C4U Corporation

Address	2-8 Yamadaoka, Suita, Osaka
Business Type	R&D using genome editing technology
Phone	+81-6-6369-7180

Aiming for Industrial Applications of Japan-based Genome Editing Technology

Established as a bio start-up from Osaka University with a novel genome editing technology, CRISPR-Cas3, and engaged in R&D for various industrial applications including human healthcare

History

◆ Business Overview

C4U is conducting R&D activities of a novel genome editing technology, CRISPR-Cas3, which was discovered by Dr. Tomoji Mashimo (Professor, Division of Animal Genetics, Division of Genome Engineering, Institute of Medical Science, University of Tokyo), et al, for various industrial applications including human healthcare. The company's name, C4U, represents founders' desire to have the technology widely used in the industry.

【Origin of Company Name】

CRISPR for You

▼

C for You

▼

C4U

◆ Background of Establishment

C4U was established as a bio start-up from Osaka University in March 2018.

Mr. Akimitsu Hirai (President/CEO) received his LL.M. from the Univ. of Washington and has experience participating in the Human Genome Project in a medical doctoral course. As an expert of medical science, law and intellectual property, Mr. Hirai had served in advisory positions for various start-ups and contributed to their IPO as a board member. He was appointed as the President of C4U in August 2020 and is committed to utilizing his vast experience to manage the company for developing CRISPR-Cas3 technology.

Features & Strengths

◆ Business Model and Features

C4U has received the exclusive license of CRISPR-Cas3 related patents from Osaka University, etc., and is proceeding with R&D activities for the technology.

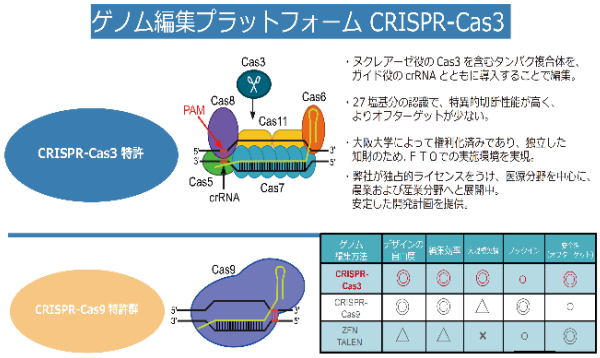
Along with the development of in-house pipeline, C4U actively conducts collaborative research and technology licensing with companies in various fields such as medical (pharmaceutical, diagnostics, gene therapy), industrial (biotechnology), agricultural (flora, fauna) and environmental (biomass). We aim to contribute to society in various fields under the collaboration.

◆ Strengths

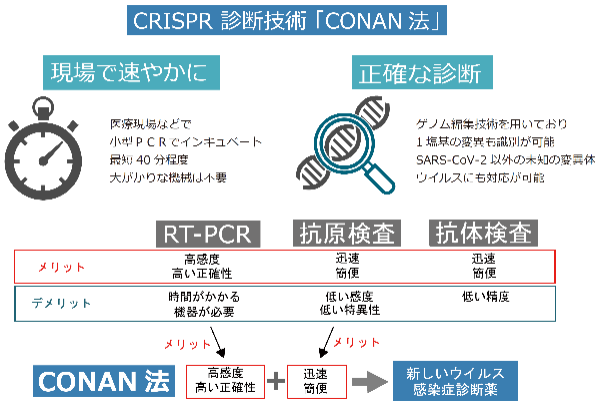
Since conventional CRISPR-Cas9 technology has been developed by many companies globally, CRISPR technology is attracting the attention in various industries. In comparison to CRISPR-Cas9, CRISPR-Cas3 system enables larger deletion which is good for gene knockout. Additionally, the risk of off-target deletion is lower due to its higher base recognition specificity of the target gene. Furthermore, the basic patent of CRISPR-Cas3 is already authorized in Japan and the US, and C4U has freedom-to-operate (FTO) of the patent. Dr. Mashimo also developed CRISPR-Cas3 as prompt and highly precise diagnostics for

virus such as COVID-19 and bacteria such as those that cause food poisoning.

【About CRISPR-Cas3】



【Application of CRISPR-Cas3】



Vision for the Future

◆ Future Business Development Goals & Role Model for the Next 5-10 Years

C4U has developed in-house pipeline and conducted research collaboration with various companies by CRISPR-Cas3 platform and hopes to promote the further application of CRISPR-Cas3 by fundraising from the market near future.

◆ New Product Development & Sales Channels to Expand Services

In the future, we aim to contribute to society by utilizing CRISPR-Cas3 in the medical industry including pharmaceutical companies as well as other areas such as food industries.

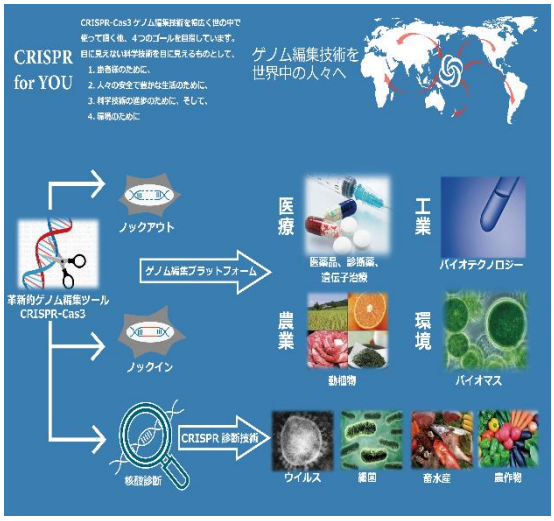
Public Relation Matters

◆ Regarding Services Provided

CRISPR technology has attracted interest in many industries since CRISPR-Cas9 was discovered by Jennifer Doudna and Emmanuelle Charpentier who received the Nobel Prize in Chemistry in 2020. Our researchers focused on the CRISPR-Cas3 technology and C4U was established in March 2018 and established R&D platform for further development under exclusive licenses of key patents.

CRISPR-Cas3 is superior to CRISPR-Cas9 in regard to large deletions and less risk of off-target, and importantly, C4U has FTO of CRISPR-Cas3 patents. C4U aims to create high-quality products not only in the medical industry, but also for others such as agriculture, fishing, and environment.

【Aim of C4U】



Company Profile

Established: March 2018
Capital: Undisclosed
Employees: 20
URL: http://www.crispr4u.jp/en/
Start of Services: January 2021