ARCHITECTURES OF COLLECTIVITY: Swedish Cooperative Housing in Stockholm, 1935-1945

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Advisor: Katherine Fischer Taylor Preceptor: Jie Shi When in the 1930s Sweden became a significant contributor to contemporary architectural discourse in Europe and the United States, it was noticed for its initiatives in affordable housing programs. In the face of severe urban overcrowding and high rents, substandard living conditions, and a low birthrate, Swedish social planners and architects mobilized policy and design to explore alternative methods of living. One of the most popular initiatives from the 1920s to the 1940s was cooperative housing. Given the high costs of urban living, cooperative housing was viewed as a cost-effective scheme to ensure that middle- and working-class individuals and families had access to hygienic and good-quality homes.

Two cooperative housing projects built in Stockholm in the 1930s, the Collective House and Elfvinggården, reflect Swedish interest in collectively financed housing. However, they differed in several crucial ways from previously existing cooperatives. They exemplify Swedish modernist design, and were constructed by prominent architects at the forefront of Swedish modernism. Moreover, whereas other cooperatives provided housing mostly for the working class, the Collective House and Elfvinggården catered to a middle-class clientele.¹ Both projects provided household services to their residents, many of whom were professionals. While some existing cooperatives also supplied daycare and meals to aid families in which both parents were employed, the Collective House and Elfvinggården included cleaning and laundry services that were managed by a household staff.

Although financed and managed in a similar fashion, both buildings were significantly different in setting and clientele. The Collective House, designed and built in 1935 by Swedish architect Sven Markelius and scholar Alva Myrdal, is located in central Stockholm and targeted middle-class families, whereas Elfvinggården, designed and constructed in 1939-40 by architects

¹ John Graham, *Housing in Scandinavia, Urban and Rural,* Chapel Hill: The University of North Carolina Press, 1940, 129.

Sven Backström and Leif Reinius, is in Alvik, a residential district in the western part of the city, and accepted only single, well-educated women (figures 1-5). These contrasting qualities ultimately influenced the success of each project, for Elfvinggården, which was built five years after the Collective House, arose out of a push to develop suburban communities and responded to doubts about the success of cooperative housing for families by redirecting it to single people. The Collective House's failure to be accepted as the ideal type of urban housing for middle-class families was due to the social reality of suburban growth and changing attitudes about the services that were offered, ultimately reflecting the qualities that made Elfvinggården successful.

While these projects were built within several years of one another, historians have considered them individually. Placing the Collective House and Elfvinggården in dialogue provides a deeper understanding of how collective housing came to exemplify a lifestyle and ideology intended to improve society in new ways. The Collective House is recognized as a work of architecture embodying the values of functionalism, an approach emphasizing the importance of utility, efficiency, and minimalism that developed in Sweden in the 1930s.² In addition, although cooperative housing already existed in Sweden by the time the Collective House was constructed, most cooperative apartment buildings provided affordable housing for a lower-class clientele. By targeting the middle class, in contrast, the Collective House represented a form of collective housing for those who chose to live there not only out of financial necessity but also out of interest in its ideology. As the scholar Eva Rudberg describes, the project represented an effort to enhance individuality, specifically that of employed mothers, and create a sense of community.³ Similarly, contemporary sources praise Elfvinggården for its functionalist design

² Eva Rudberg, "Building the Utopia of the Everyday," *Swedish Modernism: Architecture, Consumption and the Welfare State,* ed. Helena Mattsson and Sven-Olov Wallenstein, London, UK: Black Dog Publishing Limited, 2010, 154-155.

³ Eva Rudberg, *Sven Markelius: Architect*, Stockholm: Arkitektur Förlag, 1989, 80.

and objective to free single employed women from household tasks.⁴ However, beyond general description little analysis of these projects exists. Although the social aims of the apartment buildings are well established in the literature, specific ways in which the architecture expresses those objectives have not been explored.

Much of the scholarship on Swedish architectural history is in Swedish and has not been translated. Although I do not read Swedish, I have discussed my project with scholars who are familiar with the Swedish scholarship.⁵ I consulted works available in English, as well as contemporaneous architectural journal articles in English, French, and Italian.⁶ I visited the Collective House and Elfvinggården and interviewed buildings managers and residents.⁷ I worked in two archives in Stockholm, the archives at the Arkitektur-och designcentrum (the Museum for Architecture and Design) and the Stadsarkivet (the state archives). I thank the College for awarding me the F. Ward Champion Third Year International Travel Grant that allowed me to conduct research in Sweden. Finally, I made use of a group of American studies on Swedish housing from the 1930s and 40s and contemporaneous Swedish accounts of Swedish housing for Anglophones to establish the historical context for the housing experiments at the Collective House and Elfvinggården.⁸

⁴ Howard G. Smith, "Sweden is Modern," *The Architectural Forum* (1945): 96-97.

⁵ I am grateful to the scholars Helena Mattsson, Eva Rudberg, and Claes Caldenby for their personal interviews on 15 August 2015, 16 August 2015, and 2 September 2015, respectively.

⁶ My most valuable architectural histories on Swedish modernist design include *Modern Swedish Design: Three Founding Texts,* ed. Lucy Creagh, Helena Kaberg, and Barbara Miller Lane, New York: The Museum of Modern Art, 2008; *Sweden: 20th-Century Architecture,* ed. Claes Caldenby, Jöran Lindvall, and Wilfried Wang, New York: Prestel-Verlag, 1998; and *Swedish Modernism: Architecture, Consumption and the Welfare State,* ed. Helena Mattsson and Sven-Olov Wallenstein, London, UK: Black Dog Publishing Limited, 2010.

⁷ From the Collective House, I interviewed building manager Gunnar Akner on 14 August 2015 and 24 August 2015 and communicated via email on 9 February 2016; from Elfvinggården, I interviewed managers and residents Eva Nikell and Elisabet Allergren on 5 September 2015.

⁸ My most valuable studies include Leonard Silk, *Sweden Plans for Better Housing*, Durham, North Carolina: Duke University Press, 1948; John Graham, *Housing in Scandinavia*, *Urban and Rural*, Chapel Hill: The University of North Carolina Press, 1940; and G. E. Kidder Smith, *Sweden Builds*, New York: Reinhold Publishing Corporation, 1957.

This paper analyzes the architecture of both buildings to explain how their designs contributed to their purpose as cooperative housing projects and examines their reception. Studying the Collective House and Elfvinggården in tandem shows that the latter was founded upon a form of collective living that the former had introduced. The importance of the Collective House is fully grasped within this methodological framework, for it reveals that the project served as a model that Swedish architects continued to develop. While historians are in agreement that Collective House was an influential work of architecture, comparing it directly to a later cooperative housing project clarifies the features that were considered important and the reasons for its lack of success. The Collective House was unsuccessful because most of the apartments were too small for families with children, and not all families embraced collective meals. Elfvinggården adapted the model to single women who benefited from household services and had more interest in the society of other residents, and its suburban site allowed it to be more spacious.

Swedish Cooperatives and Housing in the Interwar Period

In order to understand the contributions of the Collective House and Elfvinggården to collective living, it is necessary to explain why and how the ambition to develop cooperative apartment buildings arose in Sweden at this period. Cooperative housing in Sweden was motivated by a specific social problem. From the turn of the twentieth century and until the 1940s, Sweden was immersed in a housing crisis. The country was plagued by urban overcrowding, high rents, and unsanitary living conditions, all of which were worse in Sweden

than in most parts of Europe at the time.⁹ An acute housing shortage in Stockholm developed among low-income and middle-class groups because of the lack of affordable land and housing.¹⁰

Throughout the 1920s and 1930s, there were two major types of government and resident initiatives to alleviate the housing shortage. One was suburbanization. Initiatives addressing the "housing question" were implemented as early as 1904, when the Stockholm government enacted the Land Acquisition Program and bought up enormous tracts of land in the surrounding region to lease it at low prices to low-income individuals and families.¹¹ In 1924. Stockholm's city government encouraged working-class families to buy homes in the suburbs by enacting legislation instituting a housing plan, known as the "Stockholm plan" or "self-help plan," in which individuals with low to moderate incomes could erect their prefabricated single-family houses themselves instead of providing a down payment.¹² As a result of this program, as well as the Land Acquisition Program, numerous suburban communities developed. By the early 1930s, suburban districts modeled upon Ebenezer Howard's Garden City contained people of all social classes and income backgrounds.¹³ Communities like Norra Ångby, which housed low- to middle-income families and contained many prefabricated houses, bordered on more wealthy neighborhoods like Södra Ångby, a concentrated community of 500 single-family homes. By 1933, Stockholm had purchased 20,000 acres of land in the suburbs.¹⁴ Suburbanization. as will

⁹ Eva Rudberg, "Early Functionalism 1930-40," *Sweden: 20th-Century Architecture*, ed. Claes Caldenby, Jöran Lindvall, and Wilfried Wang, New York: Prestel-Verlag, 1998, 94 and *Södra Ångby: Modernism, Architecture, Landscape*, ed. Andersson, Johansson, Källenius, Lindunger, Stockholm: The society of modernistisk arkitektur och landscap i Södra Ångby, 2015, 28.

¹⁰ Leonard Silk, *Sweden Plans for Better Housing*, Durham, North Carolina: Duke University Press, 1948, 18. ¹¹ Graham, 18-20.

¹² Eva Rudberg, "The Architects," *Södra Ångby: Modernism, Architecture, Landscape*, 48 and Axel H. Oxholm, *The small-housing scheme of the city of Stockholm,* Washington, D.C.: U.S. Department of Commerce, 1935, 6. ¹³ Graham, 27 and *Södra Ångby: Modernism, Architecture, Landscape*, 31-32, 35.

¹⁴ Silk, 38 and Werner Hegemann, *City Planning: Housing*, New York: Architectural Book Publishing Co., Inc., 1936, 251.

be shown below, had a significant effect on the success of the Collective House and the development of Elfvinggården.

The city's initiatives to settle people in the suburbs were insufficient to alleviate the urban housing shortage, however. A postwar building boom in the 1920s failed to substantially improve the housing conditions of a majority of the Swedish people.¹⁵ By 1930, overcrowding, unsanitary living conditions, and lack of affordable housing were still significant problems in Stockholm.¹⁶ A 1933 national urban housing census deemed 11 percent of all dwellings as overcrowded—an overcrowded apartment defined as more than two people sleeping in one room—compared with 23 percent in 1912-1914.¹⁷ That same census showed that half of all urban dwellings consisted of one room and kitchen or less, where a typical tenement for a working-class family of one room and kitchen had a floor space of 30 to 50 m² (325-540 ft²).¹⁸

The second type of initiative to provide affordable and good-quality housing to the working class in the 1920s and 1930s was cooperative housing. The movement had its origins in the 1880s, but it did not become active until the First World War.¹⁹ In response to a drastic increase in rents and construction costs during the war, tenants from low-income backgrounds formed the Tenants' Society, which called for affordability, better housing standards, and protection from unfair policies.²⁰ By the early 1920s interest in cooperative housing had expanded nationally, and in 1923, the Tenants Savings and Building Society, known as HSB,

¹⁵ Silk, 39.

¹⁶ Alva Myrdal, *Nation and Family: the Swedish Experiment in Democratic Family and Population Policy*, New York: Harper & Brothers Publishers, 1941, 242 and Silk, 40, 48.

¹⁷ Silk, 40 and Alf Johannson and Waldemar Svensson, *Swedish Housing Policy*, New York World's Fair: The Royal Swedish Commission, 1939, 9-10.

¹⁸ Johannson, 9-10; Myrdal, 244; and Swedish Delegation at the Interallied Housing and Town Planning Congress, *The Housing Question in Sweden*, 1920, 9-10.

¹⁹ Myrdal, 236 and Graham, 84, 124.

²⁰ Myrdal, 236; Silk, 30-31, 101; and Johan Liljencrants, "New Housing in Stockholm: Apartment Homes the Cooperative Way," *The American Swedish Monthly* (1937): print, 5.

was formed.²¹ The organization was instrumental in constructing housing in both urban and suburban districts. Philanthropic housing for lower-class individuals and families also existed, though on a more limited basis especially after the establishment of HSB.²² In 1937, there were 200 cooperative apartment buildings in Stockholm, half of which had been constructed by HSB.²³ By the end of the 1930s, HSB was the largest cooperative housing society in Sweden and had built homes for 25,000 families. 11,500 families in Stockholm alone.²⁴

Cooperative housing existed on a rental and ownership basis in Sweden. HSB sold apartments to its members, who also paid a yearly fee for the use of their apartments.²⁵ Other organizations, like the Stockholm Cooperative Housing Society and philanthropist housing societies, rented their apartments to tenants, who in addition to yearly rental fees made a down payment of approximately ten percent of the value of the apartment upon moving in.²⁶ Both types of cooperative housing relied on state and bank loans, as well their own savings and contributions from members, to finance construction.²⁷ The Collective House and Elfvinggården contained only rental apartments, and were financed by private organizations, loans, and payments from prospective tenants.²⁸

Many apartment buildings that cooperative housing organizations constructed were equipped with modern appliances, like central heating, private bathrooms, running water, and mechanical laundry rooms that residents could use themselves for a small fee.²⁹ Some,

²¹ Mabel Barbee Lee, "Sweden Offers Us a Lesson in Housing," The New York Times Magazine 9 June 1935: print, 11 and Ulla Alm, Cooperative Housing in Sweden, Stockholm: AB Hasse W. Tullberg, Esselte, 1939, 10.

²² Graham, 130-131.

²³ Liliencrants, 5.

²⁴ Myrdal, 236 and Graham, 126.

²⁵ Alm, 11, 23.

²⁶ Graham, 131 and Alm, 10-12.

²⁷ Alm, 12, 24, 29.

²⁸ Swedish International Press Bureau, print, Arkitektur-och designcentrum, Stockholm, Sweden, 2 and Eva Nikell and Elisabet Allergren, personal interview, 5 September 2016. ²⁹ Graham, 128-129, 135 and Alm, 42.

particularly those built by HSB, also provided social services for residents, a feature that hitherto had not been offered in apartment buildings anywhere. The services included day nurseries where employed mothers could leave their children with professionally trained caretakers during the day, or overnight if necessary, at low costs.³⁰ Some HSB cooperatives in the late 1930s also offered meal services, where a central kitchen delivered meals directly to residents.³¹ Such services, particularly daycare, were useful for lower-income families in which both parents were employed: by 1940, over 60 percent of the clientele of HSB housing were working-class.³²

The Markelius Collective House and Elfvinggården grew out of government and private housing initiatives in urban and suburban areas. Both projects had objectives similar to existing housing cooperatives, particularly the HSB buildings that offered daycare and meals: providing affordable and quality housing that aided families in which both parents were employed.³³ Indeed, the Collective House and Elfvinggården also offered daycare and meal services, as well as housecleaning and laundry, all delivered by a collectively employed house staff. Yet both projects differed from existing cooperatives by appealing to middle-class individuals and families rather than primarily the working classes. The implications were that residents chose to live in the Collective House and Elfvinggården not only due to their financial and logistical advantages—although affordability and convenience remained important criteria—but also due to interest in living in a community of like-minded people. The Collective House, built in 1935, was the first housing project to extensively explore the economic and social advantages of collectivizing household tasks.

³⁰ Graham, 128-129 and Alm, 64-65.

³¹ Liljencrants, 6. ³² Graham, 129 and Alm, 20.

³³ Rudberg, Sven Markelius: Architect, 78.

The Design of the Collective House

The Collective House was intended by its designers, Sven Markelius and Alva Myrdal, as a social experiment, one that could have a significant influence on housing as a whole.³⁴ The central concept was to relieve married professional women, especially if they had children, of domestic tasks like cooking, cleaning, and daycare.³⁵ The notion of collective housing that Markelius and Myrdal developed was based upon collectively financing otherwise expensive domestic services. Central services, like a household staff and a kitchen, provided the household help. Given the building's urban location, affordability was still a crucial factor to address. Communal facilities, including the central kitchen and a restaurant, economized space in the individual apartments, helping restrain costs.³⁶ In addition, servants and maids were in short supply in Stockholm and many people could not afford their services. Lowering the costs of household help by employing a staff in common, as the Collective House proposed, was highly desirable to middle-class professionals.³⁷ Myrdal and Markelius understood that their project might not appeal to everyone; Myrdal herself asserted that she did not expect the project to be popular with working-class families, as the lifestyle it espoused was perhaps too radical.³⁸ Indeed, Eva Rudberg points out that the project was popular with "radical intellectuals."³⁹

Making the Collective House affordable to the middle class was crucial to the project's ideology. Like working-class families, middle-class families with working mothers also needed housekeeping services, especially daycare. As previously mentioned, maids were too expensive

³⁴ Rudberg, *Sven Markelius: Architect*, 77 and Rudberg, "Building the Utopia of the Everyday," 155.

³⁵ Rudberg, Sven Markelius: Architect, 77.

³⁶ Rudberg, Sven Markelius: Architect, 79-80.

³⁷ Rudberg, Sven Markelius: Architect, 78.

³⁸ Kirsi Saarikangas, "The Policies of the Modern Home," *Models, Modernity, and the Myrdals,* ed. Pauli Kettunen and Hanna Eskola, Helsinki: The Renvall Institute for Area and Cultural Studies, University of Helsinki, 1997, 88. ³⁹ Rudberg, "Early Functionalism 1930-40," 97.

and scarce at the time for middle-class families, and when the Collective House was built daycare did not yet exist as a general service beyond what was offered in HSB cooperative housing.⁴⁰ Alva Myrdal, a sociologist and radical figure in Swedish politics, advocated daycare and housekeeping services for middle-class families with employed mothers and intended the Collective House as an affordable means for tenants to receive these services. As more women were taking on clerical and professional jobs, she pointed out, cooperative housing that provided household services had become "a crying need."⁴¹ A mother herself, Myrdal sought to create a balance for women between parenting and working.⁴² As she wrote in *Nation and Family*, her book on Swedish population policy,

What ought to be the proper relationship between work and marriage? How should work in the home be defined and how should it be economically provided for so as to fit within the framework of modern economic life?⁴³

In 1934, Alva Myrdal and her husband Gunnar Myrdal, an economist, published *Crisis in the Population Question*, a book that examined the declining birth rate in Sweden and proposed policy reforms to increase the population. Vital to increasing the birth rate, they argued, was improving the quality and affordability of housing to encourage families to have children.⁴⁴ Alva Myrdal's advocacy for childcare support for middle-class working mothers was thus part of her larger scheme to increase the birthrate in Sweden and improve housing.

⁴⁰ Swedish International Press Bureau, print, Arkitektur-och designcentrum, Stockholm, Sweden, 2 and Yvonne Hirdman, "The Happy 30s: A Short Story of Social Engineering and Gender Order in Sweden," *Swedish Modernism: Architecture, Consumption and the Welfare State,* 68.

⁴¹ Myrdal, 423.

⁴² Hedvig Ekerwald, "Alva Myrdal: Making the Private Public," Acta Sociologia 43.4 (2000), 345.

⁴³ Myrdal, 421.

⁴⁴ Myrdal, 232, 271.

Myrdal also argued for the state's more active involvement in enabling women to pursue careers not at the expense of raising families.⁴⁵ Though the Collective House ultimately was privately funded, Myrdal and Markelius initially hoped that the government would provide support for the project.⁴⁶ While Sweden's objective as a welfare state, which was established in 1932 when the Social Democrats came to power, was to break down social and economic barriers and elevate everyone to the middle class, no legislation on extending childcare to working mothers yet existed when the Collective House was built.⁴⁷ Only later in the 1930s did the welfare state, known as the *folkhemmet* or The People's Home, adopt an interventionist position in citizens' family lives, assuming responsibility in areas like healthcare and childcare in order to help working mothers.⁴⁸

The Collective House's location in a dense urban district in central Stockholm instantiates its appeal to a middle-class clientele. The residential district, Kungsholmen, was likely a desirable area to live at the time given its proximity to the city hall and downtown. The site, located on the street John Ericssonsgatan, is one block north from a lake that runs through the city, also likely increasing the property's value as residents had easy access to the parks along the water's edge (figure 6). Indeed, a report issued by the Stockholm International Press Bureau termed the site as "extremely suitable."⁴⁹ The building is a seven-story rectangular structure that originally contained 57 apartments arranged on either side of a long central corridor (figures 7-8). The apartments cantilever out above a recessed ground floor, which, in addition to the basement, contains the shared services (figures 9-10). The individual flats are

⁴⁵ Mary Hilson, *The Nordic Model: Scandinavia Since 1945*, London: Reaktion Books, 2008, 102; Rudberg, *Sven Markelius: Architect*, 77; Hirdman, 68.

⁴⁶ Rudberg, "Building the Utopia of the Everyday," 155.

⁴⁷ Peter Baldwin, "The Scandinavian Origins of the Social Interpretation of the Welfare State," *Comparative Studies in Society and History* 31.1 (1989), 6-7 and Hilson, 106.

⁴⁸ Hilson, 107-108 and Hirdman, 68.

⁴⁹ Swedish International Press Bureau, print, Arkitektur-och designcentrum, Stockholm, Sweden, 2.

expressed on the front facade by balconies and four solid vertical wall panels angled outwards about twenty degrees (figures 7 and 11). In the gaps where the vertical panels break with the facade plane, large square windows open onto each balcony and face south towards the sun, providing a view of the nearby lake. The balconies, each belonging to one apartment, are nestled into the deep recesses that the angled wall panels create. The rear facade similarly expresses the flats through balconies but without the wall panels (figure 12).

The Collective House rented its apartments, so it was not cooperatively owned by its residents but by a private building firm called Gumpel and Bengtsson. The total cost of the project, including the cost of the site, was 850,000 kronor, the equivalent of 190 US dollars in 1931-35 and roughly 2,800 dollars today.⁵⁰ The construction was financed by a premium from prospective tenants, amounting to about ten percent of the value of the apartments, plus a state subsidy and a loan from Gumpel and Bengtsson.⁵¹ Residents paid an annual rent, as well as a service fee that included the costs of the household and food services.⁵²

While the Collective House was not the first housing cooperative to provide daycare and mechanical laundry service, it went farther than other cooperatives in offering services that furthered its social objectives. The Collective House maintained a household staff of 21 people that took care of meals, cleaning, laundry, and daycare.⁵³ Meals could be taken in the communal restaurant that was also open to the general public on the ground floor, or sent up to individual apartments via food lifts. Residents could eat in the restaurant as much or as little as they wished. According to a report issued by the Swedish International Press Bureau, the daycare was

⁵⁰ Silk, 125.

 ⁵¹ Swedish International Press Bureau, print, Arkitektur-och designcentrum, Stockholm, Sweden, 2.
 ⁵² Ivo Pannaggi, "La Casa Comune di Stoccolma," *Domus: L'Arte Nella Casa* April 1936, 10.

⁵³ Rudberg, Sven Markelius: Architect, 80 and Myrdal, 423.

"perhaps the most important among the communal establishments in the building (figure 13)."⁵⁴ A professional staff "with the best theoretical and practical training" looked after the children, and parents had the option of leaving their children overnight in the nursery if the apartment was too crowded or if they were away.⁵⁵ Next door to the nursery was a dormitory and work room for children of school age. The cost of daycare, including food and laundry, was 1.25 kronor per child per day, the equivalent of 28 cents in 1931-1935 and roughly 5 US dollars today.⁵⁶

Although the Collective House was marketed as an affordable housing option for those who wanted domestic services, the costs of living there emphasize that the project was intended for a middle-class clientele. A typical apartment for a working-class family with one room and a kitchen in Stockholm had a floor space of 30 to 50 m² and had an average annual rent of 840 kronor (according to the 1931-1935 kronor value.)⁵⁷ Even the cheapest apartments in the Collective House, however, demanded greater finances. The least expensive apartments in the building had rents ranging between 500 and 600 kronor, but they also required additional payments of 612 to 764 kronor for household services.⁵⁸ Moreover, those apartments had a floor space of 15 to 18 m², less than half the size of typical working-class dwellings.⁵⁹ Given their size, the 15- to 18 m² flats were meant to accommodate single people, further underlining that the costs of living in the Collective House were beyond the means of most low-income people.⁶⁰

At first, the public was dismissive of the project. People expressed fears that the collective organization of the building would break up the family and threaten marriage and

⁵⁴ Swedish International Press Bureau, print, Arkitektur-och designcentrum, Stockholm, Sweden, 2-4.

⁵⁵ Swedish International Press Bureau, print, Arkitektur-och designcentrum, Stockholm, Sweden, 3.

⁵⁶ Swedish International Press Bureau, print, Arkitektur-och designcentrum, Stockholm, Sweden, 3 and Silk, 125.

⁵⁷ Swedish Delegation at the Interallied Housing and Town Planning Congress, 9-10 and Silk, 125.

⁵⁸ Pannaggi, 10.

⁵⁹ Pannaggi, 10.

⁶⁰ Rudberg, Sven Markelius: Architect, 80.

individuality.⁶¹ Markelius and Myrdal countered criticism by establishing the building's motto as "individual culture through collective technique": individuality, they argued, would not be sacrificed, but would rather be enhanced through collectivity.⁶²

Photographs of tenants in their furnished flats emphasize the Collective House's ethos. When the building was opened in 1936, an exhibition on the ground floor presented photographs of hypothetical tenants performing different leisure activities in their fashionably furnished apartments, to demonstrate the different varieties of lifestyles that could take place in the flats.⁶³ In one image, a well-dressed and coiffed woman lounges on her bed, reading Vogue; in another, a couple reclines on a couch in their airy living room, the man staring into space and the woman reading a magazine on her lap (figures 14-15). Another photograph shows a room filled with bookshelves in which a man and his wife, both academics, pore over papers and books on their respective desks (figure 15). Other photographs from articles in contemporary architecture and lifestyle journals also depict the Collective House's idealized lifestyle. In an article from LIFE, one image shows an elderly woman taking her meal in the communal restaurant, and another depicts a professional child caretaker watching over an infant in the daycare (figures 16-17).⁶⁴ In no photographical representations of life in the Collective House are residents shown doing housework or watching over children; those shown performing household duties, like baby-sitting children or sending food from the restaurant to individual apartments via the food lifts, are the members of the household staff (figure 18). The implications of such

⁶¹ Rudberg, Sven Markelius: Architect, 79 and Rudberg, "Building the Utopia of the Everyday," 155.

⁶² Rudberg, *Sven Markelius: Architect*, 79 and Gunnar Akner, building manager of the Collective House, personal interview, 14 August 2015.

⁶³ Rudberg, Sven Markelius: Architect, 80 and Gunnar Akner, personal interview, 14 August 2015.

⁶⁴ "Sweden's Model Apartments: Stockholm Building is Wonderful for Women Who Work," *LIFE Magazine* 12 March 1945, print, 113-114.

images is that both the male and female residents of the Collective House are able to pursue their academic or professional work as well as leisure activities within their apartments.

Aspects of the Collective House's architecture support its proposed balance between the individual and professional life on one side, and the collective and family life on the other. The layout of the ground floor, which contains the building's communal facilities and spaces, underlines the Collective House's emphasis on community (figure 10). Those amenities, the restaurant, central kitchen, daycare, and a small grocery including a boutique selling milk for young children in residence, could all be accessed via both the interior and exterior of the building, pointing to the prominent role they were anticipated to have in the tenants' lives. The restaurant is nestled in the southern end of the building, near the main entrance off of the street John Ericssongatan and is accessed by either an interior corridor connecting the communal departments and the main entrance hall or a public entrance to the side that opens directly onto the sidewalk. The two groceries, located on the other side of the entrance hall, also have a front entrance on John Ericssongatan, as well as what appears to be an interior access off of the central corridor through the groceries' back rooms. In the northern end of the building, the daycare, containing a large playroom and nursery, is reached via the interior corridor or by the street entrance. Residents access the ground floor from the upper floors using either a small elevator or a spiral stairwell both located in the core of the building. The distribution of the ground floor program around the stairs and elevator and their interior and exterior modes of access indicate their intended convenience: mothers could drop off their children at the daycare from within the building on their way to work, and at the end of the day enter via the daycare's public entrance without needing to enter the building first to bring their children up to their apartments. Similarly, tenants could stop in the restaurant for breakfast or coffee on their way out and enter directly off

the street when coming home for dinner. The restaurant was open to the public, so the street entrance was important also for non-residents.⁶⁵ Because the easiest way to access the grocery appears to be from the street, as reaching it from the interior requires one to proceed through a back room, it is conceivable that residents would stop at the store for supplies on their way home from work. The communal features of the ground floor could thus be incorporated logistically into the occupants' lives, fulfilling the Collective House's objective as well as encouraging a sense of community among the inhabitants.

The upper floors contain the individual flats. The first to fifth floors have the same layout, with ten flats per floor (figures 8 and 19). The flats come in four general sizes: 15 or 18 m², 34 or 38 m², 43 or 45 m², and 74 or 85 m^{2.66} The smallest apartments consist of one room that includes the kitchen and bathrooms, and the largest apartments have seven rooms. On the first to fifth floors, the 43-m² and 45-m² flats are in the corners of the building, and distributed throughout are the 34 m², 15 m², and 18 m² flats.⁶⁷ The sixth floor contains eight apartments, four of which are split-level flats with a floor space of 74 m² and 85 m² and are the largest apartments (figures 20-21). Each apartment is connected to the central kitchen via an electrically powered food lift, so that residents could take their meals within their apartments rather than going down to the restaurant.⁶⁸ All of the flats contained modern utilities that were increasingly the standard in new apartments in Stockholm. The utilities included small kitchenettes equipped with refrigerators, stainless steel sinks, and a gas stove, enabling residents to cook for themselves.⁶⁹

⁶⁵ Rudberg, Sven Markelius: Architect, 80.

⁶⁶ There are several variations in this scheme: two flats are 27 m², and one is 64 m². Source: Gunnar Akner, *John Ericsson 6: Kollektivhuset. Arkitekt: Sven Markelius*, Stockholm: Jonas Bergström (AGITPROP studios), 1991. ⁶⁷ In the northwestern and southwestern corners that face the street, the flats are 43 m², and in the northeastern and

southeastern corners that face the rear courtyard, the flats are 45 m^2 .

⁶⁸ Swedish International Press Bureau, print, Arkitektur-och designcentrum, Stockholm, Sweden, 7 and Rudberg, *Sven Markelius: Architect*, 80.

⁶⁹ Swedish International Press Bureau, print, Arkitektur-och designcentrum, Stockholm, Sweden, 7.

Complementing the value placed on the communal spaces on the ground floor, the design of the apartments primarily emphasizes maintaining privacy. While all residents depended on the communal services for their laundry and house cleaning and, in some cases, daycare, residents could choose to not engage with their neighbors in the communal spaces on the ground floor. Occupants, for example, could have meals sent to their apartments via the food lifts, or they could cook in their flat's kitchenette. However, as will be later discussed, the kitchenettes were too small to make cooking convenient.

As mentioned, the public was initially critical of the Collective House, arguing that it would overemphasize collectivity at the expense of individuality.⁷⁰ Possibly in response to such criticism, the designers planned the layout of the individual apartments with attention to the public and private areas of the flats. The organization of the two most common types of apartment, those with a floor space of $34/38 \text{ m}^2$ and $43/45 \text{ m}^2$, reflects this mentality (figure 22). Intended for either couples or small families, these apartments have an open plan layout, such that most of the interior is one continuous space with few walls delineating rooms. Often the kitchenette and the bathroom, containing a toilet, bathtub, and sink, are the only rooms, defined by four walls with a doorway for access. In the apartments on the side of the building facing the street, the living, dining, and sleeping areas are contained in one large room. Although the apartments have open plans, they are designed to sequester the service areas, specifically the kitchenette, bathroom, and entrance hall, and partly conceal the sleeping area from the living room. One way the latter is achieved, as is evident in the 43-m^2 corner apartments facing the street, is through placing the bathroom and kitchen next to the entrance, creating a sleeping alcove next to the bathroom in the corner of the apartment. Moreover, the vertical wall panels of the front façade accentuate the autonomy of the sleeping alcove from the rest of the living space

⁷⁰ Rudberg, *Sven Markelius: Architect*, 79 and Rudberg, "Building the Utopia of the Everyday," 155.

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in the flats facing the street, for they open up that portion of the flat. In the corresponding apartments facing the rear courtyard, private and public areas are clearly differentiated: the bedroom and living room are separate rooms.

In some of the flats facing the street, a free-standing and centrally located storage closet visually separates different living spaces, while also establishing private spaces within the open plan layout (figure 22). The closet acts as a free-standing wall as well as a small corridor, differentiating the sleeping alcove and living room from one another. Its particular location is significant for economizing space, as a communal storage space, while also serving as a spatial organization tool. Within the open floor plan, it differentiates the entrance and kitchen from the bathroom and bedroom area by tangibly changing the quality of the space as one passes from one region to the other. The closet's placement a couple feet away from the walls of the bathroom and kitchen creates the small corridor, a small, dark, and constricted space that contrasts with the lightness and openness of the living room, and through which one must pass to enter the bathroom. The corridor establishes the bathroom and sleeping area as the more private spaces of the flat, because its darkness and constrained width shield and differentiate these spaces from the rest of the apartment.

In the living room, the closet plays a slightly different role but ultimately to the same effect. Because of its free-standing position away from the wall, the closet creates a postentrance space feeding into the living room that is more open than the entrance hall, but not quite as open as the living room. The closet partially shields the light from the large living room windows, such that the effect of compression and expansion is tangible in the transition from the entrance hall area to the living room. Deeper inside the flat, from a central vantage point in the living room, the closet similarly acts as a spatial organization tool. Its bulk projects into the living room, its rounded corner partially shielding the bedroom area from view. Furthermore, the closet effectively deepens the sleeping alcove by extending the wall and creating a more emphatic corner around which one proceeds from the living room to reach the bed. Furniture placed in front of that corner juncture also serves to partially shield the bed from the living room. Just as the closet by way of its constricted corridor differentiates the space of the entrance hall from the space comprising the bathroom and sleeping alcove, the closet also separates the more public space of the living room from the private sleeping area through its shield-like presence. Ultimately, the closet's function in an apartment with a living room and an adjacent bed alcove allows its occupants, whether a couple or a small family, to protect their sleeping space from guests they might entertain in the living room.

The composition of the Collective House's street façade also emphasizes the value placed on residents' privacy. Residents can rest assured that while on their balconies, none of their neighbors in the building are able to see them. Although clearly visible from the street, the balconies are arranged such that they provide a clear view of the nearby lake, Lake Mälaren, but not of neighbors' balconies. The vertical wall panels are responsible for this feature, for while they create gaps in the façade to let in light from the south, they also project far enough out from the façade plane to shelter the balconies from view on either side. They prevent occupants from peering into their neighbors' terraces and keep their own living spaces private (figure 23).

Multiple features of the Collective House's architecture, thus, express the project's ideology of encouraging collective living practices as well as preserving residents' individuality and privacy. Although Markelius and Myrdal's foundational philosophy was well developed and responsive to political concerns, the project did not advance as expected due to logistic, ideological, and social factors that the designers had not anticipated.

Spatial Concerns and Suburban Attractions: Uncertainties About Urban Collective Living

The Collective House ultimately failed to model a marketable type of urban housing. In some respects, there was a significant disconnect between the ways the designers envisioned the building to be used and the ways that residents actually lived in the building. Although the public received the project favorably after it was constructed and publicized in architectural journals throughout Europe. Britain, and the United States, many residents moved out within a decade of its completion.⁷¹ The size of the units, disaffection with certain communal services, and suburbanization all played a part in the residents' dissatisfaction that resulted in the project's lack of success.

The most important factor causing inhabitants to move out of the Collective House was likely the size of the apartments. Many of the flats were too small to accommodate families. The Collective House's opening exhibition in 1936, which presented the living situations of hypothetical tenants, implied that the 34 to 45-m² apartments could house couples as well as families with as many as three children.⁷² Yet a one-bedroom apartment of less than 50 m² with a small living room and dining area could hardly be expected to accommodate a family with three children, when it would have housed a family with one child with difficulty. Only the 75 to 85 m^2 apartments, which had two levels and three separate bedrooms, were adequately large to accommodate families. While the daycare was probably an important resource for working mothers in the Collective House, as in other housing cooperatives, it was not enough to compensate for the small apartments. As a 1936 article from *The Architect and Building News* points out, the fact that the apartments were so small that they discouraged family gatherings was

 ⁷¹ Gunnar Akner, building manager of the Collective House, personal interview, 14 August 2015.
 ⁷² Pannaggi, 10.

problematic: "Even with the communal nurseries, it is difficult to see how family life is supposed to be enjoyed for long...if the fourth dimension of time is not carefully considered by the tenants themselves it is scarcely possible to avoid a good deal of congestion."⁷³

Size was also an issue in the communal areas of the building. Although the Collective House emphasized community, there were not many communal spaces in the building, and the ones that existed were not very large.⁷⁴ The restaurant was the only congregation space, but it was not large enough to accommodate all of the residents at once, for it took up only one-fourth of the ground floor. Based on contemporary photographs and the floor plan of the restaurant, the restaurant could probably seat 35-40 people at once, which was less than half of the likely number of residents, between 115 and 130 people (figures 10 and 24). Besides the restaurant, there were no spaces, like a parlor, which residents could share as an area of repose and community. Indeed, the Collective House is sometimes described as a "family hotel" that offered household services and meals but in reality did not provide many communal spaces for residents.⁷⁵ It is important, however, to remember that urban crowding was still a significant problem in Stockholm in the mid-1930s and urban land plots remained small. The Collective House was built between two buildings that already existed, thus constraining the size of the site and limiting the program on the ground floor to a small square footage (figure 6).

Related to the problem of size was the residents' changing attitude toward the services offered and collective living, another potential reason for tenants leaving. It is possible that not all families in residence agreed with Myrdal's view that keeping their children in daycare throughout the day and overnight, under watch of the professional child caretakers, was the best

⁷³ "A Collective House at Stockholm: architect, Sven Markelius," *The Architect and building news* 145 (1936): print, 134.

⁷⁴ Rudberg, Sven Markelius: Architect, 83.

⁷⁵ 20th Century Architecture, 282.

option for the upbringing of their children.⁷⁶ Yet the apartments' small sizes necessitated parents putting their children in daycare for most of the day, presenting problems for those families who may have wanted to keep their children more often in their apartments. In addition, not all residents might have wanted to take all of their meals in the restaurant, instead preferring to have their food sent up to their flats via the food lifts. Again, since the restaurant was not large enough to seat all of the inhabitants at once, it may have been more convenient for some residents to eat in their flats.

Another speculation is that the kitchenettes in the apartments were too small to make cooking convenient. The kitchens in the Collective House apartments were about the same size as the kitchens in the display houses in the Stockholm Exhibition of 1930, an architecture and design exhibition that introduced modernist design to Sweden.⁷⁷ Those kitchens were greatly criticized, for while they saved on costs and space, they were so cramped that they were viewed as unacceptable workspaces.⁷⁸ It is likely that the kitchens in the Collective House received the same criticism. With the central kitchen, the kitchenette's size would not have presented a problem, as residents could have prepared meals and use their kitchenettes to supplement what they were eating in the restaurant. Yet it is possible that residents did not find the food service up to standard, or that the fee they paid that included the cost of the prepared meals was too expensive. If it was the case that residents no longer took advantage of the food service, then the kitchenettes would have proved inadequate due to their size.⁷⁹

⁷⁶ Kirsi Saarikangas, "The Policies of the Modern Home," 88.

⁷⁷ Lucy Creagh, "An introduction to *acceptera*," *Modern Swedish Design: Three Founding Texts*, ed. Lucy Creagh, Helena Kaberg, and Barbara Miller Lane, New York: The Museum of Modern Art, 2008, 127, 131.

⁷⁸ Eva Rudberg, *The Stockholm Exhibition 1930: Modernism's Breakthrough in Swedish Architecture*, Stockholm: Stockholmia, 1999, 148-150.

⁷⁹ The problem of the small kitchen and the limits it placed on use later encouraged Swedish architects and government agencies to examine kitchen spatial requirements. In the mid-1940s, the Homes Research Institute, a committee composed of women, conducted studies to better understand how women used kitchens and domestic spaces and better adapt homes to those functions. Source: Rudberg, "Building the Utopia of the Everyday," 156-157.

Suburban development outside of Stockholm was another probable factor that caused the first residents of the Collective House to move out. Throughout the 1920s and 30s, the Stockholm government sponsored vast suburban development in the effort to alleviate the housing shortage in the city. As previously described, communities of working-class and middle-class residential districts—many containing prefabricated houses—were established in the suburbs beginning in the late 1920s.⁸⁰

Development of the suburbs accelerated in the 1930s as a result of the 1931 Swedish law on town planning, which greatly influenced where and how housing was constructed.⁸¹ It organized and controlled housing construction and formalized building all throughout the city, including the suburban areas.⁸² The rapid development of suburbs encouraged more people to move from the cities to the suburbs and smaller towns. In 1930, for example, 32 percent of Sweden's population lived in towns outside of cities, whereas in 1950 47 percent of the population lived there.⁸³ The Stockholm suburbs allowed for a lifestyle that could not be found as easily in the cities. The housing was cheaper, for it was built on land that had been bought and leased at low rates by the city, and residents had more space and better access to green areas. Moreover, the city strove to make the suburbs desirable residential areas, particularly for families. Sven Markelius became the Director of City Planning in the early 1940s and led initiatives to develop communities of single-family homes and terrace and low-rise housing in the suburbs of Stockholm.⁸⁴ He argued that the suburban districts, or "town sections" in his terms, allowed for housing with a low concentration of residents.⁸⁵ Arranged in clusters around enclosed courtyards,

⁸⁰ Södra Ångby: Modernism, Architecture, Landscape, 31-32, 35 and Silk, 38.

⁸¹ Silk, 95-99.

⁸² Silk, 99.

⁸³ Rudberg, "Building the Folkhemmet," *Sweden: 20th-Century Architecture,* 111.

⁸⁴ Rudberg, Sven Markelius: Architect, 151-152.

⁸⁵ G. E. Kidder Smith, Sweden Builds, New York: Reinhold Publishing Corporation, 1957, 24, 26.

Markelius' proposed housing projects allowed for shared amenities and access to green spaces. making them optimal for families.⁸⁶ Markelius envisioned providing a variety of housing options in the suburbs that ranged in price, in order to accommodate families of different income levels and make suburban living as affordable as possible.⁸⁷ His efforts to develop the suburbs and encourage families to move out of urban Stockholm ultimately undermined his own Collective House, as suburban housing became attractive to many people.

The large suburb Vällingby, west of the city center, illuminates how suburban communities were developing in the 1940s and the kind of lifestyle they afforded to residents. G. E. Kidder Smith, an American architectural critic, postulated that Vällingby was a "superior" example of Markelius' suburban planning agenda: by 1957, it had a substantial population of 23,000 people and acted as a shopping, amusement, and employment center for 60,000 people living in other areas of the city (figure 25). The train lines that connected all the suburban developments together and to central Stockholm allowed for easy transportation and access.⁸⁸ The prospect of larger living space that was more affordable than in the city and provided access to parks and nature preserves was attractive to many people, particularly families. Given the success of Vällingby, as well as other smaller suburban districts around Stockholm, it is probable that a major reason for the Collective House's decline in popularity in the 1940s and 50s is that people believed living in the suburbs had more advantages.

The outcome of the Collective House suggests that the option of more spacious housing in the suburbs caused the appeal of urban cooperative housing to diminish. The realization of Elfvinggården reflects that collective living did not lose traction as an ideology but that perhaps it was better suited to a different setting and a different clientele. Examining the ways in which

⁸⁶ Smith, 26 and Rudberg, Sven Markelius: Architect, 151-152.
⁸⁷ Rudberg, Sven Markelius: Architect, 151-152.
⁸⁸ Smith, 94-95.

Elfvinggården differed from the Collective House will help provide an understanding of why the Collective House was less successful.

The Collective House Moves to the Suburbs: Developing the Collective Living Model

Elfvinggården, in contrast to the Collective House, was intended for single, well-educated, middle-class women, not middle-class families, and was located in Alvik, a suburban district in a western municipality of Stockholm.⁸⁹ It provided similar collective services to the Collective House, with the exception of daycare.

One significant difference between the Collective House and Elfvinggården is location. By the end of the 1930s, the suburbs were a thriving alternative to living in central Stockholm. It is significant that the Elfving sisters, the founders of Elfvinggården, sited the project in Alvik, as though to avoid the problems concerning space that plagued the Collective House. Like the surrounding suburban districts, Alvik was developed in the early to mid-1930s after the implementation of the 1931 town-planning act. A precursor to Vällingby, Alvik was—and still is—a residential district containing apartment buildings, row housing, and single-family homes, as well as cultural amenities so that residents did not feel lonely or isolated.

Elfvinggården is located on Runda vägen, a street close to the train line that connects the suburbs to central Stockholm and roughly 150 meters from Lake Mälaren. The site and the entire district are full of trees, and the architects Backström and Reinius made efforts to preserve the natural rocky topography of the site. Thus, the setting of Elfvinggården is tranquil and detached from the city, but not isolated, since the train line provides easy access to downtown. Unlike the

⁸⁹ "La Fondazione Svedese Elving," *Costuzione Casabella* 166 19 (October 1941), print, 6; G. E. Kidder Smith, *Sweden Builds*, 76; and Howard Smith, "Sweden is Modern," 97.

urban setting of the Collective House, Elfvinggården is situated on a much larger site of 140 x 200 m^2 , as opposed to $19 \times 26.5 \text{ m}^{2.90}$ The project had more space to spread out, because the land was available and more affordable.

One of the features that Elfvinggården was admired for was its relationship to its site. Elfvinggården is not a single apartment building, but is a collection of nine buildings arranged in a large open square (figure 26). The design of the project is modular: the module is a building roughly 40 meters long and fifteen meters wide with two to three floors and containing eleven apartments per floor (figure 27).⁹¹ All of the modules, except one containing shops, offices, and service apartments, are positioned along the north-south axis, so that the central square space is aligned with the four cardinal directions and its modular extensions radiate out to the north and south.⁹² Three of the buildings are attached end to end to articulate the western side of the square; the remaining buildings are freestanding, and are attached to one another by a narrow corridor. One article from an Italian residential design journal, Costruzione Casabella, praised the arrangement of the building modules for giving the central courtyard a sense of enclosure as well as openness.⁹³

The layout of the buildings was integrated with the natural features of the site. The architects preserved the natural terrain, such that the project was built on slightly uneven ground and boulders and trees were interspersed throughout the site. Site plans of Elfvinggården depict the topographical features, as well as the vegetation found throughout, implying that the natural qualities of the site were a significant component of the project (figure 28). Aerial photographs also indicate the integration of the landscape: large pine trees are distributed among and around

⁹⁰ "La Fondazione Svedese Elving," 6.

⁹¹ "La Fondazione Svedese Elving," 9.
⁹² "La Fondazione Svedese Elving," 6.

⁹³ "La Fondazione Svedese Elving," 6.

the buildings, so that the complex appears nestled in the landscape (figure 29). *The Architectural Forum*, an American architecture journal, applauded the natural landscaping, a "particularly Swedish" feature.⁹⁴ Perhaps most notably, G. E. Kidder Smith noted in *Sweden Builds* that "the apartments are grouped in short wings which break up any feeling of large mass and intimately tie each room to the natural setting around it."⁹⁵ Furthermore, the arrangement of the buildings along the north-south axis and the ample space in between each of them gave almost all of the apartments a southern light exposure, which was an important element especially in the wintertime.⁹⁶

Another advantage of the larger site was that it enabled the architects to include more apartments and more communal spaces. Whereas the Collective House contained only 57 apartments, Elfvinggården contained 271 apartments, 236 of which were single-bedroom and 36 of which were two-bedroom.⁹⁷ The buildings, eight of which consist of apartments for the female residents, are two to three stories and in the original floor plans have eleven flats per floor (figure 27).⁹⁸ The larger two-bedroom apartments are corner apartments and are located at the end of each building module. All of the flats open onto a long, narrow corridor that spans the length of the apartment building. A stairwell located about halfway down the corridor allows residents to travel to different floors and access different areas of the complex.

Like the Collective House apartments, the Elfvinggården apartments are also open plan; in the single-bedroom flats, all of which have the same layout, the only rooms are the bathroom and kitchenette, while a wall is extended to one side to create a sleeping alcove and separate the

⁹⁴ Howard G. Smith, "Sweden is Modern," 97.

⁹⁵ G. E. Kidder Smith, *Sweden Builds*, 76.

⁹⁶ Smith, Sweden Builds, 76.

⁹⁷ "La Fondazione Svedese Elving," 6. Elfvinggården now contains fewer apartments, as in many cases two adjacent flats have been combined into one unit.

⁹⁸ "Sweden: Elfvinggården," construction document, Arkitektur-och designcentrum, Stockholm, Sweden.

living and sleeping areas (figures 30-31). On one side of the apartment entrance is the closet and kitchenette, and to the other side is the bathroom. Further into the apartment is the dining and living room area, which is adjacent to the partially obscured sleeping alcove. As in the Collective House, the open plan allows for considerable exchange between the different spaces of the flat. Since it houses only one resident, however, it is likely easier to designate specific functions to different areas of the apartment because there is no need to adapt spaces to the needs of several residents at once. The flats were outfitted with the same modern conveniences as the Collective House apartments. As was increasingly the standard of the day, each flat had a private water closet and toilet, and although the kitchens were small, they contained modern appliances like a gas stove and refrigerator.

Another feature that Elfvinggården shares with the Collective House is vertical wall panels that optimize the amount of sunlight entering each apartment. The far wall of every single-bedroom apartment has a section that is swung outwards, with a window placed in the gap (figure 32). As in the Collective House, the wall panels provide southern light exposure to each flat. The protruding wall section creates a small sun-nook, in which residents could place a small table or sofa (figure 31).

The communal spaces in Elfvinggården, furthermore, are more substantial than in the Collective House simply because the building site is larger. The building with the main entrance, located on the western side of the Elfvinggården square formation, contains a large dining room on the top floor, as well as a spacious sitting room and shared terrace adjacent to it (figures 33-34). Ample sitting areas are also dispersed throughout the buildings, such as a seating area filled with sofas and chairs within the main entrance hall (figure 35). The grounds are also communal areas: some residents maintained small gardens at the base of their apartment buildings, and

created outdoor seating areas in the central courtyard for the summer months.⁹⁹ The multiple areas in which residents could gather may be one of the reasons that Elfvinggården prospered.

Like the Collective House, Elfvinggården provided collective services like laundry, housekeeping, a small grocery store, and a central kitchen and restaurant, but no daycare, as none of the residents had families of their own.¹⁰⁰ Elfvinggården's ideology thus differs slightly from the Collective House's. While the Collective House stresses collectivity, Elfvinggården emphasizes and implements it to a greater degree thanks to the particular layout of the buildings with respect to one another, the greater number of communal spaces, and the focus on providing a community for single women. As suggested above, one of the reasons that the Collective House was unsuccessful as a collective living experiment is that there were few spaces where its residents could gather. By contrast, Elfvinggården's large open courtyard around which its apartment buildings cluster implies that ample communal space is an important feature of the project. That none of the residents were families, furthermore, suggests that the female occupants joined the cooperative to benefit not only from household services but also from the community it offered.

Furthermore, the nature of the project—Elfvinggården's attention to single women rather than families with children—means that the layout of the apartments is better suited to its inhabitants with regards to size. The single-bedroom apartments have a floor space of around 45 m^2 and the two-bedroom apartments have one of around 55 m^2 , both of which are too small for a family; for a single woman, however, it can be argued that these spaces prove sufficient. Even though the kitchens are quite small, about the same size as those in the Collective House, the fact that only one person depended on them as opposed to a small family is important to acknowledge.

⁹⁹ Eva Nikell and Elisabet Allergren, personal interview, 5 September 2015.

¹⁰⁰ Smith, "Sweden is Modern," 97.

Another ideological distinction between the Collective House and Elfvinggården accounts for differences in design. Whereas the Collective House was a product of early functionalism, Elfvinggården embodies a more developed form of functionalism, known as New Empiricism.¹⁰¹ In this later form of functionalism, which arose in Sweden beginning in the late 1930s, architects paid more attention to making residential interiors feel more "cozy" and "human," and less austere and minimalist.¹⁰² As Sven Backström, one of the architects of Elfvinggården, declared: "It was then that people gradually began to discover that the 'new objectivity' [functionalism] was not always so objective, and the houses did not always function so well as had been expected. They also felt the lack of many of the aesthetic values and the little contributions to coziness that we human beings are so dependent upon, and that our architectural and domestic tradition had nevertheless developed."¹⁰³

Elfvinggården's architects were at the forefront of the new architectural movement in later functionalism. They criticized early functionalism for its austerity and chilly character, arguing that it did not produce a type of architecture that people wanted to live in.¹⁰⁴ Backström explained in a 1943 article in *The Architectural Review* that "we [the architects] want to reintroduce the valuable and living elements in architecture that existed before 1930...to return to something that is past and to pastiches is definitely to misunderstand the development of architecture in this country."¹⁰⁵ Architects like Backström and Reinius believed that incorporating traditional forms and materials into functionalist design would result in an improved version of functionalism, where the architecture was still modernist but prioritized

¹⁰¹ "The New Empiricism, Sweden's Latest Style," *The Architectural Review* 101 (1947), 199 and Rudberg, "Building the Welfare of the Folkhemmet," 126-127.

¹⁰² Rudberg, "Building the Welfare of the Folkhemmet," 126.

¹⁰³ Sven Backström, *The Architectural Review* (1943) from "The New Empiricism, Sweden's Latest Style," *The Architectural Review*, 199-200.

¹⁰⁴ Rudberg, "Building the Welfare of the Folkhemmet," 126.

¹⁰⁵ Sven Backström, *The Architectural Review* (1943) from Rudberg, "Building the Welfare of the Folkhemmet," 126 and "The New Empiricism, Sweden's Latest Style," *The Architectural Review*, 199.

comfort. A 1947 article in *The Architectural Review* labeled the Swedish development of functionalism as New Empiricism, signifying an architecture that was based on tradition, experience, and practical knowledge.¹⁰⁶

While scholars agree that New Empiricism did not fully arise until the mid-1940s, Elfvinggården demonstrates features of architecture characteristic of the movement and the architects' attitude towards early functionalism.¹⁰⁷ The exterior vertical wall panels, for example, express a playfulness that contrasts with the more austere and self-contained form of the Collective House. The façades of Elfvinggården's apartment buildings advance and recede in a rhythmic pattern, breaking up the flat plane of the exterior (figures 3, 32). The wall panels of the Collective House create a similar effect of breaking up the façade plane, but not as exuberantly and boldly as do those of Elfvinggården: the repeating jagged edges of the roofs jut out into space, contrasting with the softer forms of the surrounding trees and terrain. As Eva Rudberg points out, one of the features of New Empiricism was to break up the rigid, modular form that characterized so much of early functionalism.¹⁰⁸ Indeed, Elfvinggården's wall panels literally break open the building modules, creating an impression of lightheartedness.

Logistical factors also influenced the form of New Empiricist architecture, explaining some of the design features of Elfvinggården. Certain scarcities in resources caused architects to return to more traditional materials, encouraging them to combine a functionalist attitude with traditional methods of construction. For example, during and after the Second World War steel rods and asphalt were in short supply, causing architects to construct with brick rather than

¹⁰⁶ "The New Empiricism, Sweden's Latest Style," *The Architectural Review* and Rudberg, "Building the Welfare of the Folkhemmet," 127.

¹⁰⁷ Rudberg, "Building the Welfare of the Folkhemmet," 124.

¹⁰⁸ Rudberg, "Building the Welfare of the Folkhemmet," 125.

reinforced concrete and build pitched rather than flat roofs.¹⁰⁹ The shift in construction materials was also ideological, however. As Backström pointed out in his essay in *The Architectural Review*, traditional buildings were themselves perfectly functional and abided by the norms of comfort and domesticity that had developed in Swedish culture.¹¹⁰ Elfvinggården is likely a product of these two factors: it is constructed of warm yellow brick and displays slightly pitched as opposed to flat roofs (figures 36-37). While the pitched roofs are not clearly seen from the ground, the brick exteriors soften Elfvinggården's buildings, easing the sharpness of its functionalist design.

Taken all together, Elfvinggården's location in a forested suburb, clientele, and particular design provide an understanding of the features of the Collective House that likely made it unsuccessful. Larger living spaces and better access to parkland were certainly advantages of Elfvinggården, but they do not necessarily imply that collective living could only be successful in the suburbs. It is true that the social conditions of the time indicate that the lack of space in the inner city made community-oriented projects more difficult to implement. Yet studying Elfvinggården alongside the Collective House allows for an evaluation of could have been changed in the latter project: a larger site, for example, as well as a better assessment of the building in use.

Conclusion

Today, Elfvinggården and the Collective House are still functioning apartment buildings. In the latter, residents now own their apartments, whereas the former continues to contain only

¹⁰⁹ Rudberg, "Building the Welfare of the Folkhemmet," 125.

¹¹⁰ "The New Empiricism, Sweden's Latest Style," 199-200.

rental units for women. Both are no longer cooperatives, yet vestiges of their histories as collectives remain: the current residents of the Collective House can have food sent up to their apartments from the downstairs café via the food lifts, and the inhabitants of Elfvinggården still cultivate community gardens and congregate in the complex's communal spaces. Despite the Collective House's failure as a marketable type of urban housing, it served as a model for later middle-class cooperative housing projects like Elfvinggården. Through providing an array of household services, the Collective House initiated discourse on the ways in which housing could both provide a higher standard of living and create a balance between parenting and working for middle-class women. Elfvinggården developed the model that the Collective House created by applying it to single women and re-contextualizing it in a suburban setting, ultimately perpetuating the series of objectives that the Collective House introduced. The Collective House was not a perfect example of urban cooperative housing. Nevertheless, it encouraged questions and experimentation in cooperative housing for the middle class, leading the way for housing projects that followed.



Figure 1

Sven Markelius in collaboration with Alva Myrdal, street view of the Collective House, Stockholm, Sweden, 1935. Image shows the building in its current condition, after its restoration in 1991. Photographed by the author in 2015.

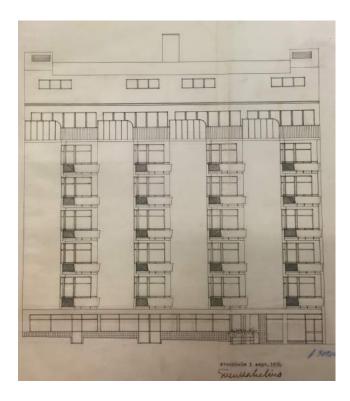


Figure 2 Sven Markelius, front elevation of the Collective House, Stockholm, Sweden, 1934.



Figure 3

Sven Backström and Leif Reinius, exterior view of Elfvinggården, Stockholm, Sweden, 1939-40. Photographed by G. E. Kidder Smith.



Figure 4

Sven Backström and Leif Reinius, aerial view of Elfvinggården, Stockholm, Sweden, 1939-40.



Sven Backström and Leif Reinius, external view of Elfvinggården, Stockholm, Sweden, 1939-40. Image shows the building in its current condition. Photographed by the author in 2015.

nr8 97 (25,8) nr13 . Hv. Fågel-børströdet. nr12

Sven Markelius in collaboration with Alva Myrdal, site plan of the Collective House, Stockholm, Sweden, 1935. John Ericssonsgatan is the name of the street facing the site. "Kv. Fågelbärsträdet" is translated here as "Fågelbärsträdet block," the name of the neighborhood. The buildings adjacent to the site, Nr. 8 and Nr. 12, already existed when the Collective House was built. The dimensions of the site are 19 x 26.5 m².



Sven Markelius in collaboration with Alva Myrdal, street view of the Collective House from the southern end of the street, Stockholm, Sweden, 1935. The building is a rectangular block situated in between two existing buildings.

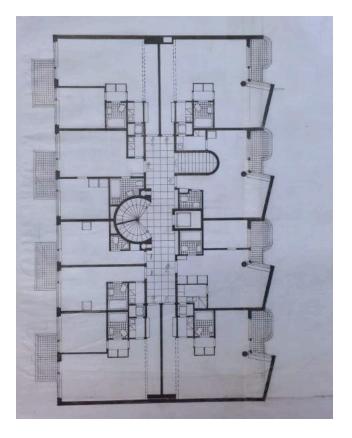


Figure 8

Sven Markelius in collaboration with Alva Myrdal, floor plan of the first floor of the Collective House, Stockholm, Sweden, 1935. The apartments are grouped around a central corridor.



Sven Markelius in collaboration with Alva Myrdal, view of the main entrance of the Collective House, Stockholm, Sweden, 1935. The apartments cantilever out above the ground floor, such that the main entrance is recessed into the building.

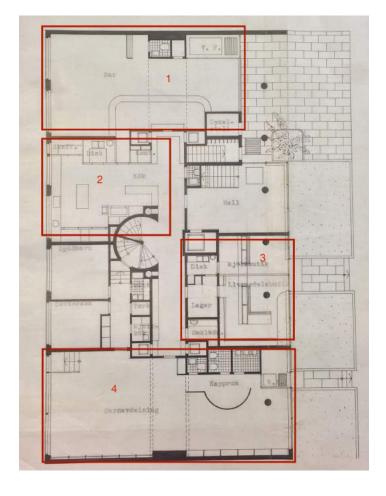


Figure 10

Sven Markelius in collaboration with Alva Myrdal, floor plan of the ground floor of the Collective House, Stockholm, Sweden, 1935. The ground floor contains the restaurant (1), central kitchen (2), two small groceries (3), and the daycare (4), all grouped around a central corridor. Other program includes the entrance hall, spiral staircase and elevator, and nursery rooms pertaining to the daycare.

"Kök" is here translated as "kitchen"; "mjölkbutik" as "milk store"; "livsmedelsbutik" as "food store"; and "barnavdelning" as "daycare" (author's translations).



Sven Markelius in collaboration with Alva Myrdal, street view of the Collective House from the northern end of the street, Stockholm, Sweden, 1935. Photographed by Herman Bergne in 1936. Note the vertical wall panels protruding between each column of balconies.

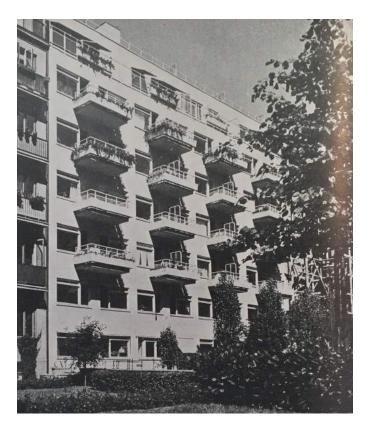


Figure 12

Sven Markelius in collaboration with Alva Myrdal, rear elevation of the Collective House, Stockholm, Sweden, 1935. Note that the rear façade has no vertical wall panels.



Sven Markelius in collaboration with Alva Myrdal, 1935, photograph of the interior of the daycare in the Collective House, Stockholm, Sweden.



Figure 14

Photograph from the Collective House opening exhibition, 1936, Stockholm, Sweden.



Photographs from the Collective House opening exhibition, 1936, Stockholm, Sweden. Note that in the images the apartments are fully furnished.



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Figure 16

Photograph from "Sweden's Model Apartments: Stockholm Building is Wonderful for Women Who Work" (*LIFE Magazine*) of a woman taking her meal in the Collective House restaurant, 1945, Stockholm, Sweden.

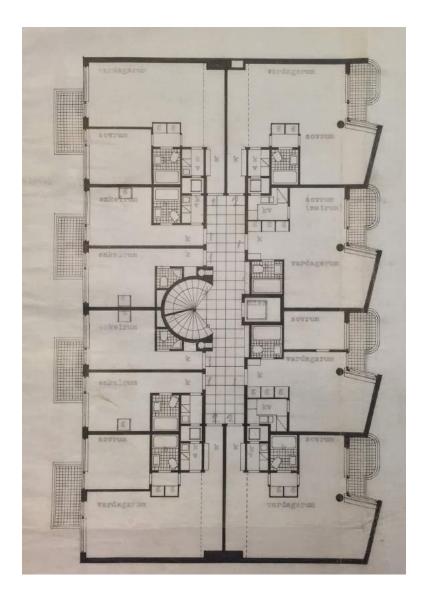


Photograph from "Sweden's Model Apartments: Stockholm Building is Wonderful for Women Who Work" (*LIFE Magazine*) of a caretaker watching an infant in the Collective House daycare, 1945, Stockholm, Sweden.

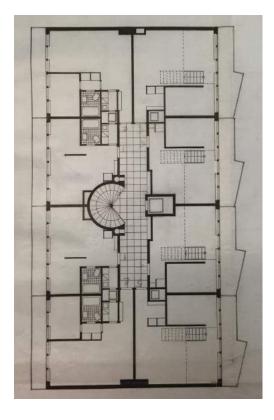
Figure 18

Photograph of a member of the Collective House household staff sending a meal from the central kitchen to an apartment via the food lift, Stockholm, Sweden.





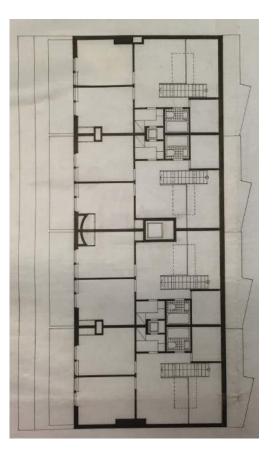
Sven Markelius in collaboration with Alva Myrdal, floor plan of the second to fifth floors of the Collective House, Stockholm, Sweden, 1935. The vertical wall panels of the front façade are expressed on the right side of the plan.



Sven Markelius in collaboration with Alva Myrdal, floor plan of the sixth floor of the Collective House, Stockholm, Sweden, 1935. The split-level apartments are located on the right side of the plan. The lower level of the split-level apartments contains a closet, living/dining room, and a study.

Figure 21

Sven Markelius in collaboration with Alva Myrdal, floor plan of the seventh floor of the Collective House, Stockholm, Sweden, 1935. The second level of the split-level apartments contains the kitchenette, bathroom, three bedrooms, and another living/dining room.





Sven Markelius in collaboration with Alva Myrdal, furnished floor plan of a $43-m^2$ corner apartment in the Collective House, Stockholm, Sweden, 1935. Note the closet located in the center of the apartment.

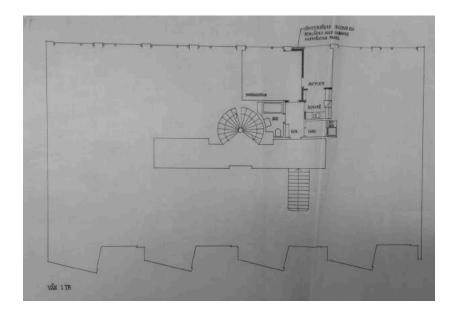


Figure 23

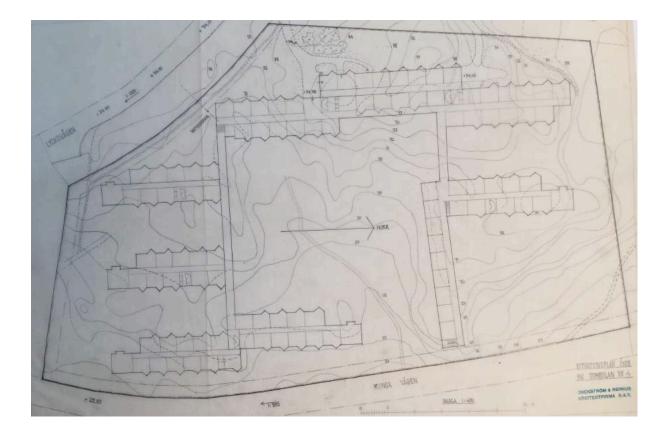
Sven Markelius in collaboration with Alva Myrdal, floor plan of the doorman's top-floor residence in the Collective House, Stockholm, Sweden, 1935. Note at the bottom of the image the outline of the front façade's vertical wall panels, which extend farther than the edges of the balconies to keep the balconies private. See figure 19.



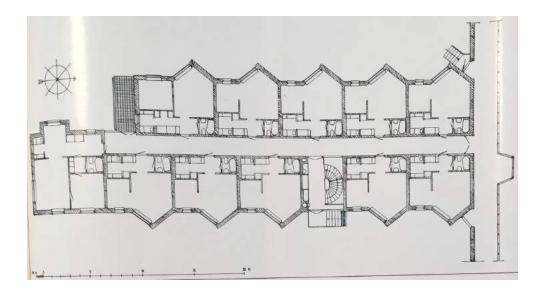
Sven Markelius in collaboration with Alva Myrdal, 1935, photograph of the interior of the restaurant in the Collective House, Stockholm, Sweden.



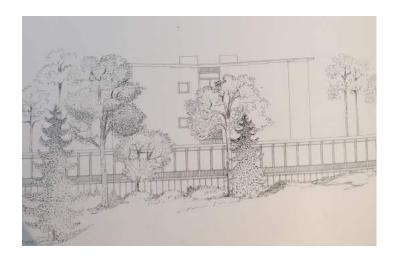
Figure 25 Lennart Olson, *Vällingby Centrum*, Backström and Reinius, 1953-55, Stockholm, Sweden.

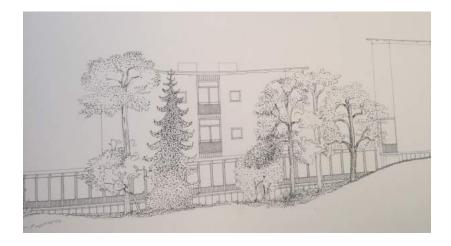


Sven Backström and Leif Reinius, site plan of Elfvinggården, Stockholm, Sweden, 1939-40. Lake Mälaren is to the east, which would be below this image.



Sven Backström and Leif Reinius, floor plan of one of the building modules of Elfvinggården, Stockholm, Sweden, 1939-40. All of the apartments, except the apartment at the left end of the building, are one-bedroom. The end apartment has two bedrooms.

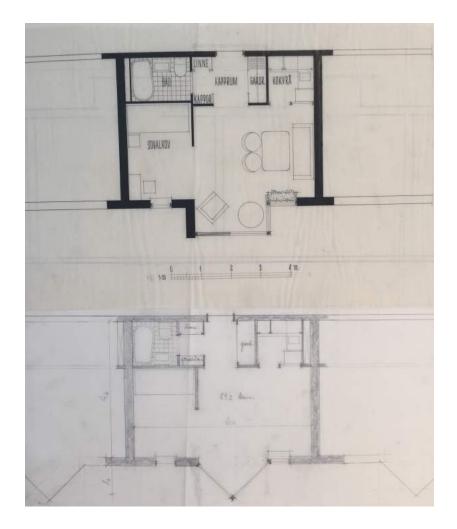




Sven Backström and Leif Reinius, details of a site section of Elfvinggården, Stockholm, Sweden, 1939-40. Note that vegetation and the natural topography are included in the drawings.



Figure 29 Sven Backström and Leif Reinius, aerial view of Elfvinggården, Stockholm, Sweden, 1939-40.



Sven Backström and Leif Reinius, sketches of floor plans of two single-bedroom apartments in Elfvinggården, Stockholm, Sweden, 1939-40.

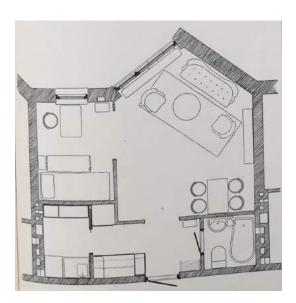


Figure 31

Sven Backström and Leif Reinius, floor plan of a furnished single-bedroom apartment in Elfvinggården, Stockholm, Sweden, 1939-40. Note the sun-nook, containing sofa and chairs, that is created by the angled wall panel.



Sven Backström and Leif Reinius, exterior view of Elfvinggården, Stockholm, Sweden, 1939-40. The angled wall panels on the exterior allow for southern light exposure.



Sven Backström and Leif Reinius, interior view of the dining room in Elfvinggården, Stockholm, Sweden, 1939-40.



Figure 34

Sven Backström and Leif Reinius, interior view of the top-floor parlor in Elfvinggården, Stockholm, Sweden, 1939-40.



Sven Backström and Leif Reinius, interior view of a sitting area within the main entrance hall in Elfvinggården, Stockholm, Sweden, 1939-40. Photographed by the author in 2015.

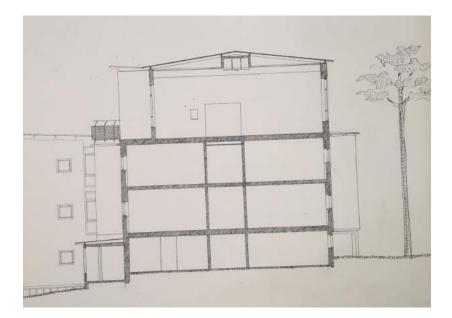


Figure 36

Sven Backström and Leif Reinius, section of one of the buildings of Elfvinggården, Stockholm, Sweden, 1939-40. Note the slightly pitched roof.



Sven Backström and Leif Reinius, exterior view of Elfvinggården, Stockholm, Sweden, 1939-40. Photographed by the author in 2015. The walls are constructed from brick, one feature of New Empiricist architecture.

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Cover image: *Kollektivhuset, Balkonger, Exteriör*. ARKM.1962-101-0014. Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 1: Vaccarino Gearty, Giuliana. Street view of the Collective House. 2015.

Fig. 2: Markelius, Sven. Front elevation of the Collective House. 1 September 1934.

1980/F.3092Q. Stockholm State Archives, Stockholm, Sweden.

Fig. 3: Kidder Smith, G. E. *Elfvinggården Exteriör*. ARKM.1962-101-1735. Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 4: Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 5: Vaccarino Gearty, Giuliana. Exterior view of Elfvinggården. 2015.

Fig. 6: Sitemap of the Collective House. 1934. 1971/F.3092Q. Stockholm State Archives, Stockholm, Sweden.

Fig. 7: *Kollektivhuset Exteriör*. 1937. ARKM.1962-101-0013. Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 8: Markelius, Sven. Floor plan of the first floor of the Collective House. 1 August 1934.

1974/F.3092Q. Stockholm State Archives, Stockholm, Sweden.

Fig. 9: Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 10: Markelius, Sven. Floor plan of the ground floor of the Collective House. 1 August 1934.1973/F.3092Q. Stockholm State Archives, Stockholm, Sweden.

Fig. 11: Bergne, Herman. *Kollektivhuset Exteriör*. 1936. ARKM.1962-101-0011. Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 12: "A Collective House at Stockholm: architect, Sven Markelius." *The Architect and building news* 145 (1936): 136. Print.

Fig. 13: *Kollektivhuset på John Ericssonsgatan Interiör, lekrum med barn.* ARKM.1997-110-1151-02. Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 14: Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 15: "Kollektivhuset." *Göteborgs Handelstidning* 1 June 1935: print. Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 16: "Sweden's Model Apartments: Stockholm Building is Wonderful for Women Who Work." *LIFE Magazine* 12 March 1945: 114. Print. Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 17: "Sweden's Model Apartments: Stockholm Building is Wonderful for Women Who Work." *LIFE Magazine* 12 March 1945: 113. Print. Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 18: Arkitektur-och designcentrum, Stockholm, Sweden.

Fig. 19: Markelius, Sven. Floor plan of the second to fifth floors of the Collective House. 1 June 1934. 1975/F.3092Q. Stockholm State Archives, Stockholm, Sweden.

Fig. 20: Markelius, Sven. Floor plan of the sixth floor of the Collective House. 1 August 1934.

1976/F.3092Q. Stockholm State Archives, Stockholm, Sweden.

Fig. 21: Markelius, Sven. Floor plan of the seventh floor of the Collective House. 1 August 1934.

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Fig. 22: Markelius, Sven. Floor plan of a 43 m² corner apartment in the Collective House.

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Fig. 23: Floor plan of alteration of doorman's residence in the Collective House. June 1947.

3/F.30923. Stockholm State Archives, Stockholm, Sweden.

Fig. 24: Wahlberg, Ateljé. Interior of the restaurant of the Collective House. Arkitektur-och

designcentrum, Stockholm, Sweden.

- Fig. 25: Olson, Lennart. Vällingby Centrum. Backström and Reinius, 1953-55. ARKM.1994-
- 103-09601. Arkitektur-och designcentrum, Stockholm, Sweden.
- Fig. 26: Arkitektur-och designcentrum, Stockholm, Sweden.
- Fig. 27: "La Fondazione Svedese Elving." Costuzione Casabella 166 19 October 1941: 6. Print.
- Fig. 28: Arkitektur-och designcentrum, Stockholm, Sweden.
- Fig. 29: Arkitektur-och designcentrum, Stockholm, Sweden.
- Fig. 30: Arkitektur-och designcentrum, Stockholm, Sweden.
- Fig. 31: "La Fondazione Svedese Elving." Costuzione Casabella 166 19 October 1941: 6. Print.
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- Fig. 33: Andersson, Yngve. Elfvinggården, Interiör. Backström and Reinius, 1939-40.
- ARKM.1962-101-0424. Arkitektur-och designcentrum, Stockholm, Sweden.
- Fig. 34: Andersson, Yngve. Elfvinggården, Interiör. Backström and Reinius, 1939-40.
- ARKM.1962-101-0425. Arkitektur-och designcentrum, Stockholm, Sweden.
- Fig. 35: Vaccarino Gearty, Giuliana. Interior view of Elfvinggården. 2015.
- Fig. 36: Arkitektur-och designcentrum, Stockholm, Sweden.
- Fig. 37: Vaccarino Gearty, Giuliana. Exterior view of Elfvinggården. 2015.