**NSW Cancer, Lifestyle and Evaluation of Risk (CLEAR) study**

Cancer Council of NSW

# Background

The NSW CLEAR Study is a large scale epidemiological data and bio-bank for all adult cancers. It is an open resource available researchers for investigating: i) local cancer aetiology in relation to diverse lifestyle and genetic heterogeneity; ii) the evolution of potential cancer hazards over time in communities where the background effect of these is largely unexplored; iii) new emerging risk factors on the local cancer profile; iv) genetic factors predisposing for higher risk of cancer (known and newly discovered); v) cancer causing viral or bacterial organisms (known and newly discovered); vi) lifestyle, genetic and other factors associated with cancer survival.

CLEAR is based on a case-control study design. ‘Cases’ are men and women, 18 years of age or older, residing in NSW, who have been diagnosed with a primary cancer within eighteen months of enrolment. Eligible ‘controls’ are partners of the cases, with no cancer history. The Study invites participants to complete a lifestyle questionnaire and contribute a blood sample for future testing. Blood samples are separated into serum, plasma and buffy-coat aliquots.

Recruitment started in 2006 and is expected to continue until 2017. At present the CLEAR resource consists of over 7,000 participants’ lifestyle questionnaires and 5,000 blood samples (over 100,000 aliquots). It is anticipated that applications for use of data and bloods will be accepted from mid-2013.

Participants are asked to consent to record linkage to publically available health related databases (NSW Central Cancer Registry, Admitted Patient Data Collection, Australian Bureau of Statistics, Registry of Births, Deaths and Marriages, NSW Hereditary Cancer Registry) as well as the 45 and Up Study and dental records. Linkage to these databases broadens the scope of information available to researchers using the CLEAR collection. Additionally, results from laboratory and data analyses will be fed back into the data/bio-bank leading to a continuously increasing library of information available to future researchers.

# Information recorded on the study database includes:

* *Sociodemographic variables* including age, sex, income, education, profession, ethnicity, residence history, socioeconomic status, marital status, BMI
* *Lifestyle variables* including smoking, alcohol, exercise, breastfeeding, hormonal contraceptives, hormone replacement therapy, sun exposure, solarium use, body piercing/tattoo, sexual behaviour, sleep, use of talcum powder and anabolic steroids.
* *Health history* including reproductive history, medical conditions, past operations, medication for treatment/prevention of osteoporosis, vaccination (against HPV), cancer screening history (breast, skin, cervix, bowel), dental health
* *Diet related variables* including frequency of intake (meat, fish, fruit, vegetables), food preferences, food allergies
* *Work related variables* including work status, shift work, type of work, hours of work

# Previous linkage projects conducted through CHeReL include:

Participant eligibility confirmation and descriptive statistics for the NSW CLEAR dataset, 2011. Principal researcher: A/Prof Karen Canfell, NSW Cancer Council.

# Availability of data for studies:

The numbers of participants recruited into the study, by cancer type, are available upon request. Unit record data from the CLEAR study may be available to researchers from 2013. For further information please contact Michael Revius, the CLEAR Project Co-ordinator on (02)9334 1930 or A/Prof Freddy Sitas, Principal Investigator and Data Custodian, on (02) 9334 1837, or CHeReL staff on cherel@cancerinstitute.org.au. A list of variables available for data linkage projects can also be accessed on the CHeReL website at: <http://www.cherel.org.au/external-datasets>

# Data contact

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