

OncoGenomX - a company building AI-enabled solutions for lasting metastasis prevention

Breast cancer is [the most common cancer in women](#) in the U.S., except for skin cancers. It is about 30% (or 1 in 3) of all new female cancers each year. The American Cancer Society's estimates for breast cancer in the United States predict that, in 2022, about 287,850 new cases of invasive breast cancer will be diagnosed in women and about 43,250 women will die from breast cancer. On top of that, [every second](#) woman with hormone-dependent breast cancer is undertreated or overtreated, according to research by American Cancer Society. Translated in numbers, that is 135,000 women per year.

According to Dr. Mark Pegram, the first director of the Breast Cancer Oncology Program at Stanford Women's Cancer Center and the Susy Yuan-Huey Hung Professor of Oncology, recent studies have shown that an increasing number of breast cancer patients are still overtreated. And with an aging demographic, the numbers continue to rise. "There is no doubt that the problem of overtreatment needs urgent resolution. Indeed, bringing the right treatment to the right patient will go a long way to avert unnecessary risks from overtreatment side effects, as well as result in better cost-effectiveness in health systems," he shared with me in an email.

"The main reasons for this and the worsening of the situation over the past 15 years are overdiagnosis, fear of recurrence, side effects, treatment failure, and financial hardship. As an oncologist, I know that in the absence of a reliable procedure enabling the optimal treatment, as a rule, the chances of stopping breast cancer will not improve significantly, spending on breast cancer therapy will continue to increase and the risk of suboptimal therapy and outcome will remain unchanged," explains Wolfgang Hackl, founder and CEO of [OncoGenomX](#), a Swiss-based company on a mission to become the best treatment guidance software for breast cancer and to make durable metastasis prevention an option and a reality for all patients. Its first product, PredictionStar - a novel method for determining the correct cancer treatment regimen for permanent prevention of metastasis, has the potential to effectively solve the above problems with 85% chance of determining the best treatment option. "This outperforms the clinical decision offerings of the competition (55% chance)," adds Hackl.

Enabled by proprietary AI and machine learning algorithms, PredictionStar interprets the results of clinical and histological image assessments, tumor and blood gene tests, by empowering oncologists with the best tool to determine the most efficacious treatment for durable metastasis prevention. This means it can effectively reduce the risks of over or under-treatment, diminish costs, and improve efficiency.

Since its launch in October 2020, the company has raised around \$1.1 million, partly from undisclosed private investors, partly as non-diluted research funds. "To finance the transformation of OncoGenomX from a concept and discovery into a product development organization, we are now looking to raise \$20 million to become commercialization and clinical study-ready by 2024," concludes Hackl.