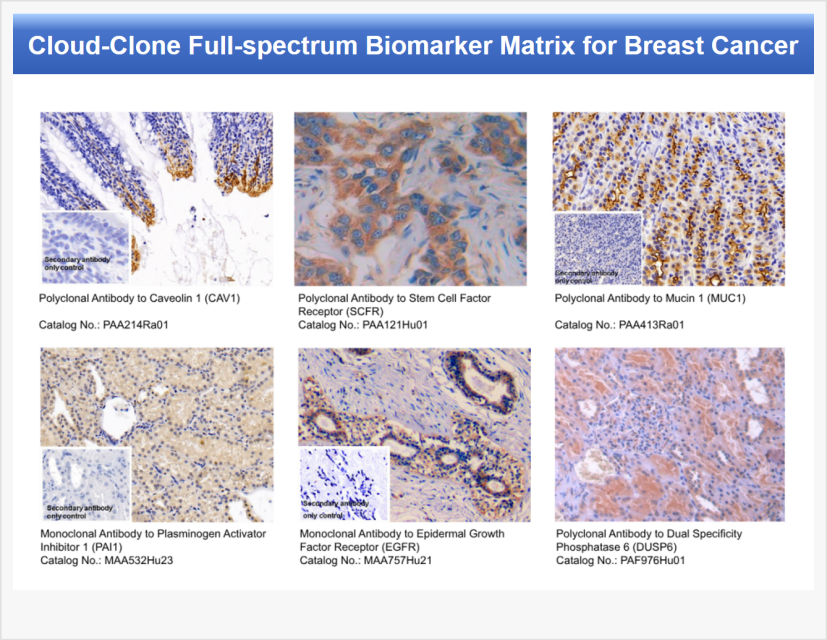
Breakthrough&Empowerment: Cloud-Clone Pioneers Advanced Biomarker Panels in New Era of Precision Breast Cancer Research

Full-Dimensional Product Portfolio Covering 30+ Core Targets, Supporting Entire Spectrum of Breast Cancer Research From Basic Mechanisms to Clinical Specimens



HUSTON, TX, UNITED STATES, August 17, 2026 /EINPresswire.com/ -- Breast cancer has evolved into a major global public health crisis. Statistics from the 2023 Global Burden of Disease (GBD) study show that 2.3 million new female breast cancer cases and over 760,000 related deaths were recorded worldwide in 2023. From 1990 to 2023, the age-standardized incidence rate surged by 147.2% in low-income regions. Industry projections estimate that global annual new cases will exceed 3.56 million by 2050. Nowadays, breast cancer diagnosis and treatment have shifted from conventional chemotherapy to precision medicine. As highlighted at the 2026 National Breast Cancer Conference alongside the release of the CSCO Breast Cancer Clinical Practice Guidelines, precise detection lays the fundamental foundation for precision oncology care. Breast cancer features highly heterogeneous subtypes including triple-negative and HR-positive tumors, with targeted and ADC therapeutics continuously updated. Comprehensive research covering target screening, drug resistance mechanisms and pharmacodynamic evaluation requires standardized, high-precision biomarker detection reagents. Responding to this universal global research demand, Cloud-Clone has built a complete portfolio of breast cancer biomarker products to deliver robust technical support for worldwide scientific exploration.

I. Full-Spectrum Biomarker Layout: Cloud-Clone Develops an All-in-One Product Matrix for Breast Cancer Research

Based on its mature recombinant protein expression and antibody development platforms, Cloud-Clone has constructed a comprehensive product library covering more than 30 core biomarkers, fully catering to the full research workflow: basic mechanism studies, animal model assays and clinical specimen testing. The product line consists of recombinant proteins, specific

antibodies, single-plex ELISA kits and multiplex detection panels, compatible with human, mouse, rat and other species, covering four major research dimensions:
1.Core oncogenic drivers: Complete reagent sets for classic targets including BRCA1, BRCA2, EGFR, HER2, PARP and c-kit (SCFR)
2.Proliferation & prognostic markers: Full coverage of clinically applied indicators such as Ki-67, MUC-1, uPA, PAI-1, TP53 and NM23-H1
3.Invasion & stemness biomarkers: Well-developed products targeting tumor metastasis factors Nestin, Caveolin-1, RHAMM and CK14
4.Cutting-edge emerging targets: Pre-developed reagents for novel research biomarkers AIM2 and DUSP1 to align with frontier breast cancer studies

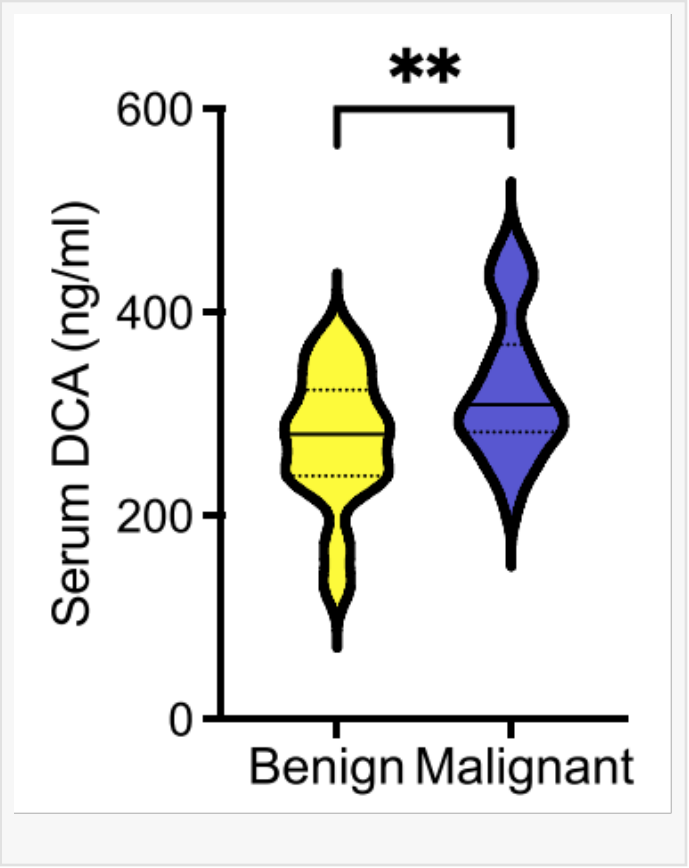


Figure 1. Cloud-Clone full-spectrum biomarker matrix for breast cancer

Supported by rigorous quality control systems and highly specific antibodies, Cloud-Clone delivers ELISA kits with outstanding overall performance. Taking the DCA ELISA kit (Catalog No. CES089Ge) as an example, its detection range spans 12.35–1000 ng/mL with a limit of detection of 4.91 ng/mL; intra-assay CV <10% and inter-assay CV <12%. The company has obtained ISO9001, ISO13485 and ISO14001 certifications, implementing standardized full-process control from raw material traceability to finished product release, ensuring exceptional batch-to-batch consistency. Cloud-Clone has also been honored as one of the world's best ELISA kit suppliers by CiteAb, with quantitative detection performance reaching top international standards. Its reliable, comprehensive reagents are widely adopted by research institutes across the globe, supporting numerous high-impact publications in leading international journals.

II. Validation by Massive Top-Tier Journal Publications: Cloud-Clone Products Fuel Global Breast Cancer Innovation
Cloud-Clone's well-rounded portfolio and stable detection performance make its reagents a preferred choice for research teams worldwide. Multiple high-scoring SCI papers rely on Cloud-Clone kits to generate key experimental data, forming authoritative global academic validation.
Landmark Case 1: Cell Metabolism – Kits Uncover Novel Gut-Mammary Regulatory Axis
In May 2026, research teams led by Prof. Fu-Ming Qiu and Prof. Jian Huang at the Second Affiliated Hospital of Zhejiang University published a landmark study in Cell Metabolism, titled "Gut microbiota-derived deoxycholic acid shapes an immunosuppressive tumor microenvironment and promotes breast cancer progression".
The research verified that deoxycholic acid (DCA), a metabolite of gut flora, drives an

immunosuppressive tumor microenvironment via the FXR/NF-κB cascade to accelerate breast cancer development. For the first time, it established a gut microbiota-bile acid-tumor immunity regulatory pathway, identifying DCA, FXR and IL-6 as potential therapeutic targets for breast cancer intervention.
The team collected serum samples from 25 malignant breast cancer patients and 31 patients with benign breast lesions, quantifying DCA concentrations across all 56 specimens using Cloud-Clone's deoxycholic acid ELISA kit (Catalog No. CES089Ge). Significant DCA level differences were observed between the two cohorts, establishing a clinical correlation between gut microbiota-derived DCA and breast cancer progression in human clinical samples.

Figure 2. Comparison of serum DCA levels across 56 subjects with benign and malignant breast lesions

Landmark Case 2: Nature Communications – Dual Reagents Accelerate Nanovaccine Development
On April 24, 2020, Prof. Xian-Zheng Zhang's research group from the Key Laboratory of Biomedical Analytical Chemistry (Ministry of Education), Wuhan University, published groundbreaking work in Nature Communications, titled "A vaccine-based nanosystem for initiating innate immunity and improving tumor immunotherapy".
The team engineered a novel nanovaccine platform with excellent biosafety, achieving a 71% reduction in tumor recurrence and 67% extension of progression-free survival in both resectable and unresectable breast tumor animal models. To comprehensively characterize the nanosystem's immunomodulatory effects, two Cloud-Clone ELISA kits were deployed for precise quantification of key immune mediators: Macrophage Inflammatory Protein 1α (MIP-1α) ELISA kit (Catalog No. SEA092Mu) and Histamine (HA) ELISA kit (Catalog No. CEA927Ge). Accurate quantitative data generated by these kits served as critical evidence to elucidate the nanovaccine's anti-tumor immune mechanism, enabling this breakthrough to be featured in a prestigious Nature sister journal.
Beyond these two landmark studies, multiple research groups globally have leveraged Cloud-Clone reagents to publish high-impact findings:
- Medical University of South Carolina & The Affiliated Hospital of Xuzhou Medical University utilized uPA and PAI-1 kits for research published in Journal of Allergy and Clinical Immunology and Haematologica;
- Nanjing University, National Cancer Center Korea, University of Würzburg (Germany), University of Glasgow (UK) adopted HER2, CEA, EGFR, TP53 and Ki-67 products for work featured in Analytical Chemistry and Molecular Cancer Therapeutics.
Independent multi-center trials worldwide have repeatedly validated Cloud-Clone's superior sensitivity, specificity and reproducibility.

III. Conclusion: Biomarker Detection Powers New Breakthroughs in Global Oncology Research
From landmark top-journal studies to thousands of SCI publications globally, Cloud-Clone's full-spectrum biomarker products consistently support frontline breast cancer research. Every

antibody and assay kit carries researchers' pursuit of truth and respect for human life, as demonstrated by landmark teams from Zhejiang University and Wuhan University.
Moving forward, Cloud-Clone will continuously refine manufacturing workflows and expand its biomarker catalog, striving to become the most trusted partner for breast cancer and broader life science researchers worldwide. With precise biomarker detection tools, we aim to decode biological mysteries and jointly work toward a future free from breast cancer threats.

References:
1.Qiu, F., Huang, J. et al. Gut microbiota-derived deoxycholic acid shapes an immunosuppressive tumor microenvironment and promotes breast cancer progression. Cell Metabolism. 2026 May 12; S1550-4131(26)00149-X. doi: 10.1016/j.cmet.2026.04.011

2.Zhang XZ, et al. A vaccine-based nanosystem for initiating innate immunity and improving tumor immunotherapy. Nature Communications. 2020 Apr 24;11(1):1985. doi: 10.1038/s41467-020-15927-0

About Cloud-Clone Corp.
Cloud-Clone Corp. is dedicated to the development and production of high-quality immunoassay reagents and detection solutions. With a focus on antibody engineering, multiplex assay development, and cross-platform compatibility, the company provides research tools designed to support precision medicine and advanced biomedical investigation globally. Our core products and services include the research and development of proteins, antibodies, ELISA kits, primary cells, and multiplex cytokine assay kits, as well as professional CRO services to fully meet the diverse needs of biomedical research and related fields.
For more information about Cloud-Clone Corp, visit www.cloud-clone.com.

CLOUD-CLONE CORP.(CCC)
Tel: 001-832-538-0970, 0086-27-8425-9552
Email: mail@cloud-clone.com, sales@cloud-clone.us

Visit us on social media:
LinkedIn: https://www.linkedin.com/company/cloud-clone-corp/
Instagram: https://www.instagram.com/cloudclonecorp2023/
TickTok: https://www.tiktok.com/@cloudclonecorp2026

SuKi Duan
CLOUD-CLONE CORP.WUHAN
email us here
Visit us on social media:
LinkedIn
Instagram
TikTok
X