

Pioneering search for pancreatic cancer 'fingerprint' in simple blood test

April 23 2013

Pioneering research to investigate whether pancreatic cancer can be detected early through a blood test is to be spearheaded by the University of Leicester thanks to new funding provided by Hope Against Cancer.

Professor Jacqui Shaw, of the Department of [Cancer Studies](#) and Molecular Medicine at the University of Leicester, is leading the test for a 'fingerprint' of pancreatic cancer in the bloodstream, together with Prof M Manson, Dr CP Neal (University of Leicester) and Dr LM Martins (MRC) .

Hope Against Cancer has awarded a £75,000 research fellowship to the University of Leicester following a sustained and committed fundraising effort by friends and family of local Leicester Mercury journalist, Nikki Rivers.

Pancreatic cancer is often detected too late for effective treatment. Using funds from the Nikki Rivers Fellowship, researchers at the University of Leicester aim to analyse [blood samples](#) for evidence of mutations, which are present in cancer causing genes in pancreatic cancer.

All cancers carry these [mutations](#) in the [tumour cells](#) and some of these occur at a very early stage before the primary tumour is fully developed. If researchers can successfully identify DNA from these transformed cells in the [bloodstream](#) it could provide a "fingerprint" of what is happening in the larger tissue, in this case the [pancreas](#), and the hope is

that such changes can be detected early enough to allow treatment at a much earlier stage and hopefully to stop the tumour progressing.

Professor Jacqui Shaw of the Department of Cancer Studies and [Molecular Medicine](#) said, "This would not be a cure, but effective diagnosis at an earlier stage would greatly improve the outlook for future patients with pancreatic cancer. It is a bit like a [forensic examination](#) of a [crime scene](#); cancer leaves traces in the blood in the same way that a criminal leaves evidence at a crime scene. We are aiming to develop an effective method of identifying these traces of cancer before the disease has progressed to the later stages when other symptoms become apparent."

Nikki's sister, Tessa Bradon said, "Sadly, my much loved sister Nikki died of pancreatic cancer on 10 January 2011, after coping bravely with much pain & discomfort. She was a beautiful and special person and we were all deeply shocked when she was diagnosed with pancreatic cancer in May 2010, and told there was no hope of recovery. Nikki was in the last weeks of her life when she said to me how much she would have liked to raise funds for cancer research but at that stage she was too ill to do so. I hope she would have felt proud of our efforts. My wish is that we can support research into a method of early diagnosis for pancreatic cancer, so that others will have more chance of successful treatment."

"This is very exciting research and we are delighted that Hope is able to fund aspects of cancer management that could have a real impact on future sufferers. We very much hope to attract matched funding from a national cancer charity to help us develop this new area of research here in Leicester." said Wendi Stevens, Hope Against Cancer Co-ordinator. "Cancer is a devastating disease but by funding this and other research projects we hope to improve the care and treatment available in the Rutland and Leicestershire community."

Provided by University of Leicester

Citation: Pioneering search for pancreatic cancer 'fingerprint' in simple blood test (2013, April 23) retrieved 6 May 2024 from <https://medicalxpress.com/news/2013-04-pancreatic-cancer-fingerprint-simple-blood.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.