some very successful ones that incorporate it in an indirect way. Here, though, it's direct.

Questions and Answers

Question: One of the most fascinating things I know about conservation activities under Jerry Podany's leadership has to do with a certain Russian krater. I wonder if he might relate to us the saga of the restoration of that Russian krater, the Boxy Krater.

Podany: While we were in Russia almost five years ago, looking at some objects for a loan for a special exhibition here at the Getty, we noticed the fragments of a wonderful and huge krater (a vase used as a mixing bowl). It was beautifully painted, but it was fragmentary. We offered to conserve this piece because we've developed a number of techniques, not only for sculpture, but also for ceramics and bronze, that are now internationally accepted as procedures in conservation. We wanted to apply these techniques and train some of the St. Petersburg conservators.

We started the process – as you can imagine, it takes a very long time to work through all the bureaucracy – and we thought we were almost there: the object would come, we would assemble it, we would re-create its basic shape, we would have an exhibition, there would be training. But we reached a point where customs officials just couldn't get around the possibility that they would send us 30 things (that is to say fragments of a vase) and get only one back (the restored, assembled vase).

We now have an incredible project with Berlin. Some absolutely monumental and beautiful south Italian vases, half of which are being conserved in Berlin, and half will be conserved here. These will come together for an exhibition here at the Getty Museum. It will be stunning and spectacular – and we won't have the same customs problems.

Question: What sorts of chemical and physical tests do you apply to determine authenticity of ceramics or sculptural things? How do you know they're not fakes?

Podany: It's both an art and a science. There's a whole range of tests that can be done for ceramics, including thermoluminescence, and for organic materials there's carbon 14. There's nothing for stone, but there is an understanding of what a surface should look like if it has undergone the kind of weathering that would be expected in either burial or exposure for thousands of years.

If stone has been restored and cleaned with acid, it's another story. All the evidence of age has been removed. Then it becomes a matter of comparing it to a database, like art historians do: looking at what we know to be authentic, what it looks like, what are the working techniques, what's the approach to sculpting – there's really quite a range. While some things are absolute, other things are not quite so sure. You build a pile of evidence that weighs more heavily in one way, either for its authenticity or lack thereof.

Question: You spoke of your discoveries about color, which led me to think about light, and the light here compared with the light of, say, Herculaneum. It strikes me that they may be quite similar. But did you do a lot of thinking about differences in the ambient light and the colors, and how did you try to deal with the issue? Did you try, in effect, to make adjustments for the differences in the light?

Silvetti: No, we were not after what I think is a very elusive, if not wrong, objective: recreating exact conditions. I think that's impossible. It was more about creating an at-

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mosphere, an evocation. We did make two extensive trips, one to museums of antiquities in Europe and another to Italian sites – Pompeii, Herculaneum, Hadrian's Villa – to see as much as we could of the experience of everything in those houses. Of course, color in some of the houses in Pompeii is quite vivid, and you learn a lot. We have more than 40 color studies that we did of actual walls. Styles of Pompeian painting are fairly elaborate in terms of ornamental decoration, but they also deal with very bold combinations of colors. We were not trying to create the murals and these representations, so we knew we were going to deal with abstract colors, not with highly ornamented decoration. We did study percentages, for instance, of what colors combined with what in this way.

It's more perceptual than scientific. It was looking at something, recording, and then studying what was that combination. But, again, while we did not try to reproduce anything, we did learn from direct experience. Visiting the European museums was probably the eye-opener. Surprisingly, one of the places that impressed us the most in terms of lighting and color was not in Italy, but in Denmark. The Ny Carlsberg Glyptotek has fantastic natural light. It's a very different light than the Mediterranean light, but at the Glyptotek they managed to create a wonderful ambience for the art, with vivid classical wall colors, too. This comparison of museums proved very rich. ■

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Members of the Western Council at the Getty Villa: Vice President Jesse Choper (University of California, Berkeley), Ernest Henley (University of Washington), Edward Feigenbaum (Stanford University), Charles Hirschman (University of Washington), Eugene Wong (University of California, Berkeley), Gordon Gill (University of California, San Diego), and Melvin Simon (California Institute of Technology). Not shown: Elizabeth Blackburn (University of California, San Francisco), Richard Easterlin (University of Southern California), and Saul Friedlander (University of California, Los Angeles)