



Technology Offer

Novel PROTACs for the treatment of cancer

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Cancer stands as the second-leading cause of human death worldwide, following closely behind cardiovascular and cerebrovascular diseases, with a prevalence that continues to rise.

Pancreatic cancer, in particular, continues to challenge the field of oncology with a 5-years survival rate of 11% and limited treatment options. Hematologic malignancies have also seen a steady rise in incident cases since 1990, reaching about 1.3 million in 2019.

Despite substantial research efforts, the current treatment options for pancreatic and hematologic malignancies remain limited and there is still a need for better treatments characterized by higher effectiveness and lower side effects.

Technology

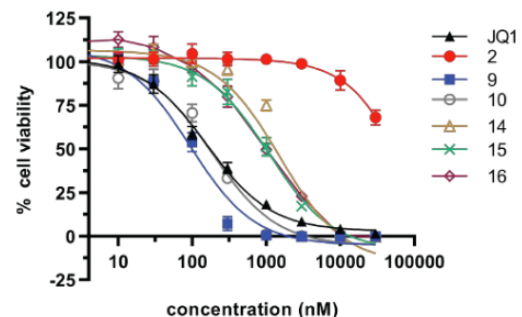
Researchers at the Max Planck Institute for Molecular Physiology have developed a **novel class** of bifunctional protein targeting chimeras (**PROTACs**).

These PROTACs offer the **potential to induce the degradation of a number of proteins**, including:

- **PDE δ** : A significant regulator of cellular distribution and activity of Ras-oncoproteins;
- **BET family of bromodomain proteins**: Key players in epigenetic regulation;
- **BLK and Bruton's tyrosine kinase (BTK)**: central targets in hematologic malignancies.

The PROTACs are characterized by an **arylidene-indolinone** structure, and have shown a remarkable **protein degradation** activity at low **nanomolar** concentrations.

In vitro data on leukemia cell lines further demonstrate a promising **antiproliferative effect**, with an **IC₅₀** in the **nanomolar range**.



Patent Information

Priority Patent Application filed in March 2023.

Opportunity

We are open to **research collaborations** or **license agreements** to accelerate the integration of this promising compound into the clinical practice.

Contact

Dr. Ingrid Kapser-Fischer
Senior Patent- & License Manager
Nutritionist, M.Sc.
Phone: +49 89 / 29 09 19-19
Email:
kapser-fischer@max-planck-innovation.de