Resource Summary Report

Generated by NIF on Apr 26, 2025

Cleveland Clinic Genomic Medicine Biorepository

RRID:SCR 004136

Type: Tool

Proper Citation

Cleveland Clinic Genomic Medicine Biorepository (RRID:SCR_004136)

Resource Information

URL: http://www.lerner.ccf.org/gmi/gmb/

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Description: A biorepository is a place where investigators can deposit and store biological material, in this case samples derived from patients. Moreover, the Genomic Medicine Institute (GMI) takes this basic concept and elevates it to make the Genomic Medicine Biorepository (GMB) a full-service processing and banking laboratory that serves as the foundation for evidence-based research for the GMI, the Cleveland Clinic, and our collaborators. The process relies on a team of multi-disciplinary professionals coordinating their efforts in order to streamline medical research. This begins with dedicated physicians and genetic counselors identifying individuals with specific medical conditions indicating the possibility of genetic involvement. Once identified, biological material (e.g. blood, tissue, or saliva) is collected under the care of the patient"s doctor or by our clinicians and sent to the GMB. Once in the lab, the patient and their samples are assigned a unique identifier (to protect the patient"s personal information) and logged into a central database. This unique identifier accompanies all samples processed and banked for that individual. The specimens are then processed into research-relevant samples using proven laboratory techniques and state-of-the-art quality control practices. These samples include the isolation of DNA and RNA from white blood cells for genetic studies; collection of plasma for proteomic studies; and initiated immortalized cell lines from lymphocytes for in-vitro studies and biochemical research. These cell lines are able to be indefinitely stored in cryogenic suspension and are invaluable as a renewable resource for genetic and biochemical research. The GMB also processes genetic material from various tissues (both fresh and archived). Charis Eng. MD, PhD, Chair and Director of the GMI, has been the faculty oversight person of a human biorepository for the last eight years. Since then, our biorepository has received, cataloged, processed, and banked, in excess of 25,000 specimens. These samples are of numerous tissue types from patients and their family members located all over the world. Our biorepository has managed samples that have resulted in more than 150 original peer

reviewed articles and greater than \$25 million total direct costs in extramural funding over the last four years alone.

Abbreviations: GMB

Synonyms: Cleveland Clinic Genomic Medicine Institute Biorepository, GMI Biorepository, Genomic Medicine Biorepository, Genomic Medicine Institute Biorepository, Cleveland Clinic GMI Biorepository

Resource Type: biomaterial supply resource, material resource, tissue bank

Keywords: blood, tissue, saliva, dna, rna, plasma, cell line, cryogenic suspension, patient,

family member, research

Related Condition: Patient, Family member

Funding:

Availability: Private and Collaborators: Serves the Genomic Medicine Institute, The Cleveland Clinic, And our collaborators.

Resource Name: Cleveland Clinic Genomic Medicine Biorepository

Resource ID: SCR_004136

Alternate IDs: nlx_59927

Record Creation Time: 20220129T080222+0000

Record Last Update: 20250426T055702+0000

Ratings and Alerts

No rating or validation information has been found for Cleveland Clinic Genomic Medicine Biorepository.

No alerts have been found for Cleveland Clinic Genomic Medicine Biorepository.

Data and Source Information

Source: SciCrunch Registry

Usage and Citation Metrics

We found 1 mentions in open access literature.

Listed below are recent publications. The full list is available at NIF.

Brewer T, et al. (2022) Exome sequencing reveals a distinct somatic genomic landscape in breast cancer from women with germline PTEN variants. American journal of human genetics, 109(8), 1520.