WHO International Intersun Project

Report on UV activities in Australia during 2017-2018

ARPANSA UV Activities
ARPANSA is an Australian Government agency that contributes to Australian sun protection standards. ARPANSA works with the Cancer Council Australia, SunSmart and other organisations to raise awareness of the dangers of sun exposure. From ARPANSA’s perspective, the ultraviolet radiation (UVR) from sun exposure remains the main focus of the UV protection campaign in Australia.

Public Information
ARPANSA provides information about UVR and sun protection in fact sheets, frequently asked questions, and a buyers’ guide for sun protection (https://www.arpansa.gov.au/our-services/testing-and-calibration/sun-protection-buyers-guide). The buyer’s guide was developed to help consumers find products that claim to offer personal protection against solar UVR. ARPANSA also has a “Talk to a Scientist” program where members of the public can call ARPANSA and speak with a scientist about radiation protection topics (https://www.arpansa.gov.au/contact-us/talk-to-a-scientist).

ARPANSA has been hosting the SunSmart app and widget on its website since February 2016. The app and widget provides real-time UV data for Australian capital cities (https://www.arpansa.gov.au/our-services/monitoring/ultraviolet-radiation-monitoring). Cancer Council Victoria has conducted an evaluation study (which is co-sponsored by ARPANSA) to investigate the performance of the app and widget. The focus of the study is to better understand the impact of UV messaging that assists individuals and families in decision making for sun protection. Results from the study will be published soon.

UVR Network
ARPANSA maintains a UVR monitoring network, which provides real-time information on the levels of solar UVR in eleven selected cities throughout Australia (https://www.arpansa.gov.au/our-services/monitoring/ultraviolet-radiation-monitoring). During 2015-16 this data was integrated into the SunSmart app and widget, providing real-time data for all capital city network locations. ARPANSA’s website provides real-time charts namely the UV index and UVR dose charts, which show the variation of UVR throughout the day.

SunSmart Workplace
In November ARPANSA was recognised as the first SunSmart Commonwealth workplace by Cancer Council Victoria. This shows ARPANSA’s commitment to protecting its staff from overexposure to UV radiation. Other businesses are now inquiring how to become SunSmart workplaces.
**In Vitro Sunscreen Testing**

To address the accuracy and ethical concerns of sunscreen SPF rating, ARPANSA is working to develop a robust repeatable in vitro laboratory testing method. This will reduce the need to expose people to UVR to determine the SPF factor of sunscreens. The aim is for this new method to become an Australian and international standard.

**UVR Services**

ARPANSA provides a suite of UVR services such as the UV protection factor (UPF) testing on fabric, sunglasses, and film, as well as assessment of UVR hazards in the workplace and calibration of instruments ([https://www.arpansa.gov.au/our-services/testing-and-calibration/ultraviolet-radiation-testing](https://www.arpansa.gov.au/our-services/testing-and-calibration/ultraviolet-radiation-testing)). In 2017-2018, over 2200 samples of sun protective materials were tested and over three and a half million labels for sun protective products (called swing tags) were issued. These labels enable consumers to see at a glance the UPF of the products they are considering to purchase.

**Hazard Assessment**

ARPANSA provides a service to evaluate solar and artificial UVR hazards in workplaces and public environments against the exposure limits from the Australian Standard. ARPANSA can also perform exposure studies so employers can determine the risks to their employees from UVR exposure and implement recommendations for controlling the risk, if necessary.

**Research – UVR and Health**


**Incidence of melanoma in commercial pilots in Australia**

ARPANSA is involved in a study lead by QIMR Berghofer Medical Research Institute investigating the incidence of melanoma in commercial pilots in Australia. The first results of this study will be announced at the Australasian Society of Aerospace Medicine Conference in August 2018.

**Policies, Legislation and Standards**

**Shade Cloth Standard**

ARPANSA is contributing to the ongoing work of Standards Australia in writing and updating UVR-related standards. The revised shade cloth standard [AS 4174:2018 “Knitted and woven shade fabrics”](http://www.arpansa.gov.au/our-services/testing-and-calibration/ultraviolet-radiation-testing) has recently been published. The standard includes a rating system for shade cloth that is easy to understand. Currently no other countries have standards that cover the scope of this revised Australian Standard.

**Conferences and Meetings**

**UV Working Group**

A group established in 2009 (used to be called “UV Alert Group”) that consists of representatives from 14 organisations including national, state and local bodies in Australia and New Zealand. The group serves as a forum to discuss the health impacts and associated public messaging relating to solar UVR. The group generally meets three times a year.
NIWA UV workshop
ARPANSA staff attended and presented at the National Institute of Water and Atmospheric Research (NIWA) UV Radiation Workshop in Wellington, April 2018. The presentations were on UV monitoring programs and recent changes in UV related Standards.