



# Toward a future 100 years from now

## The Beginning of Co-creation and the Delight that Awaits Us

Resonac Graphite Japan and Omachi City, Nagano Prefecture

Omachi City in Nagano Prefecture and Resonac Graphite Japan have forged a close bond for over half a century, focused on the hydroelectric power plant and a water supply system built by Nobuteru Mori, the founder of the former Showa Denko. Today, new co-creation projects are being launched, including projects aimed at utilizing unused local materials (branches and leaves) for boilers and collaborating on SDGs education.

### 1 Resonac and regional issues

**Q** What issues are you working to solve with Omachi City and Nagano Prefecture, our partners with whom we have been working to change society together?



**Resonac Graphite Japan** "We want to support the iron recycling using the electric furnace method, which is a clean, highly energy efficient, and environmentally friendly manner of manufacturing, while creating new value through co-creation with the local community."

**Yamashigoto Sozoshu** "With the people involved in forestry getting older, we are committed to developing forests with the cooperation of various stakeholders in order to make sure the rich forest land remains protected."

**Omachi City, Nagano Prefecture** "Amid population decline due to the low birthrate and aging population, we want to promote the management of the natural environment and spread the appeal of our unique water resources as an SDGs Future City, in order to realize a sustainable local community. We want the government and companies to work together to contribute to the development of the region."

### 2 The beginning of co-creation and its expansion

In the production of graphite electrodes at our Omachi Plant, the reduction of CO2 has been an issue. To resolve this, we started considering the introduction of a boiler that uses wood chips in 2022. Aiming for local production and consumption of unused wood in the region, we held many discussions with Mr. Harada of Yamashigoto Sozoshu and local residents, and gradually came up with concrete proposals which included resolving technical issues related to turning unused wood into fuel.



**Hayate Murakami**

Engineering Section and SDGs Promotion Section  
Resonac Graphite Japan

Above all, I was happy that a company that leads Omachi turned its attention to the mountains. Mr. Murakami has visited the mountains countless times, and with a keen attitude to grasp our situation, he proposed to turn unused, dumped wood into value. Forestry is posed by many challenges, but we feel very encouraged to be able to collaborate with a company that has such a flexible mindset.



**Mr. Harada**

Yamashigoto Sozoshu

Inspired by Murakami's proposal, we considered further initiatives beyond using wood chips that contributes to the mountains themselves. As such, we participated in the Forestry Foster Parent Promotion Project. We have been engaging in deeper communication with local residents through information sessions and other events, and are currently undertaking an initiative to develop the forest owned by the Company near the Tokiwa Power Station and make it a place that everyone in the community can enjoy.



**Hiroshi Ohta**

Human Resources & General Affairs Section  
Resonac Graphite Japan

Omachi City was the first municipality in Nagano Prefecture to be certified as a nationally recognized SDGs Future City. The hydroelectric power generation and water supply system that Resonac has provided for nearly 80 years are essential to the development of the region. The Aoki Power Station and water intake facility have been cooperating with us in our effort to promote SDGs Exploration Educational Trips related to water. We ask for the continued cooperation in promoting our city plan "SDGs Future City Plan: Shinano Omachi, where water is born."



**Mr. Sakai**

Planning and Finance Division, General Affairs  
Department, Omachi City, Nagano Prefecture

We find Resonac's shared water supply system for power generation and for agricultural use very unique. With the declining birthrate and aging population in rural areas nationwide, and the agricultural population also decreasing, it is very difficult for farmers to maintain such water systems. As such, we are very grateful for the support, but we are also concerned about what might happen in the future. In order to increase the appeal of the region, it is very important that people connect with each other and spread the efforts to promote the appeal of local water facilities.



**Mr. Okamoto**

Agricultural Land Management Division, Northern Alps Regional Promotion Bureau, Nagano Prefecture



**Mr. Ome**

Forestry Division, Northern Alps Regional Promotion Bureau, Nagano Prefecture

Another delight of co-creation at play!

### Semiconductor materials that change society

Semiconductors are becoming increasingly sophisticated and functional. The rapid expansion of generative AI, logistics, smart agriculture, demand forecasting, finance/insurance, office work, autonomous driving, shopping and beauty are some of the dramatic changes our lives are undergoing. This is where semiconductor materials play an essential role. With a high market share particularly in post-processing materials, Resonac is involved in co-creation activities represented by the Packaging Solution Center and JOINT2, and has also launched US-JOINT in Silicon Valley. Wherever there are semiconductors, in every scene, Resonac will contribute to people's happiness and prosperity.

### 3 Future of co-creation



**Resonac Graphite Japan** "We hope to go beyond using wood chip boilers that utilize local forest resources, and create a place of co-creation, such as for working with the locals to conserve the local forest green spaces, and share these efforts with the world, along with Omachi's remarkable water supply system. We would also like to increase interactions with young people who will lead the next generation, and support them in taking action."

**Yamashigoto Sozoshu** "We would also like support in ensuring the forests' multifaceted functions beyond timber production, in order to continue creating strong, rich forests. We dream of beautiful forests that soothe and relax people wherever they look in this region."

**Omachi City, Nagano Prefecture** "We have launched the Shinano Omachi Mizunowa Project, a collaboration between Industry-Academia-Government and Finance, and have begun urban development centered on water. We would like to create a place where we can exchange ideas with various partners and build together our future 100 years from now."

