

Patentix, a startup from Ritsumeikan University, Raises Approximately 719 Million JPY in Series A Funding

- Accelerating the Social Implementation of Ultra-Wide Bandgap (UWBG) Semiconductor GeO<sub>2</sub>

#### (Overview)

Patentix Inc. (Headquarter: Kusatsu, Shiga; CEO: Toyosuke Ibi; hereinafter "Patentix"), a startup originating from Ritsumeikan University, focuses on the research, development, manufacturing, and sales of germanium dioxide (GeO<sub>2</sub>), an ultra-wide bandgap (UWBG) semiconductor material essential for next-generation power devices.

Patentix is pleased to announce that it has raised a total of approximately 719 million JPY in its Series A funding round. The total amount raised since the company's establishment in December 2022 now stands at 1059 million JPY.

# [Purpose and Use of Proceeds]

With this funding, Patentix will focus on the following key initiatives:

- 1. Accelerating research and development
- 2. Strengthening manufacturing and sample shipment capabilities
- 3. Enhancing talent acquisition
- 4. Promoting market expansion and industrial applications

#### (Background and Future Outlook)

The commercialization of UWBG semiconductors is highly anticipated due to factors such as the spread of EVs, increased power consumption in AI data centers, the growing need to reduce CO<sub>2</sub> emissions, rising energy costs, and demands for small-sized power modules in vehicles. Among UWBG semiconductors, GeO<sub>2</sub> is rapidly gaining attention in recent years because of its potential ambipolar conductivity, which is difficult for other UWBG semiconductor candidates, and promising cost competitiveness.

Since December 2022, Patentix has made steady progress toward the social implementation of this new material semiconductor GeO<sub>2</sub>. In our seed stage, we reported research achievements such as the confirmation of n-type doping and the demonstration of Schottky barrier diode operation.



With the proceeds from this Series A funding, we will strengthen our capabilities for research and development, manufacturing, and social implementation. We will focus on transitioning the GeO<sub>2</sub> power semiconductor from the R&D phase to the commercialization phase, aiming to deliver competitive products, including the electric power, automotive, and even space application sectors by leveraging its superior characteristics of UWBG.

## [A Message from the CEO]

"I am delighted to announce the successful completion of our Series A funding round, made possible through our partnership with a remarkable group of investors. I would like to take this opportunity to express my deepest gratitude to everyone who believed in our challenge to 'commercialize the novel GeO<sub>2</sub> power semiconductor' and joined us as partners in shaping the future. My thanks also go to all those who support our endeavors daily, including our employees and their families. With these new funds, we will shift our development speed and business expansion into top gear to dramatically accelerate the commercialization of GeO<sub>2</sub> power semiconductors. Please look forward to our exciting journey ahead."

### [Company Profile]

- Company Name: Patentix Inc.
- Established: December 1, 2022
- Representative: Toyosuke Ibi (President and CEO)
- Address: Ritsumeikan University BKC Incubator, 1-1-1 Noji-higashi, Kusatsu, Shiga,
  Japan
- Business: Research and development, manufacturing, and sales of a novel next-generation semiconductor (GeO<sub>2</sub> semiconductor).