

Strengthening Global Cancer Research and Control

Chairpersons: G Andall-Brereton, D Martin

CARPHA – National Cancer Institute Grantee 1: Gatekeepers' perceptions of the quality and availability of services for breast and cervical cancer patients in the English-speaking Windward Islands: An exploratory investigation

*K Thomas-Purcell, W Tarver, C Richards, M Primus-Joseph
Nova Southeastern University, Ft Lauderdale, FL, USA
Email: kthomaspurcell@nova.edu*

Objective: Although extensive screening services for breast and cervical cancers are available in the Caribbean, these cancers continue to be the leading causes of cancer death among women in this region. The purpose of this study was to determine the quality and availability of breast and cervical cancer treatment care and support services from the perspective of the gatekeepers who provide care for the patients in the Windward Islands of Dominica, Grenada, St Lucia and St Vincent and the Grenadines.

Methods: A qualitative research design using semi-structured, in-depth interviews was used to gather data from gatekeepers who provided oncology prevention and care services to patients for at least one year. Data were collected on availability and quality of cancer care and treatment services and coded using the themes obtained *via* thematic analysis of the data.

Results: Twenty-three current providers participated in the study (Dominica, 5; Grenada, 7; St Lucia, 5; St Vincent and the Grenadines, 6). The participants' years of work experience ranged from 2 to 45 years. The codes encompassed a range of social ecological factors that influence breast and cervical cancer screening and treatment in the Windward Islands. The emergent themes were: socio-economic status, availability of resources and social support.

Conclusion: The findings emphasized the varying social determinants of health that affected breast and cervical cancer prevention and treatment. It also highlighted the disparities in availability of treatment within the wider Caribbean. It is necessary to broaden the perspective on health from a biomedical paradigm to include a social perspective.

CARPHA – National Cancer Institute Grantee 2: Cardiometabolic health in prostate cancer survivors and their controls: Results of the PROSCARE Follow- up Study

*M Tulloch-Reid, W Aiken, T Ferguson, N Bennett, L Harrison, A Badaloo, D McGrowder, A Grindley, E Walker, M Jackson
The University of the West Indies, Kingston, Jamaica
Email: marshall.tullochreid@uwimona.edu.jm*

Objective: Cardiovascular disease and prostate cancer (PCa) are leading causes of death in Jamaican men. Androgen deprivation therapy (ADT) used in PCa treatment could result in the metabolic syndrome (MetS) and increase the risk of cardiovascular disease. We determined the prevalence of MetS and its components among PROSCARE survivors and investigated the effect of ADT use on these abnormalities.

Methods: Cardiometabolic health was evaluated 11 years after initial enrolment in the PROSCARE study, 2005–2007. Assessment included fasting glucose and lipids, waist circumference and blood pressure. Metabolic syndrome was defined using the American Heart Association/National Heart Lung and Blood Institute (AHA/NHLBI) criteria and comparisons made between PCa survivors and PCa-free controls.

Results: Data from 128 PROSCARE participants [54 cases (including 8 incident PCa cases) and 74 controls] were used. Over half of the PCa cases (55%) had received ADT. While persons without PCa had a higher waist circumference there were no significant differences in the other cardiometabolic risk factors examined. Approximately 16% of participants had MetS. There were no significant differences in prevalence of MetS (5% PCA ± ADT-, 17%-PCA+/ADT+, 19% PCA-/ADT-; $p = 0.22$) or its components by PCa status. Among PCa survivors, ADT was not associated with an increased risk of MetS even after adjusting for age, education and cigarette smoking (OR: 5.4, 95% CI: 0.52, 55.3).

Conclusion: Androgen deprivation therapy use was not associated with MetS or its components among PROSCARE survivors. Larger studies may be required to better explore this relationship.

**CARPHA – National Cancer Institute Grantee 3:
Pre-diagnostic body size in relation to overall and prostate-specific mortality in Jamaican men**

M Jackson, A McCaw-Binns, M Tulloch-Reid, W Aiken, T Ferguson, N Bennett, L Harrison, A Badaloo, D McGrowder, A Grindley, E Walker, S Anderson
The University of the West Indies, Kingston, Jamaica
Email: maria.jackson@uwimona.edu.jm

Objective: General and central adiposity are associated with an increased risk of developing prostate cancer, but the role of these exposures on prostate cancer (PCa) survival among men of African ancestry has been less studied. This study aimed to investigate whether pre-diagnostic anthropometric characteristics were associated with overall and prostate cancer-specific mortality in a hospital-based cohort of men with prostate cancer and compare these with cancer-free controls.

Methods: In a case-control follow-up study of 517 men (baseline: cases, 242, controls, 275), we examined associations of pre-diagnostic body mass index (BMI), waist circumference and waist-to-hip ratio with risk of all-cause and prostate cancer-specific cancer. Multi-variable Cox proportional hazard models were used to calculate hazard ratios (HRs) and 95% confidence intervals (CIs).

Results: Over a mean follow-up of 10.9 years 215 deaths occurred of which 57 (26.5%) were due to PCa (including 12 new-onset PCa among controls). In a multi-variable analysis, pre-diagnostic overweight (BMI 25.0–29.9 kg/m²) but not obese men diagnosed with prostate cancer showed an increased risk of all-cause mortality (overweight: HR, 1.63; 95% CI: 1.10, 2.41; obese: HR, 0.76; 95% CI: 0.41, 1.41). Men with BMI \geq 25.0 kg/m² showed positive but non-significant association with prostate cancer as a cause of death. Abdominal obesity was not associated with all-cause mortality or prostate cancer-specific death.

Conclusion: We were unable to establish a relationship between anthropometric characteristics and prostate cancer mortality but showed that pre-diagnostic overweight in men diagnosed with PCa was associated with lower overall survival. Large prospective studies are needed to confirm these findings.

**CARPHA – National Cancer Institute Grantee 4:
Exploring the use of text messages for weight loss and healthy habit formation in St Lucia**

E Serieux
University of Georgia
Email: eveserieux@gmail.com

Objective: The objectives were to determine whether clinically significant weight-loss would occur over 10 weeks and be maintained over 20 and 30 weeks; measure whether there were any significant differences in weight loss among the experimental, comparison and control groups; determine whether the intervention led to increased automaticity of healthy dietary and exercise behaviours; and identify participant perceptions (both negative and positive) about the intervention.

Methods: The study was implemented in two distinct phases and used both quantitative and qualitative research methodology. Phase I was a quantitative study and Phase II was qualitative post intervention focus group interviews. A three arm (experimental, comparison and control/waitlist group) quasi-experimental design, with baseline and follow-up measurements at 10, 20 and 30 was used to measure both within group and between group differences. Three hundred participants were recruited in St Lucia and 100 assigned to each condition. Focus groups were used to assess participant perceptions of the different conditions.

Results: *P*-values, *t*-values and lower as well as upper limits for 95% confidence intervals (alpha 0.05) were used to determine significant differences. Cohen's *d* was used to provide a measure of practical significance. Phenomenology was used to assess participant experiences and perspectives and thematic analysis using NVIVO to identify commonalities.

Conclusion: Of all the conditions, text messages were the most acceptable and potentially effective tool to promote weight loss and healthy habit formation. However, frequency of delivery is a crucial aspect for consideration.