**CSR** 

## **Special Feature**



# Evolving urban development: Our path to environmental and community awareness



## The Nomura Real Estate Group's Goal of Providing Self-Sustaining Compact Towns

In light of changes in the structure of society, such as a declining birth rate and aging population, the Nomura Real Estate Group is working toward timely advancement of its urban-type compact town strategy, which combines multifunctionality with a high level of convenience.

Urban-type compact towns are neighborhoods that consolidate facilities with a variety of functions, such as residences, offices, commercial facilities, public facilities, hospitals, and elderly housing. But the city-building we have in mind goes beyond the mere physical aspects of urban development. We aim to build urban areas that impart a sense of purpose and fulfillment to the people who live, work, and visit there. Our intention is to build cities where progress is self-sustained by the people who live in them.



Nomura Real Estate Development Co., Ltd. Residential Development Division, Residential Product Planning & Marketing Department Manager Ms. Soda joined the Company in 1999. After gaining experience in the Condominium Sales Business, she spent roughly 10 years in product planning, including interior design for model rooms. She has been involved in the Funabashi Morino City project since 2012.

## ■ Toward Creating the Ideal Community

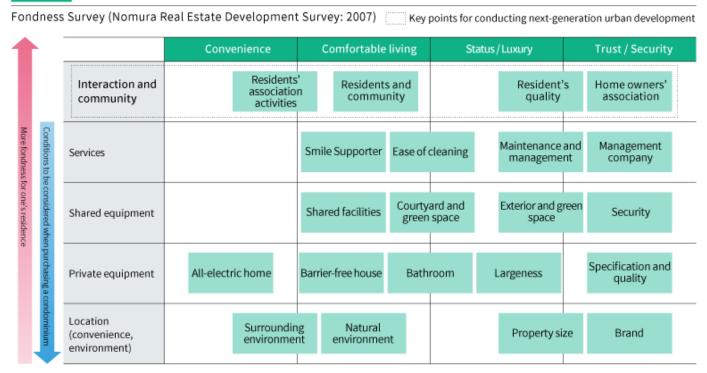
#### Q. What were project expectations at the planning stage?

**Soda:** The Funabashi Morino City Project (hereafter "this project") began in 2011 and reached completion in 2014. The city,which is located on the 17-hectare site of a former factory,consists of roughly 1,500 residences, commercial facilities, medical facilities, and childcare facilities, as well as five parks and green spaces. As a local contributor, the city has been admired throughout the three-year construction process by many, including those who live there, of course, as well as residents of the surrounding areas.

Aims for this project included expanding our experience as a real estate developer by taking on new challenges and achieving city-building that emphasizes a sense of community to enrich the lives of residents for generations to come. This is something we had hoped to accomplish by means of consultations with Funabashi City from the planning stage onward. The Great East Japan Earthquake, which struck during the planning stage in 2011, made the need for stable energy infrastructure and coordination within communities stark. In addition, results of a residence "fondness survey" (Figure 1) conducted in 2007 indicated to the Company that beyond conditions at the time of purchase, interactions with residents after moving in and community-building efforts are key elements to creating a greater sense of fondness for one's living situation. In light of this information, project work began with the building of "smart city" foundations for urban development by utilizing the most advanced environmental technology and IT networks at the time while formulating the "Smart & Share Town Concept," which offers a space for residents to cultivate the bonds between them (sharing spirit).

I joined this project before sales began. My mission was to approach residents after moving in and make communitybuilding among them a reality. However, not a few of my coworkers were concerned about coming up against discontentment regarding the residences we had developed through direct contact with clients and about whether they could operate a city that satisfies its residents. Moreover, I was personally apprehensive about pressing for cooperation between the residents and the local community, as I find it inherently difficult to force social relationships. Despite these doubts, I changed my perspective when I began to reflect seriously on the disaster-stricken areas and the expansion of opportunities to take concrete action to assist in recovery efforts in the aftermath of the Great East Japan Earthquake. I did not want to let even that modest feeling of consideration for others fade away and came to realize that consideration for others is something that should be deeply connected to the Company's city-building goals. I have come to believe that it is exactly because I find social relationships demanding that I was able to find the shortest route to ideal community-building.

Figure 1



#### Building Cities That Sustain Themselves after Community-Building Support Ends

#### Q. What did you care about with respect to community-building?

**Soda:** To many, "community-building" implies events. But participating in events alone is not enough to create a community. What is necessary for residents is to maintain daily communication. It is our hope that community-building activities continue, even after our support for them ends.

Our first task was to establish the Morino City Community Building Association—currently the Morino City Residents' Association. The Company intended to support the activities of this association for three years following its establishment, and then have residents and local businesses take over leadership from the fourth year onward. 2017 marked that fourth year and, despite the end of Company support, residents and local businesses continued association activities, such as the summer festival and cleanup activities.



Clean Green activity in 2013

That was a communication challenge for the Company. When I encountered this obstacle, I shared the desires behind the construction of the city with the association. The Company hoped to make this city a better place. I asked the association how they wanted to use such a place and what they could do with it. This approach inspired great change in the residents, and members began to take

more autonomous action than they had before. Now, management of the residents' association is carried out independently by residents and local businesses. However, the importance of daily communication in returning leadership to residents was the major breakthrough.

As part of ongoing trial and error, we have worked to actively incorporate the opinions of outside parties. In particular, we received input from the office running the association and advice from a representative knowledgeable about self-governance from an external partner, which was especially useful. We held meetings in which we addressed, one by one, doubts that I myself may have had if I were a resident. As a result, we were able to smoothly communicate to residents our vision for the future, including the type of city-building we hope to achieve and our financial plans. It is precisely because no precedent for this existed, even within the Company, that we were able to find our way to the most ideal solutions for our residents, by always trying to see things from their perspective. This contributed to the development of my ability to provide convincing explanations.



We are also devising methods for the operation of the association itself. In order to guarantee the continuation of community-building activities, the system for operating costs must be adjusted. As the organizer, the Company has taken on costs for both itself and the establishment of the association, such as personnel costs and the costs of holding early socializing events. However, while support for community-building activities was limited to three years, activities in the public interest, including disaster preparedness, tree planting, and beautification of the environment, are being covered by membership fees from residents and local businesses and have continued even after the Company's support ended. Moving forward, the residents themselves will assume responsibility for personnel costs and will fund maintenance of the mechanism for activity agendas and administrative work through area management. I believe that a major factor in guaranteeing the continuation of community-building activities is securing both continuity and management that does not place inordinate strain on residents and local businesses.

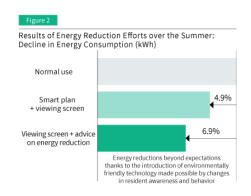
## Raising Awareness and Producing Results beyond the Introduction of Technology

#### Q. How did you pursue becoming environmentally friendly?

**Soda:** Cultivating autonomy in residents has produced significant results, even for the environment. No matter how many advances in environmental technology are introduced, experience suggests that energy saving efforts based on a sense of duty are generally

unsustainable. This is another arena where a system is necessary so residents themselves can maintain a sense of environmental awareness and a shared vision for the city that includes cultivating green spaces, restoring the power of nature, and saving energy. Discoveries gained through environmental programs based on these ideals are proving effective as a source of motivation for residents. For instance, 240 households, roughly half, participated in growing "green curtains" on their balconies in the summer of 2013, prompting the establishment of a gardening group. This is a perfect example of self-sustaining community expansion.

Funabashi Morino City has done more than just introduce advanced environmental technology. It is also characterized by initiatives to raise awareness regarding energy conservation among residents and confirmation of participation in energy reduction by residents. In fact, when we examined the results of reduced electricity use and limits on maximum power consumption covering 500 households, we found the energy savings we had achieved were higher than we had hoped. Measures such as the installation of monitors that visually display electricity use in private areas, the restriction of peak energy use by residents within their households, the introduction of billing systems for reduced utility costs, and the provision of advice tailored to each household have resulted in a change in both resident awareness and behavior (Figure 2).



Recently, observations from countries promoting the "smart city" concept have been on the rise. During observations, the foremost concern is energy management. In addition to the physical supply side and devices designed to reduce energy use, considerable changes in resident awareness and behavior have inspired a particularly significant response. The same obstacles to a rich life exist in all countries. We would like to make use of our knowledge to work together with people of differing values to find their solution.

## The ÉcoQuartier Quality Label and the Future of Funabashi Morino City

Soda: Such environmental initiatives have been highly acclaimed, with Funabashi Morino City becoming the first non-French project to be awarded the ÉcoQuartier quality label for environmentally friendly communities by the Ministry of Housing and Sustainable Home of France in 2016. In pursuit of sustainable urban development, the ÉcoQuartier quality label system focuses mostly on self-governing bodies. Since its establishment in 2012, over 800 French cities have earned approval and of 353 projects submitted, 51 gained certification, making this a highly successful system for promoting urban development in France. The ÉcoQuartier quality label charter contains 20 criteria that illustrate the principles of sustainable urban development. These commitments are not specific numerical targets. They require that the contents be understood, measures taken to implement them, and the results analyzed. These administration-centered evaluation indicators are very diverse and, for developers, can function as a comprehensive form of evaluation for urban development. We also plan to open OUKAS Funabashi—our first elderly housing project—in October 2017 on land adjacent to Funabashi Morino City. As a vital element of urban development, we are

aiming to operate elderly housing that the local community can

feel secure using.

### 20 ÉcoQuartier Certification Assessment Criteria

Approach and process	Territorial development
<ol> <li>Carrying out projects that meet everyone's needs.</li> </ol>	11- Balanced local economic development.
<ol> <li>Management for the entire project period.</li> </ol>	12- Providing a wide range of functions in the community.
<ol> <li>Incorporating the life-cycle-cost approach.</li> </ol>	13- Optimizing the consumption of resources and developing local
4- Taking account of users'	sectors and short circuits.
practices and managers' constraints.	14- Favoring walking/bicycling and public transport.
<ol> <li>Implementing continuous assessment and improvement practices.</li> </ol>	15- Deploying innovative services and networks.
Living environment	Preservation of resources and
Living environment	adaption to climate change
Working with the existing city and proposing an appropriate density.	adaption to climate change  16- Taking initiatives to anticipate and adapt to climate changes and risks.
6- Working with the existing city and proposing an appropriate	16- Taking initiatives to anticipate and adapt to climate changes
Working with the existing city and proposing an appropriate density.     Implementing conditions of mutual help.     Providing a safe and healthy	Taking initiatives to anticipate and adapt to climate changes and risks.     To Conserving energy and promoting the use of renewable energy resources and recovery.
6- Working with the existing city and proposing an appropriate density. 7- Implementing conditions of mutual help. 8- Providing a safe and healthy living environment. 9- Taking account of landscape	16- Taking initiatives to anticipate and adapt to climate changes and risks.     17- Conserving energy and promoting the use of renewable energy resources and recovery.     18- Reducing, recovering, and recycling waste.
6- Working with the existing city and proposing an appropriate density. 7- Implementing conditions of mutual help. 8- Providing a safe and healthy living environment.	16- Taking initiatives to anticipate and adapt to climate changes and risks.     17- Conserving energy and promoting the use of renewable energy resources and recovery.     18- Reducing, recovering, and

As the results of our honest work on this project indicate, we tackle each challenge with enthusiasm and sincerity from the perspective of a developer and of a customer. I am confident that this approach, which we apply to offices and commercial facilities as well, will bring us closer to solving the social issues we face both in Japan and abroad. It is our belief that our competitive edge as a company occupies the same vector as the creation of social value through urban development.

#### **Summary**

# Outcomes Gained from Building Funabashi Morino City

Mixed-use u developmer	and green snaces District planning, landscape guidelines
Smart desig	Introduction of CO2 reduction models and a highly acclaimed energy management system (first use of enecoQ) including not only green technology but also methods to verify how energy is used, and energy management verification
Shared spac	Established a clubhouse for community activities and as a center for disaster preparedness and crime prevention activities  Common facility for each block and car, bicycle, and equipment sharing
Community support	Creation of a place to foster bonds between residents Urban Development Committee: to promote urban development via residents and local businesses and support management of other committees Housing Complex Residents' Association: to promote interaction across generations through community clubs Various programs: big band (ongoing for 3 years), green curtain (ongoing for 1.5 years), disaster preparedness manual (ongoing for 6 months), etc.

## **Third-Party Evaluation**



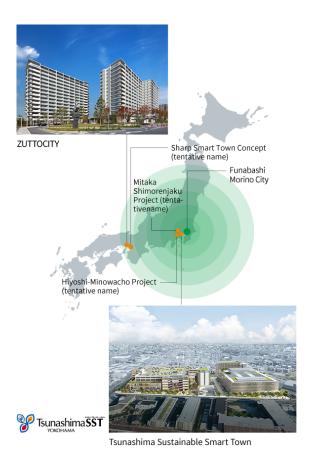
## ÉcoQuartier Quality Label (eco-district certification)

The first non-French project to be awarded the ÉcoQuartier quality label quality label for environmentally friendly communities by the Ministry of Housing and Sustainable Home of France

#### **World Smart City Award**

Presented a World Smart City
Award in the Project category by
the Smart City Expo World
Congress 2013 for its highly
acclaimed initiatives to create
sustainable economic value in
line with the "Smart & Share
Town" concept

#### **Effort to Spread Urban-Type Compact Towns**



#### Tsunashima Sustainable Smart Town

Location	Yokohama, Kanagawa Prefecture
Special characteristics	Numerical targets, such as those for CO2 emissions, have been set and objectives urban-type smart cities should meet established in pursuit of creating a sustainable city.
	Unified operation under regulations and smart services to achieve sustainable and comfortable living through landscape and design.

#### **ZUTTOCITY**

Location	Amagasaki, Hyogo Prefecture
Special characteristics	We are taking part in initiatives to create a "smart community" certified by Amagasaki City, constructing a variety of facilities on an expansive site with roughly 8.4 ha of total land for development.
	A private childcare facility opened on the ZUTTOCITY site in April 2017.

#### Sharp Smart Town (Tentative) Concept

Location	Osaka, Osaka Prefecture
Special characteristics	We are planning to build cutting-edge "smart condominiums," in collaboration with Sharp Corporation, that incorporate the strengths of both companies.
	With the goal of conducting business to make the IoT a part of people's lives and creating a smart society where people can live more richly, we are combining smart homes that bring humans and machines together with smart offices where people can work energetically.

## **Tackling Services for Elderly Residents**

The Nomura Real Estate Group has launched the new elderly housing brand—OUKAS—as an indispensable part of its aim to "build cities that connect today with tomorrow's possibilities."The concept behind OUKAS is residences that support life and facilitate "a healthier tomorrow." The aim of the facility is to try to extend healthy life expectancies through attention to both body and soul by such means as the exercise program we co-developed with Nomura Real Estate Life & Sports. We are working to incorporate this as an important function of urban development moving forward.

OUKAS Funabashi is scheduled to open in October 2017,as the first project with a total of 125 units located next to Funabashi Morino City. Within the next 10 years, we hope to offer 5,000 units at 40 buildings.



#### On the Nomura Real Estate Group's Town Management

I would like to see the Company create legendary places that encompass more than just space, but also time, and are synonymous with "community."



#### Satoko Shinohara

Company since 2014.

**External Director** 

Professor at the Department of Housing and Architecture, Faculty of Human Sciences and Design, Japan Women's University
Satoko Shinohara Living Design Institute LLC
Ms. Shinohara has abundant knowledge, experience, and extensive insight regarding methods to create common spaces in apartment buildings gained not only from her many years working as an architect but also from her perspective as a researcher. She has been working as a director for the

The atmosphere of a neighborhood can influence the level of attachment residents feel, just as a corporate atmosphere can influence employees' feelings about a company.

#### The Importance of a Climate of Cooperation between Residents

In addition to my job as an external director, I design buildings and work as a university professor. What I have been working on, in particular, in recent years, is studying the lives of residents of housing complexes and towns within Japan and the rest of Asia. When conducting my research, I have encountered a number of ideal communities. For instance, the Group's Co-op Nomura Sonnou in Inage, Chiba, does not have an elevator. When the residents association examined possible improvements and repairs, they decided that if they could not install an elevator and make the building structurally barrier-free, younger residents would carry their elderly down from top floors, in the case of emergency. I admire the willingness to look beyond simple physical solutions. Many people in this condominium become very attached to their residence and continue to live there for a long time because they have established an inclusive communication environment. Moreover, while the building itself is not at all in a good location, the majority of residents are so fond of their home, believing it to have a charm and value that transcend its location, people sign up for them immediately when units would sell immediately as soon as there are put on the secondary market. On the other hand, there were also examples of housing complexes that are easy for families with children to live in but dissatisfied the elder residents. There were also cases where high resident turnover led to a lack of communication

among residents. This is an example of a lack of communication among residents.

As this researched continued, I came to realize that even if it is the real estate companies that create the buildings, it is the residents themselves who must take the initiative to cooperate in order to create a place where they feel at ease and can continue living for a long time. The atmosphere of a neighborhood can influence the level of attachment residents feel, just as a corporate atmosphere can influence employees' feelings about a company. I believe that planning large-scale apartment complexes is virtually town-building in a short period of time, and therefore the attachment to the town itself represents the true value of that location.

Funabashi Morino City is a project that embodies those concepts. Ms. Soda, who worked on this project, referenced the results of both the Company's and my research in conceiving a system to urge cooperation among residents. I was struck by the way she worked to instill a sense of autonomy and duty toward town-building in the residents. Moreover, continuing a relationship after the sale is key. There is a concern that being too conscious of the ideal town before the sale will cause services to swell, which will only bring the town further from that ideal. For instance, an elderly housing facility with supportive services is planned to open in Funabashi Morino City in October 2017, approximately four years after the sale. This represents an ideal approach whereby we gradually add value over a certain period of time. I believe service development that occurs all at once without an atmosphere of cooperation between the town's residents will eventually lead to a squandering of resources.

Of course, town-building is not only about the intangible aspects. The tangible ones are crucial,too. For instance, creating a formal entrance hall is a vital element to condominium construction, as it functions as the face of the building. However, it is also important to furnish that entryway in such a manner as to naturally encourage residents to not only greet each other but also stop and talk. Furthermore, as beautiful and peaceful as inner courtyards are, building tall enclosure walls to ensure safety and security would have a negative impact on the surrounding environment and do nothing to increase the value of the town itself. In such a case, it might be better to consider an arrangement more beneficial to both the town and the surrounding environment, such as a timed gate that opens onto the courtyard.

The responsibilities of a real estate company go beyond that of space. Time is also a crucial element.

#### **Expectations of the Nomura Real Estate Group**

The Nomura Real Estate Group adopts a process integrating development, sales, and management. Given the fact that I am usually able conduct an inspection of a property immediately after being contacted, I have been able to experience the functionality of this integrated process firsthand. The integrated process the Group has in place to provide timely feedback from the management company to the development department is functioning

properly. Furthermore, by virtue of our foresight in focusing on residential communities, we collect useful information faster than our competitors. This is information that should be utilized as a part of our toolbox. For instance, town-building does not have to hinge on condominiums. It could be centered on detached houses. In regard to living space, the time when three-bedroom units were the standard is coming to an end. Couples that no longer live with children may block off a section of their living space and rent it out. When they retire, they may turn an extra room into a home office where they can work separately from where they live. The idea of one family to one residence is not a given. Unfortunately, renting a portion of one's residence to another is restricted under the law in Japan. However, as a company with intimate knowledge of the housing situation, it may be advisable for the Nomura Real Estate Group to recommend a policy aimed at shifting the government's stance.

The responsibilities of a real estate company go beyond that of space. Time is also a crucial element. Long-term survival as a company of value is not possible without that perspective. Objectively speaking, the Nomura Real Estate Group's pool of human resources who are well versed in construction is quite large when compared with other companies. The Group is also highly fastidious about its buildings and deliberate in the way it works. While it has several challenges to overcome, the Group will make great use of its strengths in order to create renowned spaces synonymous with community.