

# INTELLECTUAL RESOURCES

CANSA's intellectual resources comprise our organisational, knowledge-based intangibles, including:

- intellectual property, such as patents, copyrights, software, rights and licences
- 'organisational capital' such as tacit knowledge, systems, procedures and protocols
- our cancer research.



## RESEARCH

CANSA's core research focus is on reducing risk, early detection and diagnosis, and optimising patient care and support, including palliation. CANSA uses evidence-based research to inform our advocacy work, our health education programmes, and our service to those living with cancer and members of the public. Funds were used across only four research programmes categorised Type A, B and C.

### CANSA RESEARCH GOALS

#### TO CONTRIBUTE TO ADDRESSING THE CANCER BURDEN IN SOUTH AFRICA

- Through funding high-quality, relevant (to South Africa/low- and middle-income countries), high-impact research focused on:
  - reducing risk and exposure to risk
  - early detection
  - meeting the needs of cancer patients
- [Across our research programmes A, B, C]

#### TO INFORM CANSA'S OFFERINGS (SERVICE, EDUCATION OF THE PUBLIC AND ADVOCACY EFFORTS)

- Through conducting and funding research that informs how we can better communicate risk to the public via our health campaigns
- Through conducting and funding research that optimises service delivery for cancer patients and those affected by cancer
- Through conducting research that strengthens advocacy efforts
- [Across our research programmes A, B, C]

## **TO STIMULATE INTEREST IN AND GROW FUNDING FOR CANCER RESEARCH IN SOUTH AFRICA**

- Through attracting overseas funding for South African cancer research
- Through funding projects that enable researchers to then leverage larger, international grants
- Through developing a platform for South African participation in international research consortiums
- [Primarily Type A]

## **HOW CANSA CREATES VALUE THROUGH RESEARCH**

### **INPUTS WHICH ENABLE CANSA TO IMPLEMENT RESEARCH INITIATIVES**

- Research-related expertise within CANSA's research department
- CANSA's funding for research
- CANSA's research track record and credibility
- Collaborative partnerships
- Established and growing research networks

### **IMPLEMENTATION OF RESEARCH INITIATIVES**

- Type A – by research grant holders funded for their projects by CANSA and who independently conduct studies and report progress and results. CANSA's research committee and department provide oversight on the progress of these reports. Researchers are also required to acknowledge CANSA in their published work.
- Type B and C – through partnerships and collaborative work, students who choose projects from a list of topics shared by CANSA with academic institutes, finding areas of mutual interest with researchers by way of discussion and networking and aligned to cancer control priorities in South Africa.

### **OUTPUTS FROM RESEARCH INITIATIVES**

- Advanced degrees and research capacity building in South Africa
- Dissemination of information through conference presentations and journal publications
- Use of data from studies to inform advocacy activities and engage with the National Department of Health on legislation and cancer policy
- Use of data to inform health-promotion activities, including health awareness campaigns, and the development and potential testing of material developed for health promotion and CANSA campaigns

## **THE SHORT-, MEDIUM- AND LONG-TERM OUTCOMES OF RESEARCH INITIATIVES**

### **SHORT-TERM**

- Collaboration, partnership, awareness and prioritisation of key cancer-control issues in South Africa

### **MEDIUM-TERM**

- Building trust and credibility
- Sharing and enabling research expertise multi-directionally
- Raising awareness and education on cancer and cancer research

### **LONG-TERM**

- Building cancer research capacity in South Africa
- Building credibility and a track record for CANSA's research department and researchers involved
- Using data to help inform cancer policy
- Advocating for legislation
- Improving knowledge, attitudes and practices related to cancer control among the South African public
- Using data to inform CANSA offerings

## **EXTERNAL INFLUENCES AFFECTING CANSA'S RESEARCH INITIATIVES**

- Funding
- Cancer-control priorities in South Africa
- Opportunities for collaboration with academic institutions in areas of mutual interest as per our research goals
- Researchers' interest and initiative
- Affiliations and relationships of CANSA research staff with academic institutions and researchers
- Adequate staffing in the CANSA research department

## **RELATIONSHIPS PARAMOUNT TO ENABLE THE CONTINUED VALUE CREATION OF CANSA'S RESEARCH INITIATIVES**

- Members of our research committee
- Local and international academic institutions and researchers
- National Department of Health
- Potential funders
- Other local and international cancer associations

## **RESOURCES REQUIRED TO ENABLE CANSA'S RESEARCH INITIATIVES**

- Financial resources (funding)
- Research capabilities
- Collaborative partnerships

## **OBTAINING RESOURCES**

- Financial resources (funding) – bequests, fundraising, grant applications
- Human resources – research committee members, attracting appropriate talent to CANSA's research department, finding appropriate academic partners
- Social and relationship resources (collaborative partnerships) – relationship building through commitment to and engagement on research work

## **RESOURCE USAGE**

- Research grant funding covers the costs of the research project or, in some cases, partly funds the costs of the research project,
- CANSA's research team and committee members are engaged at all levels of our research strategy, grant administration, peer review of grant applications, and progress reports. Our research team is also involved in co-supervision of projects, conceptualisation of projects, implementation, analysis and write up, with the level of involvement varying per project or research type.
- CANSA helps engage with technical experts and creates potential for further funding.

## **HOW CANSA'S RESEARCH INITIATIVES CREATE VALUE FOR THE ORGANISATION AND ITS STAKEHOLDERS**

CANSA's research is fundamental to our strategic purpose - "To lead the fight against cancer in South Africa" - and mission - "... to enable research...".

Our research initiatives build credibility for the organisation and positively add to CANSA's reputation in our commitment to health promotion and risk reduction, early detection, education and support. Furthermore, CANSA's research initiatives help to strengthen and inform our service offerings and build partnerships for a stronger collective effort in advocating for cancer control.

## ESTABLISHING PRIORITIES AND INVESTMENTS FOR RESEARCH RESOURCES

During the year, CANSA revised its current research strategy for implementation in the 2020/21 year. We believe we can play a better role in formulating health policy to control cancer in South Africa through scientific, evidence-based information. We launched a consultative process to establish the priorities and best investments for our research resources. This is intended to reposition CANSA's research programme to target the challenges of cancer risk reduction, early detection and survivorship in South Africa. Below are the outcomes:

The methodology selected for the consultation process was a combination of quantitative and qualitative approaches, divided into phases one and two. Phase one included a survey, while phase two will include smaller group consultation meetings.

A decision was made to align with the National Department of Health (NDoH) regarding the cancers to be prioritised in South Africa, as laid out in the National Cancer Strategic Framework for South Africa 2017-2022 (NSFSA). As such, cervical, breast, prostate, lung and colorectal cancers were selected for focus in the revised research strategy. These five cancers reflect the highest incidence cancers in South Africa according to the most recent report available at that time from the National Cancer Registry (2014) and, based on this data, collectively account for 37% of the national cancer burden. In line with the NSFSA, cancers of childhood, adolescence and young adulthood were also included.

Through an iterative process and consultation both internally within CANSA and with our research committee members, a final database consisting of 137 participants representing funders of cancer research, clinicians, policymakers and civil society organisations were invited to participate in the survey.

Analysis of the results and reporting will be shared with the research committee in the current financial year for further action on the way forward.

## TYPE A RESEARCH

The Type A funding programme accounts for the majority of CANSA's annual expenditure on funding cancer-related research. Up until April 2019, approximately R6 million was allocated to these projects annually. Historically, CANSA has funded projects at South African universities and research institutions up to the value of R1.2 million over three years, with between 15 and 25 projects being funded at a time.

Final decisions regarding projects to be funded were made by CANSA's research committee, facilitated by external peer reviews, and with consideration of strategic focus areas and funds available. The funding arrangement with each university or institution required them to provide 25% of this funding should a project be selected for funding through the review process as described above.

Projects were funded across a diverse spectrum of areas, targeting risk reduction, management and improved outcomes for the most common cancers in South Africa, including breast, cervical, prostate, colorectal and lung cancers. Types of research funded included research across the basic and clinical sciences and within the public health arena.

After a decision was made in 2016 to increase the focus of funding on public health-related research, the funding call included a focus towards research in this field – an attempt to encourage applications from public health researchers.

In April 2019, CANSA's Board, approved the decision to review and revise the funding of external research projects through the Type A funding mechanism, thus withdrawing the funding call due to close 31 May 2019. This decision was driven by financial reasons, specifically limited growth in CANSA's research programme investments, as well as a perceived need to better align CANSA's research objectives and goals with critical cancer-control needs in South Africa, in light of the increasing burden of non-communicable diseases in South Africa, and the health system and other challenges which have prevented this from being optimally addressed.

As such, CANSA embarked on a consultative process to establish the priorities and best investments of its research resources. This revision of strategy is intended to reposition CANSA's research programme to better target the challenges of risk reduction, early detection and survivorship in South Africa to be more impactful.

Our Type A research focuses mainly on early detection and cancer risk reduction. Projects of up to a maximum of R300 000 per annum each were funded. The maximum annual amount granted for funding was R400 000 per applicant. CANSA funded 75% of grants only. Applicants' relevant institutions augmented the remaining 25% for a period of three years.

We continued to support 26 research projects at universities, granted bursaries to post-graduate students, and helped fund research initiatives. Projects are funded in the following areas of study:

- Epidemiology and determinants of the burden of cancer in South African populations
- Health seeking behaviours and early detection and diagnosis of cancer
- Health promotion and risk reduction of cancer, with a particular focus on behavioural risk reduction
- Optimal patient care, including rehabilitation and palliative care services
- Other health services and health system research relating to the above categories
- Health economics of cancer, including the economic burden of cancer and its risk factors, and cost-effectiveness research
- Research relating to cancer biology/biochemistry/molecular biology as these relate to early detection, risk reduction and patient care

See [www.cansa.org.za](http://www.cansa.org.za) for a detailed summary of projects currently funded

### HOW CANSA DETERMINES PROJECT GRANTS

The rules and regulations governing the award of CANSA research grants is documented and is the guidance that grantees are required to follow should they be awarded a CANSA research grant in the Type A programme. Factors mainly used for determining grants include significance, relevance, innovation, approach, researcher, Institution/environment and feasibility.

#### Determining grants – Type A programme:



### PUBLICATION AWARDS

CANSA rewards researchers who publish their work in accredited journals with an amount based on the impact factor of the journal and the order of authorship. In the year under review, CANSA awarded R146 000 to seven researchers at three universities for 19 publications. Awarded to the following Professors: Ans Baeyens, Sinead Delany-Moretlwe, Maritha Kotze, Anna Kramvis, Ann Louw, Nyabadza Farai and Georgia Schäfer Georgia

### GRADUATES ARISING FROM CANSA GRANTED PROJECTS

CANSA acknowledges the importance of building the capacity of a new generation of cancer researchers to further develop much-needed advances in cancer research in South Africa. Where appropriate, Type A grants permit students to work under the supervision of the principal investigator and grant holder to obtain a postgraduate qualification. A total of seven researchers completed their CANSA research grants. Emanating from these projects were the following 13 degrees awarded to students:

MSc – 8

BSc honours - 1

PhD – 3

MPH – 1

Students are from Universities of Pretoria and Cape Town

## TYPE B RESEARCH: REDUCING RISK

This is research conceptualised and conducted by CANSA, sometimes in collaboration with other institutions. Projects are typically smaller and focused on reducing public exposure to environmental cancer risks.

### OUR TYPE B RESEARCH FOR THE REPORTING PERIOD

	Topic	Partner/s	Description
1	Knowledge, attitudes and practices regarding skin cancer in people with deeply pigmented skin: testing of CANSA information, education and communication materials	SAMRC, University of Stellenbosch	<p>A quantitative study was undertaken in which fieldwork was conducted by Nielsen, the results of which have been published in two papers and used to inform the qualitative component of the study where we will also test our materials titled 'Informing and developing a skin cancer prevention campaign for Black Africans in South Africa'.</p> <p>This component is still to be conducted.</p>
2	Cancer-related lifestyle risk, knowledge, risk perception, and intention to screen in a socio-economically diverse urban population in South Africa	Wits School of Public Health – Master's in Public Health student	The CANSA Lifestyle Risk Assessment Tool was developed to assess modifiable risk factors for cancer, such as obesity, diet, physical activity, sexual and sun-related behaviours. This project will test the tool among other cancer perception parameters.
3	Knowledge, attitudes and practices of traditional healers, primary healthcare service providers and men in rural Vhembe District, Limpopo Province, South Africa	University of Pretoria, University of Venda	<p>South African Black men present with higher-grade and more advanced disease compared to other groups. Several findings from various undertakings of the South African Prostate Cancer Study show that men living in rural areas of South Africa are at a 1.6-fold greater risk of presenting with lethal prostate cancer than men from urban areas, the risk for lethal prostate cancer is significantly increased within the Vhembe district of Limpopo, and prostate specific antigen (PSA) screening will greatly alleviate the burden of prostate cancer in South Africa.</p> <p>Given the importance of knowledge and awareness of prostate cancer in screening and early detection, it is imperative to understand the knowledge, attitudes and practices regarding prostate cancer in this at-risk group (men in Vhembe) and that of service providers they may consult with (traditional healers and health workers). Also, given the extremely rural and remote setting, the findings of the study could inform an intervention to improve prostate cancer awareness and early detection in a highly-targeted and culturally-relevant way that could potentially become an applicable methodology in other rural settings.</p>

## TYPE C RESEARCH: ENHANCING SERVICE DELIVERY

This is research conceptualised and conducted by CANSA, sometimes in collaboration with other institutions. Projects are focused on optimising services to cancer patients and addressing their needs.

### OUR TYPE C RESEARCH FOR THE REPORTING PERIOD INCLUDED

Topic	Partner/s		
1	An explorative study of mental health outcomes of cancer survivors staying at CANSA Care Homes	University of Cape Town's Knowledge Co-op – Master's in Sociology student	Mental health outcomes, including psychological and emotional effects of living with cancer through treatment and survivorship, are often only considered secondary to the direct treatment of cancer, while they have a significant impact on psychosocial health and quality of life. Findings from this study could help support and inform protocols in CANSA Care Homes for people living with cancer.
2	Ironman (International Registry for Men with Advanced Prostate Cancer)		Funded by the Movember Foundation, CANSA is co-ordinating South Africa's participation in a global observational study on advanced prostate cancer (overseen by the Prostate Cancer Clinical Trials Consortium) aimed at determining the best way to manage advanced prostate cancer. Medical history, treatment information, blood samples, and patient-reported outcomes are collected from all participants to investigate which treatment and care practices deliver the best outcomes. The study aims to recruit 5 000 men globally, 450 of whom will come from South Africa, recruited from four different clinical sites working closely with CANSA. We're excited to be involved with assisting and addressing South Africa's highest incidence cancer in men. Ethical approval has been obtained at all sites and contractual agreements signed at two to date. University of Cape Town is the lead site and activation is expected in early 2021.

### AN EXPLORATIVE STUDY OF MENTAL HEALTH OUTCOMES OF CANCER SURVIVORS STAYING AT CANSA CARE HOMES

This study seeks to describe the mental health outcomes of people living with cancer who are being supported through their treatment by CANSA at Care Homes. The research hopes to also describe the needs of people living with cancer at CANSA Care Homes. This qualitative study will utilise in-depth individual interviews with people staying at CANSA Care Homes in Cape Town, Western Cape.

## THE CANSA SEAL OF RECOGNITION

CANSA created the CANSA Seal of Recognition (CANSA Smart Choice and CANSA SunSmart Choice Seal) to guide and encourage consumers to read product labels and to assist them in making informed choices, with the aim of promoting smart, healthy and balanced lifestyles. The Seal also helps consumers identify products free of toxins, carcinogenic, mutagenic and reprotoxic substances. Eligibility of the Seal is determined by CANSA standards and requirements in various categories based on local and international peer reviewed research.

The Seal is also strategically applied to assist in cleaning-up consumer product categories containing undesirable substances by awarding the Seal to select non-offensive products in the same category and actively promoting it as such, encouraging competitors to follow suit when their market share starts to drop. For example, various cling-wrap brands available on retail shelves are now all PVC-free, with Sylko being the last 'odd one out' and eventually following suit to stop producing PVC cling wrap.

We constantly strive to apply our resources for maximum impact on the broader public by focusing on product categories consumed in mass.

The CANSA Seal is awarded to consumer products that address cancer risk factors, thereby assisting in reducing consumers' cancer risk and are categorised as follows:

- Food – obesity and poor diet are two major risk factors that contribute to the development of cancer. Because of this, the CANSA Seal is awarded to edible consumer products that fulfil certain nutritional, processing and ingredient criteria to encourage a healthy, balanced lifestyle for cancer risk reduction.
- Non-foodstuffs – all non-edible consumer products free from all known toxins, carcinogenic, mutagenic and reprotoxic substances, such as food storage and preparation products, personal care and cosmetics products, among others, are endorsed with our CANSA Smart Choice Seal. The same strict test requirements apply to non-edible consumer products wishing to qualify.
- Natural environment protection – the CANSA Seal is awarded to products that offer protection against factors in the natural environment that may lead to cancer. In this category, consideration is given to solar radiation and water and air quality. Products include sunscreens, UV-protective garments, apparel and shade items.
- Health programmes – health programmes that enhance education and awareness on factors contributing to cancer risk and resulting in improved, smart and balanced lifestyles are awarded the CANSA Seal. Products in this category also require proven research results to qualify for the CANSA Smart Choice Seal. It includes exercising equipment and courses, dietary guides, weight control courses and guides, smoking cessation courses, and subject-related books.

**Seven new Seal partners were announced in reporting period:**

- [Infinity Care](#) is a nappy brand manufactured in South Africa. It is the first of its kind in the industry to be awarded the CANSA Smart Choice Seal due to its lack of known carcinogens and hormone disruptors.
- Lil Masters is a nappy manufacturer in South Africa. It was awarded the CANSA Smart Choice Seal as it is free of all known carcinogens and hormone disruptors.
- Alzone E balm and baby balm are cosmetic products that have been awarded the CANSA Smart Choice Seal as it is free of all known carcinogens and hormone disruptors.
- CF Products is a sunscreen brand that awarded the CANSA Smart Choice Seal as it complies with our sun protection criteria to offer efficient, safe sun protection.
- Nunuki for little humans is a cosmetic brand that has been awarded the CANSA Smart Choice Seal as it is free of all known carcinogens and hormone disruptors. The Nunuki Sunscreen additionally complies with our sun protection criteria to offer efficient, safe sun protection.
- Falke is a textile company which manufactures sun protection sleeves that can be worn during physical activity to protect the arms of the consumer against the harmful rays of the sun. For this reason it was awarded the CANSA Smart Choice Seal
- Compassionhat is headwear designed specifically for cancer survivors and was awarded the CANSA Seal of Recognition status as a CANSA Smart Choice product aimed at improving quality of life and dignity.

A detailed list of associated products can be found on [www.cansa.org.za](http://www.cansa.org.za).

As a result of the impact of COVID-19 on the South African economy and its businesses, our CANSA Seal programme income was also affected, showing a 10.34% decrease. Despite this, our CANSA Seal brands remain supportive, with the need to educate consumers on healthy living becoming more important than ever before. Our thanks and appreciation goes to all our partners who have supported us in our advocacy and awareness campaigns, as well as the public for their unwavering support of CANSA programmes and initiatives that aim to enable South Africa to become a cancer-free society.