

Cuba Showcases Progress on Cancer Vaccine



Cuba continues to work on vaccines and cancer drugs (Source: [ElDescarte](#))

Amid the current crisis, medical research continues in Cuba. Cuban scientists recently [presented](#) the results of Phase II clinical trials of the therapeutic vaccine candidate HEBERSaVax, which [were published](#) in the medical database *PubMed* a few weeks ago. The drug is based on the principle of active immunotherapy—an approach in which the body's own immune system is specifically stimulated to fight cancer cells—and is intended to treat various types of solid tumors.

The drug was developed by the Center for Genetic Engineering and Biotechnology (CIGB) in Havana, which had previously developed the Abdala COVID-19 vaccine.

Restoring the body's immune response

Dr. Yanelys Morera Díaz, project leader and member of the Cuban Academy of Sciences, explained the mechanism of action: The drug intervenes in the tumor process on multiple levels simultaneously by producing specific antibodies that interrupt blood flow to the tumor, thereby depriving it of nutrients and oxygen. At the same time, the patient's own immune response is restored to actively kill cancer cells.

The researcher emphasized that the study has gone through all regulatory phases—from animal testing to the most recent Phase II clinical trials on specific tumor sites. The drug's safety profile was particularly highlighted: adverse effects are rare and well tolerated.

This allows for combination with conventional cancer therapies without increasing their toxicity, according to Morera Díaz. Many study participants experienced a measurable

improvement in their quality of life, and some even saw complete tumor regression, even in advanced stages of the disease.

Clinical researcher and internist Julio César Hernández Perera, also a member of the Cuban Academy of Sciences, confirmed the high safety profile and pointed to the broad potential applicability: Since the preparation targets a protein that is present in elevated amounts in many tumors, its use in a wide variety of tumor types is conceivable. To date, HEBERSaVax has been clinically validated for colorectal cancer, hepatocellular carcinoma, ovarian cancer, and kidney cancer.

Cancer researcher Adriana Felinciano Pozo added that subcutaneous administration—that is, injection under the skin—simplifies practical handling in routine clinical practice. She spoke of “solid data” and emphasized the drug’s compatibility with other medications.

The research team and health authorities plan to proceed with further development phases to integrate HEBERSaVax into the available therapeutic arsenal. Morera Díaz expressed hope that the drug could also be used in primary care in the future. Given that cancer is one of the leading causes of death worldwide, the researchers see significant potential in the candidate.

Biotechnology “Made in Cuba”

Anyone familiar with Cuba’s biotechnology sector will hardly be surprised by these results. The explanation lies in the biotech sector, which has been systematically built up since the 1980s. The Center for Biological Research was established as early as 1982, followed in 1986 by the Center for Genetic Engineering and Biotechnology (CIGB). In 2012, they were merged with parts of the pharmaceutical industry to form the state-owned BioCubaFarma group, which is now considered a strategic economic sector.

The fact that Cuba can mobilize this capital even under pressure was most recently demonstrated impressively during the COVID-19 pandemic: Out of concern that it would be unable to procure vaccines due to the decades-old U.S. embargo, the country decided in mid-2020 to develop its own vaccines—and within a year brought Abdala, the first COVID-19 vaccine approved in Latin America, to market. In total, Cuba developed [five different COVID-19 vaccines](#) during this period, including Abdala, Soberana 2, and Mambisa, which have been approved in several countries. ([Cubaheute](#))