Tore's exhibition

1. Tore Tallqvist's message to the exhibition visitors (on the first exhibition board)

Professor Tallqvist thought that this carefully written text would be sufficient for the exhibition visitors to understand the exhibition. Taking in the exhibition on the basis of this text requires quite a bit of dedication, time and preferably a previous understanding of the subject. Three attempts have in the following been made to open up some key perspectives on the exhibition's content for other exhibition visitors.

2. Quick guide to exploring the exhibition

- 1. The exhibition presents, chronologically arranged, seventeen objects designed by Alvar Aalto from 1926 to 1974.
- 2. The first eight were designed during the years of Aino Aalto and the last eight during the time of Elissa Aalto.
- 3. The focus of the exhibition is the seventeenth object, the Säynätsalo Municipal Hall, built between 1949 and 1952.
- 4. Each of the first and last eight objects represents one of the four architectural design strategies used by Alvar Aalto.
- 5. The Säynätsalo Municipal Hall represents all four design strategies simultaneously.
- 6. It is worth noting that several design strategies have been applied to many of Alvar Aalto's other objects, although only one per object has been chosen for presentation in this exhibition.
- 7. If you are interested in these ideas, you can delve deeper into the theoretical thinking and concepts included in the exhibition using Tore Tallqvist's own introductory text or the following instructions.

3. Brief instructions for outlining the theoretical structure of the exhibition

- 1. Identify the four basic aims of human existence: longing, remembering, caring, striving
- 2. Note that each basic aim has its own quadrant on the floor plan of the Säynätsalo municipal building
- 3. Change these four basic aims into eight architectural value properties, of which two adjacent ones always correspond to one basic aim. Each value property has been given its own characteristic color.
- 4. Identify four architectural strategies from Alvar Aalto's work: OPPOSITION, DIALOGUE, SIMULTANEITY, INNER REPETITION
- 5. Note that these strategies also always consist of two value properties (colors) each. It is also noted that the pairs of properties of the basic aims and the pairs of properties of the design strategies differ from each other.
- 6. It is noted that the quarters named for the four basic goals of the City Hall and the four architectural strategies of Aalto have been implemented simultaneously.

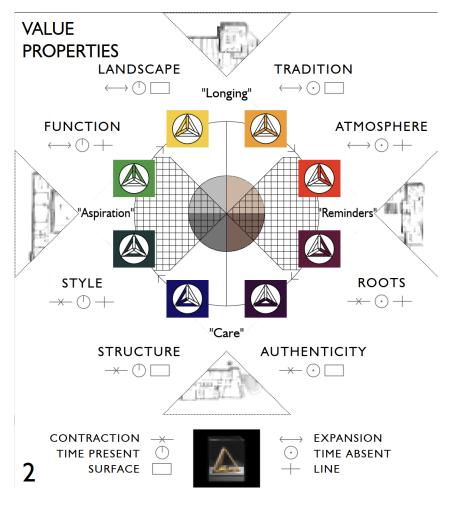
- 7. Alvar Aalto's production is divided chronologically into sixteen three-year sections. These sections are arranged in a ribbon that creates a double-helix image.
- 8. Starting with the City Hall, which is located at the center of the double-helix, each section is given one of the eight colors in order, so that two consecutive ones always form one basic goal of being.
- 9. From Aalto's production, such objects are selected chronologically at three-year intervals that correspond in color to both the basic goal and the architectural strategy that fall into the box.
- 10. If you want to delve even deeper into the theoretical background ideas of the exhibition, and you still can't fully grasp them based on the introduction prepared by Tore Tallqvist, you can try opening the exhibition with the following text.

4. Instructions for a more in-depth examination of the theoretical structure of the exhibition

The exhibition is based on a broader architectural theory, of which the following parts have been used for this exhibition:

- 1. Architecture can be understood as consisting of three opposing components:
- 1. force: condensation and expansion
- 2. time: present and continuity
- 3. geometry: line geometry and surface geometry

2. These three pairs of opposites can be placed inside the circle of the image in the following way:



- a. force: expansion (upper half of the circle) and condensation (lower half of the circle)
- b. time: present (left half) and continuity (right half)
- c. geometry: line geometry (upper and lower quarter of the circle) and surface geometry (right and left quarter of the circle).
- 3. The pairs of opposites allow for a total of eight different combinations (2x2x2), in which one of each of the three pairs of opposites is present in each. Each of the eight combinations, in turn, corresponds to one of the eight central value properties of architecture, for example, condensation (force), the present moment (time) and surface geometry (geometry) together create an architectural property called structure. When surface geometry is replaced by line geometry from the concept of structure, another property called landscape is created, and so on.
- 4. Each of the eight value properties thus created has been given its own characteristic color: landscape (yellow), tradition (orange), atmosphere (red), rootedness (purple), authenticity (dark green), structure (blue), style (dark blue) and functionality (green). These color codes are used in this exhibition.

- 5. These eight value properties/colors are arranged in the shape of a circle so that by changing one opposite property, we move on to the next color. The colors are also arranged in the shape of a tetrahedron so that the colors of the circle correspond in order to three edges that connect at the same corner point and, on the other hand, to the triangular plane formed by the three edges. There are four corner points, just like there are triangular planes, and thus each color has its own position in the tetrahedron. The order is formed so that by moving the edge that has been in place for the longest time, a new three-sided corner or triangular plane is formed in turn.
- 6. By combining two adjacent architectural value properties placed on the circumference of the circle, four central basic goals of being are created:
- a. longing (landscape + tradition)
- b. reminders (roots + atmosphere)
- c. care (structure + authenticity)
- d. aspiration (function + style)

In architecture, spaces can be identified that correspond to one of these four basic goals. For example, the Säynätsalo municipal hall can be found to have natural equivalents for all four basic goals (triangular parts of the floor plan in the combined theory diagram).

Experience has shown that simply identifying and placing the basic goals of being in buildings is not enough to achieve good architecture. At the same time, architectural design strategies must also be applied.

- 7. The central goal of this exhibition is to show what architectural design strategies can be used to include all eight identified architectural value properties and the four basic goals of being in a balanced way. When examining Alvar Aalto's entire career, four different strategies can be found with which he has achieved all eight key value properties of architecture in a balanced way. The Säynätsalo municipal hall has been used as a central example, where all four design strategies can be found. Each of the strategies alone enables good architecture. Each strategic value-attribute pair contains both a present and a continuity element:
- 1. OPPOSITION (landscape + authenticity)
- 2. DIALOGUE (tradition + structure)
- 3. SIMULTANEITY (atmosphere + style)
- 4. INNER REPETITION (roots + function)
- 8. The model of a tetrahedron on display in the exhibition illustrates the connections described above. The model has four different colored vertices. The remaining four colors are formed by the triangular planes of the tetrahedron. In the image, the strategies are formed by the opposing phenomena of the value-characteristic circle of architecture (colors) in such a way that one of the characteristics is always on the side of the present and the other characteristic is on the side of temporal continuity. In the tetrahedron, color pairs are always formed by one vertex and its opposite plane.
- 9. The exhibition features 16 objects from Alvar Aalto's production, which are chronologically arranged at three-year intervals. In addition, the seventeenth object is the Säynätsalo municipal

hall, which is located at the temporal center of the production. The first half of the production, eight objects, coincides with the years with his wife Aino Aalto, and the second half, also eight objects, with the years with his second wife, Elissa Aalto.

- 10. The objects have been chosen so that each of the objects corresponds to one of the eight value properties (represented by its own color) in the same order as on the perimeter of the theoretical model. The colors start from the center of the exhibition, the Säynätsalo Municipal Hall, moving backward in time during Aino Aalto's years and forward in time during Elissa Aalto's years. The progressive movement is also illustrated in the changes in the tetrahedron seen in the images. Each object has also applied one of Alvar Aalto's four design strategies.
- 11. Alvar Aalto's four design strategies are each present in four examples where one of the properties (=colors) of the respective strategy applies to the object. For example, the Farmer's House from 1926 represents the value property of functionality (green color), which is half of the INNER REPETITION strategy. In other words, the Farmer's House represents the INNER REPETITION strategy (entrance within the entrance). The Sunila row house from 1938, in turn, represents the value characteristic of rootedness (lilac as the key colour), which is the other side of the nesting strategy (a block of flats within a block of flats), i.e. the Sunila row house also represents the strategy of INNER REPETITION.
- 12. The objects in the exhibition have also been chosen so that two consecutive objects always form one of the basic goals of existence, for example the Maalaistentalo from 1926 represents the phenomenon of functionality and the Turku Sanomat from 1929 represents the phenomenon of style. functionality and style together form the basic goal of aspiration.
- 13. Aino Aalto's era, with its eight examples, forms a series of eight colours, from which four functional architectural design strategies and four central aspirations of human existence can be formed. Elissa Aalto's era works in a similar way.
- 14. Each of the example objects represents one value characteristic. For example, Paimio represents the value property of the structure (the color blue). It is also half of the DIALOGUE strategy. The exhibition does not use the text to explain how the value property represented by the object is reflected in each object. The joy of discovery is left to the exhibition visitors in these respects. For example, in the case of Paimio, the search could proceed using pairs of opposites as follows: The value property of the structure consists of:
- 1. Density (power), which refers to the significance of the entrance courtyard for the whole,
- 2. The present moment (time), which referred to functioning as a modern hospital, and
- 3. Surface geometry (geometry), which appears in the intact facade surfaces of the building.
- 15. The Säynätsalo Municipal Hall, which is at the center of the exhibition, realizes all the key value properties of architecture (=colors), which means that all four functional architectural design strategies and four central aspirations of human existence can also be found there. Each strategy has its own representative examples, and each of the four aspirations for existence has its own quarter on the floor plan of the Säynätsalo municipal hall.

- 16. The Säynätsalo municipal hall is placed in the middle of the image field formed by a double spiral, and we proceed from there in three-year steps backwards and forwards towards the oldest object in the exhibition, the Southwest Finland Peasant House, and the newest object, the Lappia House. The objects have been chosen to represent one architectural value characteristic in the same order as in the previously presented color series. It is noted that two consecutive objects together represent architectural characteristics that together form one of the aspirations for existence, just as in the theoretical model.
- 17. It is also noted that every time we move four steps forward, the missing half is found for each color of the architectural strategy pair.
- 18. In other words, this image presentation shows the connection between the basic goals and architectural strategies. The gradual transformation of the tetrahedron as it moves from one object to the next illustrates the gradual transformation from basic human goals to architectural strategies.
- 19. The larger model on display in the exhibition illustrates the act of holistic architecture
- 19. The larger model on display in the exhibition illustrates the connection between the theoretical whole of holistic architecture and Alvar Aalto's production.
- 20. At the end of the exhibition, three expanded strategy principles are presented, which can be used to ensure that architectural design reaches the level of building culture. Their principle is to always connect two of Aalto's effective strategies to each other in different ways.
- 21. The strategies are not only linked to Alvar Aalto's architecture, but are universally applicable to all architectural design.
- 22. Theoretical design can also be considered using the tetrahedron model. Alvar Aalto's design strategies always consist of combinations of a vertex and the opposite triangular plane. The expanded strategy images and the tetrahedron also enable other ways of viewing that have not been explored in more detail in this exhibition, but that it is hoped will provide insights into the development of building culture.

BACKGROUND TO THE BIO REX EXHIBITION

While working in Alvar Aalto's office from the mid-1960s, Tore Tallqvist and his colleagues were criticized for not having access to architectural theory, as Aulis Blomstedt, for example, had. This led to a discussion in the office with, among others, Heimo Paanajärvi and Hans Slangus about the theoretical thinking behind Alvar Aalto's design principles. While serving as the consulting architect of Old Porvoo and Slangus as the city architect, Tallqvist and Slangus planned to write a book about Aalto's design principles, which, however, was not completed due to Slangus's death. Some of the theoretical ideas in the exhibition now on display probably date back to those discussions that took place at different times. These reflections took on a more general nature when Tallqvist wrote his licentiate thesis, as well as when he conducted research in Tammisaari and Old Porvoo.

A key observation during the fieldwork was that the architects' ideas about good design and the residents' wishes for a good living environment did not coincide. The most important features for the residents were linked to the experience of temporal depth (tradition, continuity, memories, roots, etc.), while the architects focused on features such as functionality, structure, rationality and form. The key connections in the architects' thinking did not coincide with the key connections of the residents. To solve this challenge, the idea began to emerge that the key architectural ideas of both parties should be integrated into a comprehensive architectural thinking.

At that time, the key goals in the architects' design were limited to questions such as geometric questions and, on the one hand, orientation and centralization. The residents' interest, on the other hand, was in the experience of temporal factors. These goals therefore did not coincide. To solve this problem, Tallqvist began to develop a model of understanding architecture that would include the goals of both parties.

The solution was found in the observation that with the help of three pairs of opposites,

- 1. force (expansion and condensation),
- 2. geometry (surface and line geometry) and
- 3. time (present present moment and absent temporal depth),

Eight combinations of three factors can be formed, from which a comprehensive series of architectural value properties is created. Tallqvist gave each of these properties a color and an approximate name. By arranging and testing these properties depicted in colors in different ways, the theoretical entity presented in the first panels of this exhibition was finally created. It can be used to simultaneously describe a comprehensive model for architecture, the connection of architectural value properties to the basic goals of being, and strategic approaches to the design of a comprehensive building culture.

Since being elected as a professor of the history of architecture in Tampere until the end of his life in 2022, Tallqvist has been developing these ideas, which were initiated in Alvar Aalto's office on the one hand, and observations made in historical wooden city environments on the other, into a theoretical model for understanding architecture and a tool for design. The result of these studies was a series of exhibitions and texts, in which theoretical models were developed further and at the same time their functionality was tested in connection with the history of architecture in different places and periods, including Turku, Helsinki, Tampere and Rome.

This exhibition opens up the theoretical goals described above, i.e. the description of a comprehensive building culture, the connection of architecture to the basic goals of existence and the design strategies required by a comprehensive building culture with the help of Alvar Aalto's Säynätsalo municipal hall. At the same time, it is shown how Alvar Aalto's entire 50-year design history is connected to the theoretical thought models of this exhibition.

Tallqvist rightly felt that the message he wanted to convey with his exhibitions was not "getting across". From exhibition to exhibition, he changed different variables and perspectives without

achieving the desired response. His wife Barbara said that on the last morning of his life, Tore Tallqvist happily told her that he had finally figured out how to present the exhibition to visitors in a way that they would understand. Unfortunately, the presentation was not written down immediately, and so it has been lost forever.

In the exhibition currently being presented, which revolves around the Säynätsalo municipal hall, an important element for Tallqvist is the Säynätsalo model, one of the many "optical devices" he developed for understanding architecture. He realized that it could become a universal perpetual motion model, by removing Alvar Aalto's objects from it and freely replacing them with other objects or plans. In this model (as in the original large model from the late 1990s), the center point represents the present. At that point, the experiential nature of architecture opens up and at the same point, the depth of time is experienced. From that point, history begins backwards with its objects, their associated architectural values, human intentions and strategies. From the same point, the future also begins, the possibilities of which are outlined by the framework created by history. At this point, all the colors light up and the entire theoretical model presented by Tallqvist is transformed into an architectural experience.

The Säynätsalo model, which has become a perpetual motion model, does not mean that we are looking at architecture fixedly from a point in 1950, but that the center point is precisely in the present. By starting from this moment backwards, placing objects in the image field that express the value properties of architecture in order (color order/architectural DNA) and looking for the occurrences of the four basic aspirations of being and architectural strategies, we can collect "food" for current architectural design.

The "engine" of the perpetual motion model is the tetrahedron. The edge shifts in the tetra define the order of the colors and at the same time these shifts create continuous movement, eternal movement, where the center point constantly moves forward in time. Explaining this idea was the last thing Tore talked to me about. Tallqvist also described Alvar Aalto's architectural thinking using Yin Yang. In Yin Yang, opposites come together in the same way as in the plan for Aalto's own Riihitie apartment, for example. The tetrahedron also works like the Yin Yang principle, so that the opposites are at the same time prerequisites for each other and everything revolves into one inseparable whole. Aalto himself did not seem to have spoken about Yin Yang, but Tallqvist drew attention to the fact that, especially in the 1930s, he was very interested in Asian, especially Japanese, culture. With the help of the tetrahedron model, Tallqvist was able to visualize how the value-characteristic connections between architects and "ordinary" people, which did not meet each other, could be combined into a single whole that enabled good design.

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