How one blood sample will help protect, save and improve lives.

**Collection**

Blood samples are collected from healthy volunteers, people with heart disease, diabetes and those with risk factors.

**Processing and Storage**

Samples are separated into parts including plasma, serum, blood cells and DNA and stored in dedicated -80 degree freezers ready for use by the scientists.

**Research**

Baker IDI scientists study the relevant genes and biomarkers to better understand the causes of heart disease and diabetes.

**Treatment & Prevention**

Research outcomes will enhance and accelerate the discovery and development of new treatments and preventative measures for heart disease and diabetes.

**How will your donation help?**

Your donation to the Biobank will allow our scientists to better understand the causes of life threatening diseases and help them to make discoveries that will improve and save lives in Australia and beyond.

**How can your blood sample help?**

- recruit 10,000 blood samples (collecting just one sample alone costs $99)
- acquire important, critical equipment such as a centrifuge ($14,000) for processing of samples and minus -80 degree freezers ($20,000) dedicated to long term storage
- be better equipped to efficiently control and track samples
- provide a critical service to our scientists and our research partners
- facilitate pioneering medical research that will benefit our families and society as a whole for generations to come

While the people to benefit most will be our children and their children, many of us may see our own lives touched by the research the Biobank will enable.

**What can you do?**

Donate today. Guarantee research progress. Find the answers. Save and improve lives.

To make a donation today please complete the enclosed form or contact us on 1800 827 040 or at fundraising@bakeridi.edu.au.

**The Baker IDI Biobank**

Help us make discoveries to protect, save and improve lives.
Why blood samples from the Biobank are so important to research at Baker IDI?

The Biobank is a unique collection of blood samples and clinical information from almost 6,000 participants and is one of the most comprehensive cardiovascular disease databases in Australia. The Biobank facilitates biomarker and genetic research by maintaining a collection of well-characterised blood samples.

Understanding why HDL-cholesterol can reduce heart disease risk

With Biobank samples, PhD Candidate Jasmine Lyome and her colleagues are investigating the link between the blood markers of chronic disease and the risk of developing heart disease. By separating blood into its component parts, our researchers can look at molecules in this area of research. By separating blood into its component parts, our researchers can look at molecules involved in heart disease risk.

Why the Biobank needs your support?

With the prevalence of diabetes and pre-diabetes in Australia rising at an alarming rate, our scientists are more than ever in need to advance groundbreaking research that will specifically target diabetes prevention, treatment and management.

We need your help to grow a comprehensive diabetes blood sample collection that will allow more research into this insidious disease plaguing millions of people in Australia and beyond.

Identifying the mechanisms for development of type 2 diabetes

Dr Peter Meikle, Head of Metabolomics is using samples to identify markers in the blood that will enable his team to identify who is at greatest risk of developing unstable coronary artery disease – which is the leading cause of heart attack and stroke. Identifying whose conditions is most likely to deteriorate will enable more vigorous preventative interventions.

Reducing the burden of disease in diabetes patients

Dr George Soldatos has measured a range of biomarkers in serum and urine of diabetic patients. Georgia found that these markers would help to identify patients at high risk of developing diabetes associated blood vessel and heart disease. Identifying these patients at risk, allows us to initiate earlier and more aggressive treatment to prevent the onset and progression of diabetic complications, ultimately improving the quality of lives of those with diabetes.

What is the Biobank?

The Biobank is a vital resource for scientists investigating the genetic link and biomarkers of disease - why some people are more at risk of disease than others. Why certain people develop disease and others are less likely to do so.

The Biobank is a unique collection of blood samples and clinical information from almost 6,000 participants and is one of the most comprehensive cardiovascular disease databases in Australia. The Biobank facilitates biomarker and genetic research by maintaining a collection of well-characterised blood samples.

What types of samples does the Biobank collect?

The Biobank comprises of two dedicated freezer storage sites – which house more than 200,000 individual tubes – as well as a small laboratory and a comprehensive health database.

Why test genes and DNA?

The Biobank enables our researchers to study the human genes and biomarkers related to diabetes and heart disease.

Genes are made of a chemical commonly called DNA. The DNA in your body is a code that directs and controls our general health, or perhaps the health of our family, now or in the future.

What we now know about the way our bodies work is truly astonishing, but it is not enough – we need to know more about the way our bodies work.

We need to know about how our bodies work.

What does the physical facility comprise of?

The Biobank comprises of two dedicated freezer storage sites – which house more than 200,000 individual tubes – as well as a small laboratory and a comprehensive health database.

A particularly exciting development for the Biobank is the new Biobank facility. The facility is headed by Dr Melissa Barber, whose team collects and processes samples and stores, cataloging and accessibility of these samples is in line with best practice human ethics guidelines.