



QSkin Genetics Update

What happens next?

New team member

2015 Alan Lopez Award

New research findings:

♦ Medicare gets it right

♦ Burden of skin cancer attributable to UV

Sunbed ban in WA

Welcome to the 10th in our series of **QSkin** newsletters, in which we aim to provide you with an update on the activities and achievements of this colossal project. Much has happened since our previous newsletter, including new PhD students coming on board, research findings being published and prestigious awards bestowed upon members of the team. Importantly, we have almost completed the first phase of the **QSkin Genetics Project**, through which many thousands of you have generously provided a saliva sample for DNA analysis. I hope you find the update informative. And remember, we are always happy to answer your questions or provide more information on our activities. Thank you again for your participation and support.

David Whiteman

Principal Investigator of QSkin

QSkin Genetics Update

As you may recall, the QSkin Study has been funded to gather DNA from study participants, with the aim of finding the genes that increase or decrease a person's risk of developing skin cancers. For this project, DNA will be extracted from saliva samples. We have now invited more than 35,000 QSkin participants to provide a saliva sample and complete a short follow-up survey. As of January 2016, nearly 16,000 samples have been received. Some of you may not yet have received an invitation, but will do so in the coming months. Our last mail-out will occur in April 2016. **Our sincere thanks to all who have taken part already!**

For those of you who have received an invitation but have not yet taken part, or have lost your kit – it is not too late to change your mind! If you would still like to take part, please contact us NOW! Samples must be received by June 30, 2016.



QIMR Berghofer
Medical Research Institute

Locked Bag 2000
Royal Brisbane Hospital
Herston, QLD 4029
Australia
1800 222 600
qskin@qimrberghofer.edu.au

QSkin Genetics - what happens next?



Your saliva sample will be bar-coded and taken to the QIMR Berghofer Core Facility for DNA extraction. Here, robots will scan the bar-code on your saliva sample to make sure they match your records, and then batches of saliva samples will be extracted in groups of 20. At the end of the extraction process, purified DNA samples will be stored, ready for genetic analysis. Because we have more than 16,000 samples to extract, it is going to take a few months to get all the samples ready for genetic analysis. We will keep you posted about our progress.

New Team Member - Dr Jean Claude Dusingize



QSkin is delighted to welcome **Dr Jean Claude Dusingize** to the team. Jean Claude holds a medical degree from Rwanda and a Masters degree in clinical research methods from the Albert Einstein College of Medicine in New York City. In 2014 he won a highly competitive fellowship provided by the Union for International Cancer Control and International Agency for Research on Cancer (IARC), allowing him to spend three months in Lyon, France and gain further research experience. In QSkin, Jean Claude will examine the effects of smoking and hormonal factors on risks of skin cancer. He will also examine the risks of skin cancer among patients with chronic conditions such as autoimmune and chronic inflammatory diseases, other cancers, organ transplant patients, AIDS, as well as diseases related to abnormal photosensitivity responses of the skin. Jean Claude's PhD work is supported by a QIMR Berghofer International Student PhD Scholarship and a University of Queensland International Scholarship.

2015 Alan Lopez Public Health Award

PhD student Chiho Muranushi has recently been awarded the very prestigious **Alan Lopez Public Health Award** from the University of Queensland (UQ) for her PhD project. Chiho is investigating whether commonly prescribed medications (such as statins and cortisone) increase or decrease a person's risk of skin cancer. (The award is named after Professor Alan Lopez, an international authority on the global burden of disease who was formerly head of the UQ School of Population Health). The award is highly competitive and is awarded to the higher degree student who can best demonstrate the ability for critical analysis and independent thinking, boldness in challenging their field of research and a clear capacity for effective research communication. Congratulations Chiho on this fantastic achievement!



New Research Findings

Medicare gets it right - QSkin data demonstrates validity of Medicare data for skin cancer diagnoses

Cancer registries across Australia provide valuable information about the incidence of melanoma and other cancers. However, information about the frequency of other skin cancers (such as basal cell carcinomas and squamous cell carcinomas) is not collected. Mostly, this is because BCCs and SCCs are so common that cancer registries don't have the resources to capture them all (>1 million per year). One way of monitoring the numbers of BCCs and SCCs is to examine information held by Medicare Australia. Each time you visit the doctor, part of the cost is paid by Medicare. There are unique codes for different treatments, including treatment of skin cancers. We therefore used QSkin data to see whether the Medicare records for skin cancer treatments match with the pathology reports, which gives some indication about how reliable Medicare data are. Our findings were very pleasing, confirming that 97% of Medicare claims for the surgical treatment of a basal cell or squamous cell carcinoma were confirmed by a pathologist as a skin cancer. This is a very important finding, as it shows that Medicare data can be used to track the incidence of skin cancer in Australia. The results from this study were published recently in the *Australian and New Zealand Journal of Public Health*.



SOURCE: Thompson BS, Olsen CM, Subramanian P, Neale RE, Whiteman DC, for the QSkin Study. Accuracy of Medicare data to identify treatments for skin cancer in a prospective cohort study of 37 103 participants. *Aust N Z J Public Health* Nov 11, 2015.

Other QSkin Study Publications

Djaja N, Janda M, Olsen CM, Whiteman DC, Chien TW. Estimating Skin Cancer Risk: Evaluating Mobile Computer-Adaptive Testing. *J Med Internet Res*. 2016 Jan 22;19(1):e22.

More information about QSkin study findings can be found on the QSkin website: http://gskin.qimrberghofer.edu.au/page/Results/In_the_news/

WA last State to ban sunbeds



Western Australia has become the last State to implement a ban on commercial tanning beds.

Commercial sunbeds were banned from New Year's Day 2016, one year after bans were enacted in New South Wales, Victoria, South Australia, Tasmania, the ACT and Queensland. There are no commercial solariums operating in the Northern Territory. Australia is one of only two countries in the world where a total ban has been implemented (Brazil outlawed the use of commercial tanning beds in 2009).

The health risks associated with tanning bed use are well established. Exposure to UV radiation (whether from natural or artificial sources) increases your risk of developing skin cancer, eye cancers and other skin and eye damage.

Cancer Council WA director of education and research, Terry Slevin, welcomed the ban.

Burden of skin cancer attributable to solar UV radiation

QSkin investigators played a leading role in a large project commissioned by **Cancer Council Australia** to estimate the number of cancers each year in Australia that are potentially preventable. The project received a lot of publicity in the media.

One of the most important findings emerged from a series of analyses led by

Dr Catherine Olsen to estimate the number of extra skin cancers that would have

occurred in 2010 if people did not use sunscreen regularly. It is known that approximately 30% of Australians use sunscreen every day, but Catherine's team estimated that if they had not applied sunscreen every day, the rates of squamous cell cancers in the Australian population would have been 8% higher in men and 12% higher in women. Similarly, rates of melanoma in Australia would have been 11% higher in men and 17% higher in women.

This work was funded by the Public Health Committee of Cancer Council Australia.



SOURCE: Olsen CM, Wilson LF, Green AC, Bain CJ, Fritschi L, PAF Project, Neale RE, Whiteman DC. Cancers in Australia attributable to exposure to solar ultraviolet radiation and prevented by regular sunscreen use. *Aust N Z J Public Health* 2015 2015 Oct;39(5):471-6.



Have your contact details changed?

Following participants over time is a big part of this landmark study, and it is important we keep your contact details up to date. Help us stay in touch with you. If your **address**, **telephone number** or **email address** has changed recently (or are about to), please let us know by contacting us by phone or email.

Tel: 1800 222 600 **Email:** qskin@qimrberghofer.edu.au

Web: www.qskin.qimrberghofer.edu.au



QIMR Berghofer
Medical Research Institute

QIMR Berghofer Medical Research Institute is a world leading translational research institute. Our research focuses on cancer, infectious diseases, mental health and a range of complex disorders. Working in close collaboration with clinicians and other research institutes, our aim is to improve health by developing new diagnostics, better treatments and prevention strategies. For more information about QIMR Berghofer, visit www.qimrberghofer.edu.au