## Thank you very much for reading the "Rigaku Journal"

Hikaru Shimura\*

For the past 70 years, since the founding of our company in 1951, our management philosophy has been to "contribute to the enhancement of humanity through scientific and technological development." By aligning ourselves with the enterprises and institutes pushing the boundaries of possibility over these seven decades, we have continuously expanded our portfolio of original technologies. These, in turn, help us in our efforts to contribute to the research and development of materials as well as the improvement of their performance and functionality.

I would like to express my sincere gratitude to our users and researchers for their guidance and support, which have enabled us to come this far as a manufacturer specializing in X-ray and thermal analysis in the fields of steel, nonferrous metals, cement, automobiles, and more recently, composite materials and lithium batteries.

The onslaught of the novel corona virus has not abated, and the virus itself has undergone repeated mutations, becoming an increasingly formidable and challenging opponent. We are committed to further refining and improving the technologies we have cultivated over the years and to supporting the research and development of new therapeutic antibodies for the eradication of the virus.

On the other hand, giving thought to future global trends, the watchwords of the day are "sustainability" and "carbon neutrality". In contrast to the past, these concepts have now become fundamental to humanity, and unless we can meaningfully achieve them, the very existence of human society itself will be at stake.

The most important question is how and what we, as a global community, industry, and individuals, can do to realize these goals. The Japanese government's objective for carbon neutrality is to "reduce greenhouse gas



emissions and accumulated atmospheric CO<sub>2</sub> to achieve net zero emissions by 2050." Being headquartered in Japan, this will also be the objective of Rigaku and we accept the challenge to provide our customers with products that will help our customers achieve this goal. In the world of industry, electric power companies are expanding their use of renewable energy sources, and automobile manufacturers are developing electric vehicles and fuel cell vehicles. The steel industry is promoting the research and development of "zero-carbon steel," in which hydrogen is used instead of coal.

As a leading manufacturer of X-ray and thermal analysis instrumentation, we are developing the technology needed to support these cutting-edge efforts. Simultaneously, we are working on solving

the fundamental problem of how to reduce the large amount of electricity consumed by X-ray generation and will continue to push forward on this front.

As Rigaku celebrates its 70th anniversary and moves to take on these new challenges, I look forward to your continued patronage and support.

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