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For immediate release

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Ltd.
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Sciqas®-LT Low Dissipation Factor Silica Wins JPCA Encouragement Award at JPCA Show 2024
(Total Solution Exhibition for Electronic Equipment)

Sakai Chemical is pleased to announce that it has received the 20th JPCA Award Encouragement Prize at the JPCA Show 2024 (Total Solution Exhibition for Electronic Equipment). We will remain committed to helping solve social issues through the power of chemistry.

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1. About the Award

Product	Sciqas®-LT Series Spherical Amorphous Silica
Reason for the Award	This product is expected to contribute to the industry by combining atomized, highly-filled fillers with resin to achieve a low dissipation factor.

➤ [Exhibition Overview and Sakai Chemical's Exhibit](#)

➤ [About the JPCA Award](#)

An award system for products and technologies that represent outstanding progress in electronic circuitry and industry given since 2005. In the award, participating companies are judged rigorously on the originality, development potential and future within the industry, reliability, and relevance by a panel of JPCA award judges consisting of experts in academia, the electronic circuit industry, technical journal editors, and more. (https://www.jpca-show.com/show2024/jp/event/jpca_award.html)

2. Overview

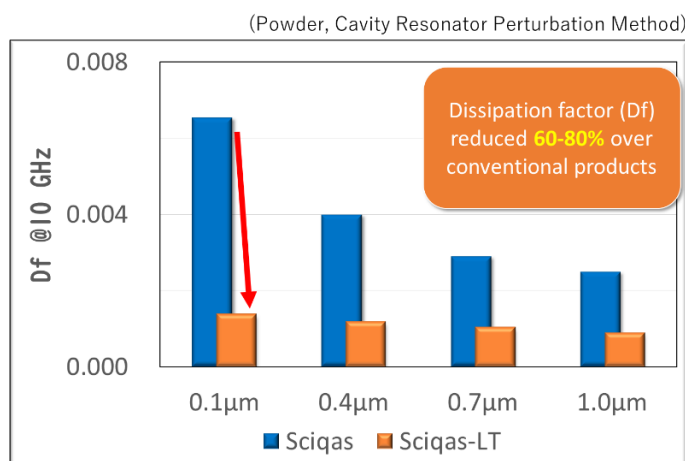
Sakai Chemical aims to contribute with Smart Materials® in the three fields set forth in its new Mid-Term Management Plan “Transformation: BEYOND2030”: environment and energy, electronics, and life sciences and healthcare.

In the electronics sector, there is a growing demand for sub-micron monodisperse silica for high-frequency applications recently, particularly for semiconductor packages. Sakai Chemical manufactures and sells the SciQas[®] series of spherical amorphous silica for electronic devices, demand for which has increased with the spread of IoT and generative AI. To further meet these needs, we radically revised all of our processes from silica particle synthesis to surface modification using the powder processing technology we have accumulated over the years to develop the next-generation SciQas[®]-LT series silica for telecommunication, which achieves both low dissipation factor (Df, tanδ) and is spherical amorphous.

3. Expected Effects

SciQas[®]-LT has successfully reduced Df by 60-80% compared to SciQas[®]. This characteristic remains stable regardless of frequency. This makes it possible to perform surface treatment with different silane coupling agents while maintaining this Df level.

Figure: Comparison of Df Between SciQas[®]-LT and SciQas[®] Powder (10 GHz)



4. Future Development

Using the powder dispersion technology owned by Sakai Chemical also makes it possible to provide SciQas[®]-LT as a uniform dispersion. By focusing on high-value-added products, we strive to be “An excellent company capable of contributing to society with Smart Material[®].”

5. Inquiries regarding this press release

Please call or email us regarding media coverage.

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