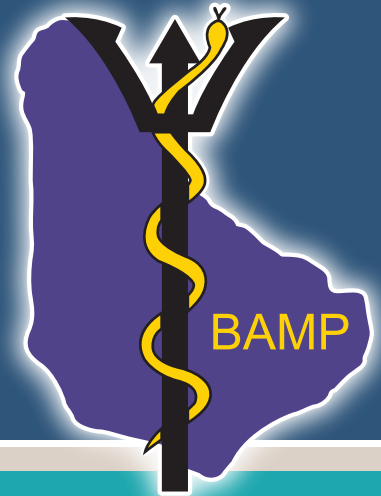


No. 205 Sep-Oct 2021

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**COVER PHOTO:** *Animal Flower Cave St Lucy*

## NOTES FROM THE EDITOR'S DESK

### HEALTH CARE IS PRIMARY

As the COVID-19 pandemic continues to put all aspects of our society under considerable strain, we wish to draw attention to the state of the foundation of our health system: primary care.

Firstly, there has been a significant shortage of nurses within primary care which pre-dated the pandemic. This has been exacerbated by the effort to implement massive testing and vaccination initiatives for COVID-19; public health nurses, clerks and couriers have been reassigned from the polyclinic system (without replacement) to provide these services.

In contrast, other primary care services have become increasingly limited and difficult to access. Without enough nurses to perform phlebotomy, and without couriers to transport lab specimens, some polyclinics are unable to perform lab tests on most days of the week. Many patients with NCDs are issued prescriptions but have no meaningful clinical interaction with their physicians.

HIV viral load, CD4 count and HBA1c - investigations that are critical to the basic management of HIV and diabetes mellitus respectively - have been inconsistently available for years, and continue to be extremely problematic as the Best dos-Santos lab tries to fulfill the need for large scale COVID-19 testing.

In recent times, it has been easy to forget that we are in the midst of another pandemic of NCDs. Perhaps the evolution has been so gradual, we have become numb to the reality that our healthcare system is woefully inadequate to deliver the clinical interventions proven to prevent and control NCDs at the primary care level.

Audits by Adams and Carter in 2010 confirmed that we were not meeting best practice over a range of key processes of care related to hypertension and diabetes care. The global standardized hypertension treatment project, with its pilot project in Barbados, provided insight that with a structured and evidence-based approach to implementation, many of these challenges can be overcome to significantly improve care. It is however distressing that, as a pilot site, we have not followed on to ensure sustainability of these measures. Indeed, this is the model on which we must build, utilizing HEARTS technical package from the WHO's Global Hearts Initiative.

## EDITORIAL... *cont'd*

Furthermore there are a number of gaps in our primary care that need to be addressed with haste, including, but not limited to:

- Inconsistent screening for obesity
- Very limited access to high-intensity multi-component behavioral interventions for patients with obesity/prediabetes/high risk for CVD
- Limited access to structured diabetes self-management education and support
- Inconsistent and ineffective provision of screening and brief behavioural interventions for tobacco and unhealthy alcohol use
- Limited access to colorectal cancer screening
- Very limited access to palliative care
- Weak systems for data collection and analysis, and near-absence of formal clinical audit and governance
- Inadequate information systems to ensure continuity of care between Queen Elizabeth Hospital, Best dos-Santos and Polyclinics

None of the problems listed above will be resolved without significant investment to ensure:

- Adequate equipment and increased staffing within polyclinics (nurses, dieticians, social workers, psychologists, phlebotomists, couriers)
- Adequate postgraduate training in community medicine for both nurses and doctors
- Replacement of the inefficient and incapable Meddata electronic health record system with a robust health IT infrastructure that supports ongoing data-driven clinical audit/governance and drives quality of care delivery
- Increased access to care for adolescents and working-age men
- A restructuring of healthcare delivery around the chronic care model that emphasises continuity, community linkages, and a multidisciplinary, patient-centred, and evidence-based approach

With greater investment and resource allocation to tackle the above - combined with the implementation of 'best buy' public health interventions such as taxation and food labelling we can make a real reductions in NCD-related morbidity and mortality. We need not complicate matters; publications from WHO and the US National Commission on Prevention Priorities have defined these as priorities based on metrics such as cost-effectiveness and quality-adjusted life years gained so that policy

makers can be guided. If we continue to turn a blind eye to primary care and preventative care, we can only expect more of the same.

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## AGEING IN BARBADOS HOW DO WE MEASURE UP TO THE RECOMMENDATIONS FOR HEALTH AND NUTRITION FROM UNITED NATIONS CONVENTION ON AGEING?



**Dr. Ambrose Ramsay**  
*Consultant Physician and Geriatrician  
B.Sc.(Hons), MB.BS, Dip.Ger,  
Diplomate Internal Medicine,  
FACP, CAQ Geriatrics.*

Why is There a Shortage of Inpatient Beds at The Queen Elizabeth Hospital (QEH)?

The shortage of inpatient beds at the Queen Elizabeth Hospital (QEH) has often been attributed to the continued provision of care for older persons, classified as Elderly for Care (EFC). This group, from our elderly population, carries the highest burden of chronic non-communicable diseases (CNCDs) and disability. They remain in the QEH after completing acute treatment for various health and social reasons.

Ageing of our population in Barbados, its consequences and solutions have been discussed at various times and in different forums through the years. It is brought into focus when there is a crisis triggered by a back-log of admissions in the Accident and Emergency Department (AED) of the QEH. These crises have become more regular throughout the year, compared to the 1990s when they happened moreso at Crop Over and Christmas.

Recently the QEH established the Transitional Care Programme to monitor/manage patients, not age defined, discharged from the QEH with certain medical conditions, in effort to decrease the readmission rate among that cohort. This is an excellent initiative but I wonder if this function could not have been performed through the polyclinics; supported by improved referral processes, discharge summaries and communication between the QEH and Medical Officers of

Health (MOHs). It is clear however that this additional work provided through the polyclinics would require more human resources and plant upgrades.

Home and community-based care is perceived as the preferred option for many older persons when compared to long-term care (LTC) and also far less costly than facilities. The costs however are prohibitive for the average Barbadian and as a result they rely on the Government LTC facilities for the service. If ways could be found to reduce costs, home care would help to reduce the demand for LTC beds.

### A Different Perspective is Needed

It appears that the elderly care challenge is seen more from the eyes of the QEH and gets most attention when the hospital's beds are full. Not dismissing the importance and critical role of the QEH, the challenge is of a national nature and requires a national approach.

The COVID 19 pandemic has placed severe pressure on all of our systems that will abate with time. Afterwards, the "EFC" issue is certain to continue to pose a significant challenge as our aged population continues to grow.

### Not Enough Long-term Care Beds

The QEH, private practitioners, polyclinics, social workers and concerned citizens call on the Geriatric Hospital daily to facilitate admissions of patients in need. There is a long waiting list because the demand cannot be met by the current bed capacity. The beds are almost always full and become available only when someone dies. Over the years successive governments have increased the capacity for older persons that need LTC. A partnership with private nursing and senior citizen's homes was established in the late 1990's to improve the bed capacity, but the increases

## SPECIAL ARTICLES... *cont'd*

over time have not kept pace with the demand.

In the report Health, Welfare and Aging in Bridgetown, Barbados SABE 2005<sup>1</sup>, assessment of the older population for depression found very little evidence. Using the Yesavage 15 item Geriatric Depression Scale, 4% of the young-old (60-74) and 7% of the oldest-old ( $\geq 75$ ) were possibly or probably depressed respectively.

It would be interesting to see how many had cognitive dysfunction and dementia, as these conditions are having a significantly negative impact on our seniors today.

Increasing numbers of older persons are presenting with dementia, which compromises the ability for self-care and increases their vulnerability to self-neglect, financial and other forms of abuse. A significant proportion of patients referred to the Geriatric Hospital have dementia. Thirty-three percent of the admissions between January 2012 to June 2014 had a diagnosis of dementia.

### Stronger Rehabilitation Systems Are Needed

One critical action that could have a strong positive impact on reducing the demand for acute beds in the QEH is increasing the capacity to provide rehabilitation services. Older persons respond very well to rehabilitation therapy. Many that lie in acute beds in the QEH, in LTC facilities and at home could return to independent function with timely access to rehabilitation. The Polyclinics do offer rehabilitation services but the resources available cannot meet the current demand. Barbados needs a facility that is equipped to meet the challenge of increasing numbers and complexity of older persons needing rehabilitation. It could be private, public or a combination that offers its services to the general population with the elderly being included.

### Barbados Population Has Aged

Ageing of our population in Barbados has been discussed for some time. The national censuses in 1990, 2000 and 2010 recorded a growing elderly population as predicted; with the over age 65 recorded at 10.6%, 11.7%, and 12.9% respectively. Barbados Population Projections 2019<sup>2</sup> suggests

that we should have reached 16.7% in 2020.

### Priorities for Ageing Populations. How are we doing?

In 1982 the United Nations (UN) convened the first world assembly on ageing in Vienna. The challenges and opportunities related to world ageing were discussed and The Vienna International Plan of Action on Ageing<sup>3</sup> was formulated. A number of priorities were identified and remain relevant in Barbados today.

### Excerpt from The Vienna International Plan of Action on Ageing<sup>3</sup>.

*The plan aims to strengthen the capacities of Governments and civil society to deal effectively with the ageing of populations and to address the developmental potential and dependency needs of older persons. It promotes regional and international cooperation. It includes 62 recommendations for action addressing research, data collection and analysis, training and education as well as the following sectoral areas:"*

- **Health and nutrition**
- Protection of elderly consumers
- Housing and environment
- Family
- Social welfare
- Income security and employment
- Education

The recommendations for health and nutrition are outlined below.

#### Recommendation 1.

*Care designed to alleviate the handicaps, re-educate remaining functions, relieve pain, maintain the lucidity, comfort and dignity of the affected and help them to re-orient their hopes and plans, particularly in the case of the elderly, are just as important as curative treatment.*

#### Recommendation 2.

*The care of elderly persons should go beyond disease orientation and should involve their total well-being, taking into account the interdependence of the physical, mental, social, spiritual and environmental factors. Health care should therefore involve the health and social sectors and the family in improving the quality of life of older persons. Health efforts,*



## SPECIAL ARTICLES... cont'd

*in particular primary health care as a strategy, should be directed at enabling the elderly to lead independent lives in their own family and community for as long as possible instead of being excluded and cut off from all activities of society.*

*Recommendation 3.*

*Early diagnosis and appropriate treatment are required, as well as preventive measures, to reduce disabilities and diseases of the ageing.*

*Recommendation 4.*

*Particular attention should be given to providing health care to the very old, and to those who are incapacitated in their daily lives. This is particularly true when they are suffering from mental disorders or from failure to adapt to the environment; mental disorders could often be prevented or modified by means that do not require placement of the affected in institutions, such as training and supporting the family and volunteers by professional workers, promoting ambulant mental health care, welfare work, day-care and measures aimed at the prevention of social isolation.*

*Recommendation 5.*

*Attentive care for the terminally ill, dialogue with them and support for their close relatives at the time of loss and later require special efforts which go beyond normal medical practice. Health practitioners should aspire to provide such care. The need for these special efforts must be known and understood by those providing medical care and by the families of the terminally ill and by the terminally ill themselves. Bearing these needs in mind, exchange of information about relevant experiences and practices found in a number of cultures should be encouraged.*

*Recommendation 6.*

*The trend towards increased costs of social services and health-care systems should be offset through closer co-ordination between social welfare and health care services, both at the national and community levels. For example, measures need to be taken to increase collaboration between personnel working in the two sectors and to provide them with interdisciplinary training. These systems should, however, be developed taking into account the role of the family and community, which should remain the interrelated key elements in a well-balanced system of care. All this must be done without detriment to the standard of medical and social care of the elderly.*

*Recommendation 7.*

*(a) The population at large should be informed in regard to dealing with the elderly who require care. The elderly themselves should be educated in self-care; (b) Those who work with the elderly at home, or in institutions, should receive basic training for their tasks, with particular emphasis on participation of the elderly and their families, and collaboration between workers in health and welfare fields at various levels; (c) Practitioners and students in the human care professions (e.g. medicine, nursing, social welfare etc.) should be trained in principles and skills in the relevant areas of gerontology, geriatrics, psychogeriatrics and geriatric nursing.*

*Recommendation 8.*

*The control of the lives of the ageing should not be left solely to health, social service and other caring personnel, since ageing people themselves usually know best what is needed and how it should be carried out.*

*Recommendation 9.*

*Participation of the aged in the development of health care and the functioning of health services should be encouraged. A fundamental principle in the care of the elderly should be to enable them to lead independent lives in the community for as long as possible.*

*Recommendation 10.*

*Health and health-allied services should be developed to the fullest extent possible in the community. These services should include a broad range of ambulatory services such as: day-care centres, out-patient clinics, day hospitals, medical and nursing care and domestic services. Emergency services should be always available. Institutional care should always be appropriate to the needs of the elderly.*

*Inappropriate use of beds in health care facilities should be avoided. In particular, those not mentally ill should not be placed in mental hospitals. Health screening and counseling should be offered through geriatric clinics, neighbourhood health centres or community sites where older persons congregate. The necessary health infrastructure and specialized staff to provide thorough and complete geriatric care should be made available. In the case of institutional care, alienation through isolation of the aged from society should be avoided inter alia by further encouraging the involvement of family members and volunteers.*

## SPECIAL ARTICLES... *cont'd*

Nutritional problems, such as deficient quantity and inappropriate constituents, are encountered among the poor and underprivileged elderly in both the developed and the developing countries. Accidents are also a major risk area for the elderly. The alleviation of these problems may require a multisectoral approach.

### Recommendation 11.

The promotion of health, the prevention of disease and the maintaining of functional capacities among elderly persons should be actively pursued. For this purpose, an assessment of the physical, psychological and social needs of the group concerned is a prerequisite. Such an assessment would enhance the prevention of disability, early diagnosis and rehabilitation.

### Recommendation 12.

Adequate, appropriate and sufficient nutrition, particularly the adequate intake of protein, minerals and vitamins, is essential to the well-being of the elderly. Poor nutrition is exacerbated by poverty, isolation, maldistribution of food, and poor eating habits, including those due to dental problems. Therefore special attention should be paid to: (a) Improvement of the availability of sufficient foodstuffs to the elderly through appropriate schemes and encouraging the aged in rural areas to play an active role in food production; (b) A fair and equitable distribution of food, wealth, resources and technology; (c) Education of the public, including the elderly, in correct nutrition and eating habits, both in urban and rural areas; (d) Provision of health and dental services for early detection of malnutrition and improvement of mastication; (e) Studies of the nutritional status of the elderly at the community level, including steps to correct any unsatisfactory local conditions; (f) Extension of research into the role of nutritional factors in the aging process to communities in developing countries.

### Recommendation 13.

Efforts should be intensified to develop home care to provide high quality health and social services in the quantity necessary so that older persons are enabled to remain in their own communities and to live as independently as possible for as long as possible. Home care should not be viewed as an alternative to institutional care; rather, the two are complementary to each other and should so link into the delivery system that older persons can receive the best care appropriate to their needs at the least cost. Special support must be given to home care services, by providing them with

sufficient medical, paramedical, nursing and technical facilities of the required standard to limit the need for hospitalization.

### Recommendation 14.

A very important question concerns the possibilities of preventing or at least postponing the negative functional consequences of aging. Many lifestyle factors may have their most pronounced effects during old age when the reserve capacity usually is lower. The health of the aging is fundamentally conditioned by their previous health and, therefore, life-long health care starting with young age is of paramount importance; this includes preventive health, nutrition, exercise, the avoidance of health-harming habits and attention to environmental factors, and this care should be continued.

### Recommendation 15.

The health hazards of cumulative noxious substances-including radioactive and trace elements and other pollutions-assume a greater importance as lifespans increase and should, therefore, be the subject of special attention and investigation throughout the entire lifespan. Governments should promote the safe handling of such materials in use and move rapidly to ensure that waste materials from such use are permanently and safely removed from man's biosphere.

### Recommendation 16.

As avoidable accidents represent a substantial cost both in human suffering and in resources, priority should be given to measures to prevent accidents in the home, on the road, and those precipitated by treatable medical conditions or by inappropriate use of medication.

### Recommendation 17.

International exchange and research co-operation should be promoted in carrying out epidemiological studies of local patterns of health and diseases and their consequences together with investigating the validity of different care delivery systems, including: self-care, and home care by nurses, and in particular of ways of achieving optimum programme effectiveness; also investigating the demands for various types of care and developing means of coping with them paying particular attention to comparative studies regarding the achievement of objectives and relative cost-effectiveness; and gathering data on the physical, mental and social profiles of aging individuals in various social and cultural contexts,



SPECIAL ARTICLES... *cont'd*

*including attention to the special problems of access to services in the community.*

In 2002 the second world convention on ageing was held in Madrid, Spain<sup>4</sup>. The recommendations for "Advancing health and wellbeing into old age" are outlined in section II, paragraphs 57-90. The recommendations from 1982 that remained relevant and new recommendations were examined. The objectives and actions to achieve the objectives were outlined.

### Barbados Response

Barbados has made strides towards achieving some of the 1982 recommendations but much more must be done in order to achieve a greater impact. Application of these recommendations to our situation, taking the Barbadian culture into consideration, will have a significant positive impact on healthcare for our seniors and the QEH. The challenges require a whole of country approach.

#### Recommendation 1.

*Rehabilitation services are available through the Government-run QEH, polyclinics, Geriatric Hospital and District Hospitals. The service however is not adequately resourced to meet the demand. These services are also available in the private sector. The service however is not adequately resourced to meet the demand.*

#### Recommendation 2.

*Home help, activity centers, companion services and day care services are provided through the National Assistance Board (NAB). Meals are provided through non-governmental organisations (NGOs) like The Salvation Army and Barbados Red Cross.*

#### Recommendation 3.

*Barbados has an extensive network of polyclinics and private practitioners that are easily accessible. More training in geriatrics and gerontology is needed.*

#### Recommendation 4.

*Long-term care (LTC) is provided in various settings ranging from the home, to formal LTC facilities like private nursing facilities and the government run Geriatric Hospital and Psychiatric Hospital.*

#### Recommendation 5

*Palliative care and hospice are provided in all settings in which older persons reside. There is a palliative care association which is active in coordinating access to this service especially in the community.*

#### Recommendation 6.

*The Ministry of People Empowerment and Elder Affairs (MPEEA) and Ministry of Health and Wellness (MOHW) are working together in this area.*

#### Recommendation 7.

*Training of practitioners and students involved in human care provision is being undertaken by the University of the West Indies (UWI), Barbados Community College (BCC), Samuel Jackman Prescod Institute of Technology and Innovation (SJPI) and the Community Development Department.*

#### Recommendations 8 & 9.

*Person-centered care has become more widely accepted as crucial to providing any good service. Older persons however are often not involved in decisions that impact on their care. The Barbados Association of Retired Persons (BARP) is having a major impact in this area.*

#### Recommendations 10, 11, 12, 13, & 14.

*These are all being addressed under guidance of the MPEEA and MOHW.*

#### Recommendation 15.

*This is being undertaken by the MOHW and Ministry of the Environment and National Beautification.*

#### Recommendation 16.

*This work is undertaken by the Ministry of Transport Works and Maintenance as well as Barbados Fire Service through public education. Barbados Association of Medical Practitioners (BAMP) is also contributing to this process.*

#### Recommendation 17.

*This is still a weak area that must be led by the UWI, GACDRC and MOHW.*

In 2012 Barbados produced the National Policy on Ageing<sup>5</sup> that is currently being reviewed. It was a big step towards meeting many of the recommendation listed and addressed

## SPECIAL ARTICLES... *cont'd*

areas beyond health and nutrition. A national conversation on ageing was held in October 2020, led by the Ministry of People Empowerment and Elder Affairs and supported by the Pan American Health Organisation, one step in the review process. I look forward to the finished product.

### Conclusion

The shortage of beds at the QEH must be viewed from the national perspective. Barbados has an aged population, which carries a high burden on CNCDs and their complications including disability. A new approach to this challenge that goes beyond the provision of LTC beds is needed. Improving our rehabilitation services across health facilities and in the communities can have a significant positive impact on reducing the demand for LTC beds. Robust social services intervention and coordination of community-based care is what is needed. Barbados has made strides in meeting some of the recommendations of the UN convention on ageing but more work is needed. I look forward to the revised National Policy on Ageing.

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## UPDATE ON RENAL TRANSPLANTATION IN BARBADOS



**Dr. Nerissa Jurawan**  
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Queen Elizabeth Hospital  
Barbados

Chronic Kidney Disease (CKD) is a global epidemic resulting in significant morbidity and mortality internationally. This is a direct result of the increase in the two major causes of CKD – diabetes and hypertension. Worldwide, epidemiological data has shown that the number of persons with diabetes has quadrupled between 1980 and 2014, increasing from 108 million in 1980 to 422 million adults in 2014<sup>1</sup>. There was also a steady rise in hypertension with an increase from 594 million persons in 1975 to 1.13 billion in 2015<sup>2</sup>. The increase in these two diseases occurred at a much faster rate in low and middle income countries than in high income countries<sup>2-4</sup>.

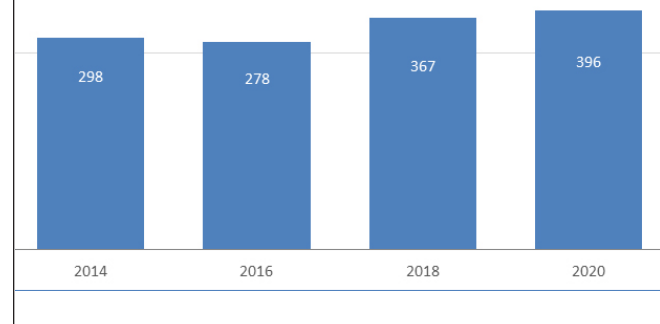
Progression of CKD leads to higher risks of several co-morbidities, namely end-stage renal disease (ESRD) and cardiovascular disease. The Global Burden of Disease (GBD) 2015 study showed that 1.2 million deaths, 19 million disability-adjusted life-years (DALYs) and 18 million years of life lost from cardiovascular diseases were directly attributable to reduced kidney function<sup>5,6</sup>. This study also found that 1.2 million people died from kidney failure in 2015, an increase of 32% since 2005<sup>6</sup>.

The cost of treating kidney disease is enormous and places a huge burden on healthcare systems throughout the world particularly in developing countries. More than 2–3% of the annual health-care budget of high-income countries is spent on the treatment of ESRD, although those receiving treatment represent under 0.03% of the total population<sup>7</sup>. Furthermore, 2.62 million people received dialysis worldwide in 2010 and the numbers needing dialysis was projected to double by 2030<sup>8</sup>.

ESRD continues to rise at an alarming rate in Barbados (Fig. 1). In keeping with global trends, this is largely due to the

epidemic of chronic non-communicable disease. There are currently 396 patients on dialysis in Barbados (data as of May 2020). A conservative estimate is that this number will double in the next 5-7 years.

**FIG 1. NUMBER OF PATIENTS ON RENAL REPLACEMENT THERAPY**



This large and rapidly growing dialysis population with limited haemodialysis facilities/resources places a huge economic burden on the healthcare system. The Queen Elizabeth Hospital (QEH) Barbados spends roughly 12% of the allocated budget on the treatment of ESRD with dialysis (James 2018).

As of August 2021, there are 187 patients dialyzing at the Artificial Kidney Unit (AKU) on 22 dialysis machines. The unfortunate reality is that the capacity of the AKU to provide haemodialysis is stretched to the point where the demand for dialysis far outweighs what the hospital can provide. To try to remedy this situation, 85% of dialysis patients (159 persons) obtain two sessions of dialysis treatment per week rather than the three treatments generally recommended. Only 15% (28 patients) obtain the recommended three times weekly sessions. This is not ideal, as research indicates that there is a correlation between low haemodialysis doses and increased mortality and morbidity of patients.

It is well known that the best form of renal replacement therapy for patients with ESRD is renal transplantation. All studies have shown that having a renal transplant dramatically improves quality of life and the survival of patients with ESRD when compared to dialysis.

There is also a huge cost benefit of renal transplantation when compared to dialysis. This is not only derived from

## SPECIAL ARTICLES... *cont'd*

fewer hospital admissions and increased productivity in the workplace following transplantation, but also from the actual cost of transplantation when compared to dialysis. The cost effectiveness of renal transplantation when compared to dialysis is seen mainly after the first year. The estimated calculated savings over a 10-year period is \$234,000.00 BDS per patient transplanted when compared to dialysis, if the initial cost of transplantation in the first year is taken into account.

The QEH performed its first kidney transplant in 1987. The majority of subsequent transplants were successful. Transplantation was put on hold in 1998 until 2009 when another successful kidney transplant was done. There was again a lull in transplant activity until 2015 when the transplant programme was revamped with the aid of the Transplant Links Community.

In 2018 the QEH made the decision in keeping with best-practices to establish the Independent Assessors whose role is to have oversight in the Live Donor Program. It is comprised of a chairman who is assisted by the QEH Board Secretary and 12 other persons from diverse backgrounds.

Since re-starting the programme, 9 successful transplants have been performed. The Renal Transplant team currently manages 16 transplant recipients and there have been 175 entries to the transplant programme since 2007 (including 1 paediatric patient).

The current transplant team consists of:

Dr. Lisa Belle - Consultant Nephrologist, Head of Nephrology  
 Dr. Margaret O'Shea - Consultant Transplant Surgeon  
 Dr. Nerissa Jurawan - Consultant Transplant Nephrologist  
 R.N. Shorey – Transplant Co-ordinator  
 Dr. Danielle Dottin - Specialist Registrar in Nephrology  
 Dr. Natacha Paquette - Specialist Registrar in Renal Transplant Surgery.

It is anticipated that the need for kidney transplantation will grow along with the projected increase in renal failure. We therefore need to pursue other sources of kidneys especially for those patients who do not have a compatible, suitable living donor. This has proven to be one of the major limiting factors to living donation. As noted, the majority of the ESRD in the Barbadian population is caused by hypertension and diabetes, which have a strong familial component, making it difficult for patients to find a family member who is suitable

for donation. A possible source for Barbados would be kidneys from brain dead donors who, either by way of a living will or by their families' gracious consent, generously allow their kidneys to be retrieved to benefit someone in need. At this time, the legislation necessary to remove organs from brain dead patients is not yet in place. This needs to be passed in Cabinet for a deceased donor programme to be developed.

The renal unit is at present struggling to meet the demands of patients with renal failure, but we are willing, with the necessary support to give these patients the best of our expertise through our multi-disciplinary framework and look forward to the expansion of the renal transplant programme.

It is estimated that as much as 25% of patients presently on dialysis are transplantable. We have proven ourselves since 2015 and wish to continue to expand this beneficial living donation programme and develop a deceased donor programme. Our vision for the unit is to serve not only Barbados but to make the QEH a centre of excellence for renal transplantation serving not only Barbados, but also the Organisation of Eastern Caribbean States (OECS) countries, thereby generating income for the QEH in the process.

The following case study illustrates not only the expertise and skill of the Barbadian and Overseas Team but also the enormous benefit of renal transplantation.

### Case Study In Living Donation Renal Transplantation

This is the history of a 14 year old female who initially presented at 9 years with intermittent episodes of nausea, vomiting, weight loss, increasing fatigue and lethargy.

Of significance, there was a history of primary nocturnal enuresis, no history of skin rash or joint pains.

No significant perinatal history (delivered from Ventouse extraction at 39 weeks).

Immunizations were up to date.

Examination findings at the time:

Pale mucosae, Height 130 cm, weight 28 kg.

Tanner Stage 1

*SPECIAL ARTICLES... cont'd*

Blood Pressure 122/65, Pulse 104 bpm.

Examination otherwise unremarkable.

**Laboratory Findings:**

A normocytic anaemia, advanced renal failure with hypocalcaemia, hyperphosphataemia and hypercholesterolaemia.

ANA, HIV, Hep B, C neg,

HB electrophoresis –A A, normal iron studies.

Urinalysis blood and protein protein creatinine ratio 3.4.

Ultrasound – small echogenic right kidney. Left kidney was not seen.

Diagnoses- End Stage Kidney Disease in child with single right kidney - developmental vs glomerulonephritis.

No kidney biopsy was possible.

*Pre-transplant Course*

She was commenced urgently on haemodialysis then subsequently transitioned to peritoneal dialysis with early catheter malfunction due to malposition which was subsequently re-positioned.

Her course was complicated by recurrent/partially treated peritoneal infections in 2014-2015.

She was then diagnosed with a cardiomyopathy (etiology unclear) in 2016, after an admission with exertional dyspnea and hypotension. Her Echo findings at the time revealed an ejection fraction of 10% and bi-atrial dilatation with significant pulmonary hypertension.

She was later admitted with fluid overload and hypertension, and required intermittent peritoneal dialysis. Her weight was reduced by 1 kg, blood pressure gradually fell and cardiac medications had to be reduced.

In Dec 2018 she was admitted to the Paediatric Intensive Care Unit with an unprovoked hypertensive encephalopathy with transient loss of vision, confusion, focal left weakness and seizures. Her CT brain was normal with a normal ophthalmology review.

She required a labetalol infusion for 48 hours with additional antihypertensive medications. The plasma renin:aldosterone ratio was less than 1 and the plasma catecholamine screen was not suggestive of a pheochromocytoma.

Under intense review by the paediatric cardiologist her ejection fraction gradually improved from 10% to 34% to 49% with no pulmonary hypertension.

Throughout her clinical course she developed secondary hyperparathyroidism which improved with increased vitamin D doses.

She also underwent intense nephrology follow up to ensure euvolaemia however dialysis clearances were not ideal.

After multidisciplinary team discussions, a decision was made to proceed with transplantation. Patient received live donor renal transplant from her mother.

Surgery proceeded uneventfully however an ultrasound immediately post-surgery showed no flow in the renal artery or vein.

She returned to theatre and the kidney was repositioned with a graft re-anastomosis.

As expected, she went on to develop delayed graft function and had haemodialysis post-operatively for hyperkalaemia. She had two episodes of haemodialysis then peritoneal dialysis was re-commenced on Day 6 post-operatively.

Blood pressure was difficult to control and required multiple anti-hypertensives.

Her recovery was further complicated as soon as the urine output started to improve (Day 8) by sepsis. She developed temperature spikes which were initially treated with augmentin then zosyn. All cultures were negative except for yeast cells in urine which was treated with fluconazole.

She then developed antibiotic-related diarrhoea. The urethral stent that was placed intra-operatively also migrated and was removed around this time.

On Day 15, her urine output improved and peritoneal dialysis was held.

## SPECIAL ARTICLES... *cont'd*

She went on to develop a small pericardial effusion and a platelet count as high as 895,000 which settled after day 25 (blood film normal).

She was discharged on day 27 as kidney function improved dramatically and she no longer required dialysis.

She is still doing very well. The cardiomyopathy continues to improve, and her last creatinine was 93umol/L as opposed to 1000umol/L pre-transplant.

Before the pandemic she was back in school and had joined a dance group at the school.

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*Dr Jurawan's specialty is transplant nephrology and she also operates a private practice.*



## FROM THE 65TH ANNUAL CARPHA HEALTH RESEARCH CONFERENCE 2021



**Professor M Anne St John**  
GCM MB BS (UWI) FRCPC FAAP



The 65th annual CARPHA Health Conference was hosted as a virtual conference for a second year in succession from June 16th to 19th 2021. The theme was the Covid Pandemic, NCDs and Climate Change: The Caribbean's Triple Threat.

This article highlights the research which was submitted from researchers who are based in Barbados. The following abstracts were accepted as oral and poster presentations at the scientific meeting.

### **COVID-19 vaccine acceptance among healthcare professionals of Queen Elizabeth Hospital, Barbados.**

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**Objective:** To examine the acceptability of COVID-19 vaccines among the healthcare professionals (HCPs) of Queen Elizabeth Hospital, Barbados.

**Methods:** A cross-sectional survey of HCPs was conducted between February 14 and 27, 2021 using an online questionnaire.

**Results:** A total of 350 respondents completed the questionnaire. The majority were female (74%) and single (56.3%). Nurses were the largest occupational group (40.9%), and 25–34 years was the largest age group (35.4%). Of the respondents, 47% reported that they had a good level of COVID-19 knowledge; 48% and 56%, respectively, felt that

COVID-19 vaccines were at least moderately safe and effective. Of the respondents, 50.9% expressed confidence in the scientific vetting process for a new vaccine. Of the respondents, 34.5% would be willing to pay a fee for vaccination, and 73.4% would recommend vaccines for others.

Of the respondents, 77.7% expressed their intention to get vaccinated, and 54.3% indicated willingness to receive the vaccine as soon as possible. Approximately 24% indicated that they would wait to see how vaccines would affect others before receiving a vaccine themselves, and 15% indicated an intention to take the vaccine sometime in the future.

**Conclusion:** The study highlighted vaccine hesitancy among HCPs in the public tertiary hospital of Barbados. As HCPs' perceptions may hinder the campaign to promote vaccine uptake in Barbados, vaccine promotion programmes targeting both HCPs and the public are needed to ensure the success of the country's COVID-19 vaccination drive.

### **The impact of COVID-19 pandemic on the burden and the pattern of hospitalization from COVID-19 unrelated illnesses among children in Barbados – a preliminary report from an ongoing study.**

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**Objective:** To describe the impact of the COVID-19 pandemic on the burden and pattern of hospitalization from COVID-19-unrelated illnesses among children in Barbados.

## RESEARCH FORUM... *cont'd*

**Methods:** This was a population-based prospective clinical audit. It included children (aged < 16 years) admitted for COVID-19-unrelated illnesses to the only tertiary care hospital in Barbados during the ongoing COVID-19 pandemic. This audit covered the period from April to July 2020. The audit data corresponding period in 2019 and 2018, which were also collected prospectively, were used as historical control.

**Results:** There were a total of 178 paediatric medical admissions (PMAs) in Barbados from April to July 2020. This was a decline of 47.2% (95% confidence interval (CI) = 41.6%, 52.5%) compared to the 336 PMAs during the corresponding period in 2019. The decline in the number of admissions from asthma phenotypes, respiratory infections and gastrointestinal infections accounted for 88.0% (95% CI = 78.6%, 94.8%) of the total decline in PMAs during the pandemic-related lockdown period when compared with the corresponding period in 2019. The difference in the proportion of children who required transfer to the paediatric intensive care unit during the pandemic and the corresponding period in 2019 and 2018 was statistically not significant ( $p = 0.8234$ ).

**Conclusion:** A sharp decline in the admissions from asthma phenotypes and those from respiratory tract and gastrointestinal tract infections resulted in a close to 50% decline in hospitalizations from COVID-19-unrelated illnesses among children in this population.

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### The impact of the COVID-19 pandemic on nutrition and health practices in a cohort of obese Barbadian children.

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**Objective:** To assess and report the impact of the COVID-19 lockdown period on the children's nutrition and health practices.

**Methods:** Data from the HSFB/Yute Gym for 2019 (pre-COVID-19) were compared to the anthropometric measurements of children taken after the lockdown was lifted (post-COVID-19). The data were analysed using Stata for differences.

**Results:** Mean height ( $5.42 \pm 0.35$ ), weight ( $183.82 \pm 41.04$ ) and body fat percentage ( $39.54 \pm 11.18$ ) increased over the

lockdown period. Of all the variables assessed, only height ( $p = 0.009$ ; 95% confidence interval (CI) =  $-0.10, -0.02$ ;  $n = 18$ ) and weight ( $p = 0.002$ ; 95% CI =  $-18.65, -5.12$ ;  $n = 18$ ) were statistically significantly different. There was no statistically significant difference in the mean body fat of the participants. Dietary components consumed were associated with ill health. Overall diet quality was poor and did not meet the recommendations for adequate fruit and vegetable consumption by adolescents. All children engaged in sedentary living during this period and did not meet daily requirements for physical activity.

**Conclusion:** The small sample size and limitations in available data reduced the power of the study. However, focussed promotion of home-based physical activities for exercise and healthy dietary practices should be heavily publicized during any future lockdown to minimize possible negative health effects.

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### The relationship of parental occupation with self-esteem, emotional intelligence and empathy among students from health professional programmes.

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**Objective:** To examine the relationship of parental occupation with self-esteem (SE), emotional intelligence (EI) and empathy among health professional students of the Caribbean region.

**Methods:** Participants ( $n = 460$ ) were first-year undergraduate health professional students (medical, dental, nursing, pharmacy, optometry, and veterinary medicine) from the Faculty of Medical Sciences, The University of the West Indies, St Augustine Campus, Trinidad and Tobago. Students completed the Rosenberg Self-Esteem Scale, the Trait Meta-Mood Scale and the Jefferson Scale of Physician Empathy. Students reported the occupational type and status of each parent. Researchers coded occupations according to the International Standard Classification of Occupations (ICSO).

**Results:** Maternal occupation had a significant association with SE ( $p < 0.01$ ), EI ( $p < 0.01$ ) and empathy ( $p < 0.05$ ).

## RESEARCH FORUM... cont'd

However, post-hoc pairwise comparisons of occupation were not significant for empathy scores. Pairwise post-hoc comparisons for SE indicated higher scores for children of mothers who were service and sales workers and unemployed homemakers versus technical and associate professionals. Pairwise comparisons for EI indicated higher scores for children of mothers who were technical and associate professionals versus managers and service and sales workers. Children of unemployed/homemaker mothers had higher scores on EI and empathy compared to those whose mothers worked outside the home. Paternal occupation was unrelated to all three outcome variables.

**Conclusion:** The results demonstrated that maternal occupation was associated with SE, EI and empathy among students, although mechanisms of this association were not addressed by this research design. Nonetheless, knowledge of parental occupation may be useful in developing interventions to improve the interpersonal skills and well-being of students.

#### Driving cessation among older adults in a Caribbean small island developing state

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**Objective:** To explore the experiences of older adults living in Barbados, a small island developing state (SIDS), who had ceased driving; their use of alternate transport; and how well their neighbourhoods supported a physically and socially active lifestyle.

**Methods:** In-depth semi-structured interviews were conducted with 17 older adults. Interviews were transcribed verbatim and analysed using thematic analysis.

**Results:** Driving cessation was not a major concern for participants. Social support from friends and family contributed greatly to this ease of transition, along with relief and enjoyment of being a passenger (rather than driver) and the enjoyment of hobbies. Rides from friends and family served as the major mode of transport, while public transport and taxis were met with negativity and disinterest. Neighbourhoods

played an important role in this transition as they represented a significant source of social capital and close proximity to facilities and stores.

**Conclusion:** Social and geographical idiosyncrasies of being a SIDS contributed to the more positive experience of driving cessation of this study as compared to larger, more industrialized countries. Efforts to improve the physical and social health of older adults in Barbados should focus on external factors that encourage walking and further social engagement, such as improving neighbourhood infrastructure, improving the acceptability of public transport, and increasing the range of alternative transport options.

#### Preferred place of death for breast cancer patients receiving palliative care at the Queen Elizabeth Hospital in Barbados.

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**Objective:** To explore the perceptions of persons with a diagnosis of breast cancer receiving adult palliative care at the only tertiary hospital on the island of Barbados regarding their preferred place of death.

**Methods:** A qualitative study using purposive sampling with maximum variation technique was conducted. Fifteen participants (14 females and 1 male) living with a diagnosis of breast cancer (< 1–16 years) participated in semi-structured interviews which averaged 30 minutes. Interviews were transcribed verbatim, coded deductively by the interviewer and subject to thematic analysis with constant comparison aided by ATLAS.Ti 8 software.

**Results:** The interviews identified a lack of exposure to advance care planning (including a preferred place of end-of-life care and death options) information. Patients conceptualized a good death as occurring when surrounded by friends and family in a familiar environment. The dominant preferred place of death was the home, followed by the hospital setting. However, participants doubted the feasibility of achieving a home death given what they perceived to be a lack of psychological, physical and social services for their families. Importantly, participants had little understanding or experience with the concept of hospice and perhaps consequently no innate preference for

## RESEARCH FORUM... cont'd

community-based hospice care as a place of death. However, they were willing to consider this form of care once the classic description and purpose of hospice were shared.

**Conclusion:** Choice of point of death requires advanced care planning discussions to assist patients with breast cancer. Further work is needed to investigate the barriers and facilitator to advanced care planning.

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### Understanding consumer food consumption behaviour in the context of non-communicable diseases.

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**Objective:** Gaps in Caribbean regional research data highlighted a paucity of qualitative exploration into consumer behaviour (purchasing and consumption). Understanding consumer food behaviour as part of the larger food system can help us in developing non-communicable disease (NCD) interventions.

**Methods:** Seventy individual interviews were conducted between June and August 2018, with stakeholders from the public and private sectors and civil society in Jamaica (n = 41), St Kitts and Nevis (n = 14) and in St Vincent and the Grenadines (n = 15). Fourteen consumer focus groups were conducted from May to July 2019: St Vincent and the Grenadines (n = 4), St Kitts and Nevis (n = 4), Jamaica (n = 6). Data were managed using Dedoose software and analysed following qualitative thematic analysis.

**Results:** Overall, there tended to be consensus not only between stakeholders and consumers, but also across countries related to four major themes: (a) food consumption had changed over the lifespan; (b) adults were exerting their

right to choose; (c) accessibility was important but affordability was the bottom line; and (d) cost and convenience overrode knowledge. Participants confirmed what we knew in that people had the knowledge about healthy foods, but the demand for unhealthy foods was great due to their cheaper cost and easy availability. Of interest was how childhood experiences and the 'invincibility' of youth framed their adult consumption decisions.

**Conclusion:** Consumer food consumption had many similarities across Caribbean countries, which could allow for regional interventions. The specific indications of how the childhood experience could influence future adult behaviour are important considerations in developing interventions to address NCDs.

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### Changes in weight and glucose status reported in the Barbados Diabetes Remission Study – 2.

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**Objective:** The Barbados Diabetes Remission Study – 1 (BDRS1), a clinic-based, low-calorie dietary intervention (LCD), reported significant mean weight loss (10.1 kg) with accompanying diabetes remission in 60% of the participants. Here we investigated the effectiveness of a community-based variant of the LCD.

**Methods:** Three faith-based organizations (FBOs) were purposively selected as community sites, and volunteer congregants were trained as community health advocates (CHAs). Congregants and other community members were then screened for eligibility as study participants, based on age (20–70 years), glucose status (pre-diabetes or type 2 diabetes mellitus (T2DM) for < 6 years) and body mass index ( $\geq 27 \text{ kg/m}^2$ ). Those enrolled participated in the 12-week LCD

(840 kcal/day). Anti-diabetic medication was discontinued on day 1 of the intervention, and participants had weekly weight, glucometer and blood pressure (BP) measurements taken by the CHAs at the FBOs. HbA1C was performed at week 1 and week 12. Data were entered in the online RedCap database and analyses performed by Stata.

**Results:** Of the 156 persons screened, 31 participated (11 T2DM, 20 pre-diabetes; 28 females, 3 males). Mean (95% confidence interval) weight loss was 6.8 kg (5.4, 8.2),  $p < 0.00001$ ; 7.9 kg in males versus 6.6 kg in females. A1C decreased from 6.6% to 6.2%,  $p = 0.003$ , and FBG from 6.4 to 6.0,  $p = 0.004$ . T2DM remission rates were 60% and 90% by A1C  $< 6.5\%$  and FBG  $< 7$  mmol/L respectively. Pre-diabetes remission was 18% and 40% by A1C  $< 5.7\%$  and FBG  $< 5.6$  respectively. Systolic BP and diastolic BP decreased by 10 mmHg ( $p = 0.003$ ) and 8 mmHg ( $p = 0.005$ ) respectively.

**Conclusion:** A community-based approach to a diabetes remission protocol is both feasible and clinically effective. Follow-up measurements are needed to determine sustainability. Adaptability to other disorders or other settings should be investigated.

#### Pre-exposure prophylaxis use among gay bisexual men who have sex with men in Barbados

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**Objective:** To determine the awareness of pre-exposure prophylaxis (PrEP) of gay, bisexual and other men who have sex with men (gbMSM), and transgender males in Barbados and barriers and facilitators to PrEP use.

**Methods:** A cross-sectional online survey was conducted among gbMSM and transgender men in Barbados between July and September 2019. Most men were recruited based on membership in a LGBTIQ+ community listserv in Barbados. The survey asked questions on demographics, knowledge and awareness of PrEP, HIV stigma and sexual risks. Data were mainly described using univariate and bivariate analysis.

**Results:** Current PrEP use was 26.6% (50/188), although 37.2% (70/188) reported a history of PrEP use. Three-quarters of the sample (141/188) were aware of PrEP. Main PrEP Facilitators included confidentiality (38.8%), non-judgemental service (26.5%) and ease of access to PrEP (30.6%). Main PrEP barriers included felt stigma (45.7%), perceived side-effects (41.4%), being unaware of the PrEP programme (53.5%), perceived cost of PrEP (35.7%) and accessibility (12.7%).

**Conclusion:** Lack of visibility of the PrEP programme may lead to myths and misconceptions about PrEP and the PrEP programme. Barriers such as stigma attached to PrEP use should be addressed to dispel concerns related to sexual morality linked to PrEP use. These can be addressed by increasing awareness of the PrEP and the PrEP programme through public talks, and stigma may be addressed by sensitising health care workers.

#### Gay, bisexual and other men who have sex with men understanding of sexual risk in the age of PrEP and treatment as prevention: a qualitative study in Barbados.

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**Objective:** To explore the perception of sexual risk among gay, bisexual and other men who have sex with men (gbMSM) in Barbados in the age of biomedical prevention options.

**Methods:** This qualitative research study was conducted using semi-structured interviews during the period August 20 to September 23, 2020. Eleven gbMSM participants and four key informants were recruited through purposive sampling. Thematic analysis with grounded theory was used for the constant comparison of and emerging themes from the data to develop a hypothesis.

**Results:** The basic themes which emerged were: (a) awareness of gbMSM sexual issues; (b) precautionary actions to prevent new sexually transmitted infections (STIs)/sexually transmitted diseases or the complications to existing ones; (c) environments that encourage honest, open sexual discussions; and (d) taking chances during sexual activity. These were further narrowed to organizing themes based on whether behaviour aligned or contradicted awareness. Age and social factors also influenced persons' behaviour.



## RESEARCH FORUM... *cont'd*

**Conclusion:** gbMSM in Barbados perceived their sexual risk for HIV and STIs as low. This was exhibited through their behaviours such as engaging in protected sex and other low-risk practices. However, these practices were not consistent and showed a misconception of perceived risk. A comprehensive understanding of sexual health is necessary for accurate perceptions of sexual risks and also for supporting behaviours. Comprehensive understanding may be achieved through improvements in messaging content and delivery.

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### Factors influencing choice of care provider for women diagnosed with breast cancer in urban Jamaica.

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**Objective:** To examine the factors influencing the care choices of breast cancer survivors in an urban setting in Jamaica, with a view to identifying factors which were pivotal in determining the accessibility to care.

**Methods:** Female participants, aged 47–58 years, were purposively selected with the assistance of a cancer charity on the island. Individual, face-to-face semi-structured interviews were conducted until the point of saturation ( $n = 10$ ). All interviews were audio-taped and transcribed verbatim. Data were hand-coded and analysed using thematic analysis with constant comparison.

**Results:** Participants relied on the guidance of healthcare practitioners in navigating the healthcare system. However, patients' choice of care institution was influenced by factors such as patient confidence in the doctor based on previous unrelated healthcare experience, ability to access financial support, access to specialized health services, avoidance of long waiting times at the public healthcare facilities, and negative or positive anecdotal experiences of other cancer survivors.

**Conclusion:** The choice of public or private healthcare for cancer patients was influenced not only by the ability to obtain care financing, but also by the feeling of urgency, the perception of care in the public sector, and the guidance provided to patients by their physicians.

### A qualitative investigation of the factors influencing the implementation of Global Hearts Initiative in a small island developing state.

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**Objective:** To identify the barriers and facilitators of implementation of the Global Hearts Initiative (GHI) for the control of hypertension in the small island developing state (SIDS) of Barbados and to explore the acceptability of the process and provide contextual insights for project management, monitoring and evaluation.

**Methods:** Seven policymakers/managers/healthcare professionals/academics involved in the implementation of GHI participated in individual, semi-structured interviews averaging 35 minutes. Interviews were audio-recorded, transcribed verbatim and subject to thematic analysis with constant comparison assisted by AT-LAS-ti version 8 software.

**Results:** Participants had a thorough understanding of the GHI project and its theoretical implementation steps and believed in its usefulness as a beneficial health intervention. However, their ability to implement the project was negatively affected by pre-existing workload, competing work responsibilities and fluid national health priorities. Importantly, insufficient and inefficient access to data via health information systems negatively impacted project monitoring and evaluation.

**Conclusion:** A resource-stratified approach to the implementation of GHI with particular reference to human resource capacity and health informatics may be useful SIDS. Policy support is vital for the successful implementation and sustainability of the GHI project in Barbados.

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### Characterizing the burden and impact of menstrual and pelvic health disorders in women in Barbados: results from a cross-sectional survey.

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RESEARCH FORUM... *cont'd*

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**Objective:** To assess the impact of menstrual and pelvic health disorders on a convenience sample of Barbadian women.

**Methods:** Responses from a survey administered and taken online by a sample of 192 women living in Barbados (18–60 years) were assessed. Variables that were collected included age, condition(s) diagnosed and symptoms. The Work Productivity and Activity Impairment Questionnaire: Specific Health Problem was administered to describe the impact of menstrual and pelvic health disorders on work productivity and engagement in social activities. T-tests, Chi-square tests, odds ratios (ORs), analysis of variance (ANOVA) and multivariate analysis were conducted to estimate the associations among patient characterization, disorder characteristics and outcomes.

**Results:** The mean age at diagnosis was 25 years, and the mean time to diagnosis was 766.15 days ( $p < 0.005$ ). Polycystic ovary syndrome was the most frequently reported diagnosis (55.73%). Endometriosis was the most reported co-existing illness when more than one diagnosis was reported (57.69%). The most frequently reported symptom was fatigue (53%). There was a risk estimate of 2.17 (95% confidence interval (CI): 0.54, 8.74) of missing work due to menorrhagia and 2.60 (95% CI: 1.31, 5.17) for missing work if diagnosed with endometriosis. Subjects who reported diagnosis at an earlier age were more than two times less likely to miss social events (OR: 2.25; 95% CI: 0.64, 2.71) and work compared to those diagnosed later in life.

**Conclusion:** Pelvic and menstrual disorders had a significant impact on the health-related quality of life of Barbadian women. Symptoms of these disorders were associated with poor health associated outcomes. More research is necessary to elucidate the humanistic and economic impacts of menstrual and pelvic disorders and treatments on patient outcomes.

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**The perceived role of social support in self-management among Barbadians 65 years and older living with Type 2 diabetes mellitus: a qualitative study.**

*J Hinds, H Harewood.*

The University of the West Indies, Cave Hill Campus, Barbados  
Email: jamie.hinds@gmail.com

**Objective:** To examine the perceived role of social support in Type 2 diabetes mellitus (DM) self-management among Barbadians aged 65 years and over.

**Methods:** A qualitative study was done using semi-structured interviews conducted via telephone. Participants were identified via gatekeepers and recruited by the researcher via purposive sampling with maximum variation using inclusion and exclusion criteria. After informed consent was obtained, participants were asked about their experiences with Type 2 DM, its management and social support until data saturation was met. This yielded 12 participants (10 females and 2 males) aged 65–84 years. The researcher filled in contact summary sheets and conducted reflexivity for each interview. Interviews were audio-recorded, transcribed verbatim and coded, and data were analysed by thematic analysis with constant comparison supported by ATLAS.

**Results:** Participants perceived themselves as self-reliant. Although not formally acknowledging a need for or receipt of social support, they described assistance from family, friends and healthcare providers. Participants perceived aspects of social support as facilitators and barriers to self management. Social support which reduced independence and self-management capabilities was perceived negatively. During the COVID-19 pandemic, social support which was resisted by most prior to the pandemic was now accepted as it was a necessity.

**Conclusion:** Incorporation of social support into Type 2 DM self-management by Barbadians aged 65 years and older was threatened by the potentially negative interplay between accepting assistance and maintaining autonomy. Additional research would further clarify facilitators and barriers and determine the preferred social support required generally and during health emergencies such as COVID-19.

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**The attitudes, perceptions and experiences of healthcare professionals towards the use of electronic medical records in public primary healthcare facilities in Barbados: a qualitative study.**

*S Batson-Greaves, H Harewood.*

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## RESEARCH FORUM... *cont'd*

**Objective:** To explore the attitudes, perceptions and experiences of healthcare professionals towards the use of electronic medical records in public primary healthcare facilities (polyclinics) in Barbados.

**Methods:** This qualitative study captured the perspectives of purposively selected participants via semi-structured in depth individual interviews. Data saturation was met at the 12th participant. Individual interviews were audio-recorded, transcribed verbatim, coded and analysed via thematic analysis with constant comparison, supported by ATLAS software.

**Results:** The results revealed that MedData was a multifaceted electronic medical records system which had both positive and negative elements that could influence the delivery of patient care. These positive attributes included having easy access to patient records from any polyclinic, which improves continuity of patient care, and improving workflow, which reduces patient waiting times and increases efficiency. The negative attributes included system characteristics such as the lack of a notification system for priority patients and the difficulty in generating statistical or medical reports. Thus, the participants determined that there were areas for refinement in MedData, which could be leveraged to improve the delivery of patient care and to avoid potential medico-legal implications.

**Conclusion:** The participants' recommendations included the addition of an alerting system for prioritized patients, improvements to the reporting capabilities of the system, provision of continuous training for users as needed, and facilitation of dialogue between the users and the administrators about the management of the system. These results would inform efforts of the Ministry of Health and Wellness, Barbados, to enhance MedData experiences for patients and staff.

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### A study investigating the knowledge, attitudes and practices of pharmacists in Barbados towards generic drugs.

*S Thornhill, H Harewood*

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**Objective:** To estimate the prevalence of generic drugs

prescribed by pharmacists in Barbados and assess their knowledge, attitude and practices regarding generic drugs.

**Methods:** A descriptive cross-sectional study with 168 pharmacists was conducted using an anonymized self-administered paper-based questionnaire distributed to public and private pharmacists randomly selected from the 2018 official gazette list of professionals.

**Results:** The prevalence of pharmacists who frequently dispensed generic drugs was estimated to be 63%. Over 60% of the pharmacists agreed that generic drugs were equivalent to branded drugs, and three-quarters were comfortable substituting generics. Public pharmacists were 1.54 times more likely (confidence interval (CI): 0.98, 2.42;  $p = 0.02$ ) than private pharmacists to agree that generic drug training should be mandatory. Public pharmacists were less likely to attend continuing education sessions. Public pharmacists were five times more likely to dispense more generic drugs with Barbados Drug Service prescription forms compared to private pharmacists (odds ratio = 4.67; CI: 1.12, 19.52;  $p = 0.04$ ).

**Conclusion:** There was a moderate level of acceptance of dispensing generic drugs. There were gaps in knowledge, attitudes and practices of pharmacists in both sectors. Public pharmacists were more supportive of mandatory training. Private pharmacists were less likely to substitute generics. Implementing continuing professional activities for pharmacists could increase generic drug awareness and possibly enhance government's cost-containment strategy.

The BAMP Bulletin would like to thank the authors and West Indian Medical Journal for permitting the above the abstracts to be shared with readers of this issue of the publication. The full abstracts for the 59th Scientific Meeting of CARPHA were published in the West Indian Medical Journal, and the Journal holds the copy-right.

### Reference

CARPHA Public Health Agency 65th Annual Scientific Meeting. West Indian Medical Journal Supplement West Indian Med J 691-96 (Suppl.1) 2021.

## IT'S FINALLY HERE: A CARDIOVASCULAR RISK CALCULATOR FOR CARIBBEAN PEOPLE



**Dr. C.V. Alert**  
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The website says it all. “**HEARTS in the Americas** is an initiative of the countries, led by the Ministries of Health with participation of local stakeholders with the technical cooperation of PAHO. The Initiative seeks to integrate seamlessly and progressively into already existing health delivery services to promote the adoption of global best practices in the prevention and control of cardiovascular diseases (CVD) and improve the performance of the services through better control of high blood pressure and the promotion of secondary prevention with emphasis on the **primary health care** (my emphasis). HEARTS is being implemented and expanded in 16 countries of the region. The HEARTS model will be the model for the cardiovascular disease risk management, including hypertension, diabetes, and dyslipidemias, in primary health care in the Americas by 2025”.

The HEARTS in the Americas initiative launched, on June 21st 2021, ‘CardioCal’, a free a cardiovascular risk calculator that estimates the possible 10 year risk of myocardial infarction, stroke or cardiovascular death in people specifically from individual countries in the Americas, including the English-speaking Caribbean. [Download yours now, on your computer and your smart phone.]

For decades Caribbean countries have battled and are still battling with non-communicable diseases (NCDs), in spite of the distractions offered by COVID-19. [It is noted that with the arrival of COVID-19 our politicians are now referring to these conditions as co-morbidities.] While our hospital beds are saturated, people are losing brains, eyes, hearts, kidneys and lower limbs, the gap between our health care expenditure (even before COVID-19 and our health care needs is increasing almost at warp speed. It has also long

been established that effective primary care offers the option of keeping health care costs down while improving health and preventing disease. A Caribbean-specific calculator is one important tool for primary care workers (and it can even be used by patients themselves) to tackle NCDs.

While a general estimate of the relative risk for CVD can be approximated by counting the number of traditional risk factors (i.e hypertension, diabetes, cigarette smoking, premature family history of CVD, chronic kidney disease, obesity) present in a patient, a more precise estimation of the absolute risk for a first CVD event is desirable when making treatment recommendations for a specific individual with multiple cardiovascular risk factors. This is where cardiovascular risk calculators, also called cardiovascular risk estimators, are most useful.

Periodic risk assessment, i.e. a check-up of the client/patient, offers the opportunity to identify CVD risk factors as well as offer guidance on appropriate management of specific risk factors (e.g. dietary modifications for hypertension or dyslipidemia, etc) and overall CVD risk (e.g. maintaining a healthy diet, regular exercise).

Following CVD risk factor identification and lipid profiles, we can calculate an estimate for 10-year CVD risk using one of the available CVD risk calculators. The new calculator allows for the substitution of body mass index (BMI) for cholesterol levels, recognizing that lipid profiles are less commonly available for many Caribbean patients.

Formal estimates of CVD risk with this epidemiological approach have generally been based on the experience of asymptomatic middle-aged adults 40 years of age or

## COMMENTARY... *cont'd*

older. While all of the risk models have advantages and disadvantages, no single risk model will be appropriate for all patients and physicians are encouraged to use a CVD risk calculator that is appropriate for patient-specific race and ethnic groups and geographic region. Before Cardiocal, there was none for this region.

We should reassess CVD risk every four to six years in patients whose identified 10-year CVD risk is low (< 5 %) or borderline (5 to 7.5%). Cardiovascular disease risk should be assessed more frequently for a patient whose identified 10-year CVD risk is intermediate (7.5 to 19.9 %), or following the identification of a new risk factor(s). The optimal time interval for reassessing risk in patients with intermediate 10-year CVD risk is uncertain. However, once a person reaches a threshold for lifestyle or pharmacologic intervention, the emphasis going forward should be placed on optimization of risk factors for that individual.

For patients with low or very low 10-year CVD risk, particularly for patients from 20 to 59 years of age, we can calculate 30-year (or lifetime) CVD risk. There are separate risk factor calculators for this.

For persons 20 to 39 years of age who are asymptomatic and have no CVD risk factors, we generally do not need to make a formal CVD risk assessment. This primarily relates to the fact that 10-year risk is generally extremely low in these patients and validated risk calculators do not provide risk estimates for patients under 40 years of age. For some persons 20 to 39 years of age, it is often helpful to make informal estimates of the individual's CVD risk to help guide preventive measures.

The following findings were confirmed in meta-analyses and influenced the development of lifetime CVD risk calculators:

- The lifetime risk of CVD increased progressively with the number and intensity of risk factors.
- When compared with those with  $\geq 2$  major risk factors, participants with optimal risk factors had markedly lower lifetime risks of CVD at all age levels.
- The lifetime CVD risk was significantly lower in participants with optimal risk factors compared with those with  $\geq 1$  not optimal risk factor(s).

Identify risk-enhancing factors — beyond the traditional risk factors that have been incorporated into the standard risk calculators, there are additional risk factors that may

significantly alter risk in subsets of patients. Dubbed “risk-enhancing” factors, the presence of one or more of these factors can be very important in informing and shaping the clinician-patient discussion of CVD risk and primary prevention therapies<sup>2</sup>. The identified risk-enhancing factors include:

- Family history of premature atherosclerotic CVD [ASCVD] (men <55 years of age, women <65 years of age);
- Primary hypercholesterolemia;
- Metabolic syndrome;
- Chronic kidney disease with estimated glomerular filtration (eGFR) rate below 60 mL/min/1.73 m<sup>2</sup>
- Chronic inflammatory conditions (e.g. rheumatic diseases, HIV, psoriasis, etc);
- History of premature menopause before age 40 years or pregnancy associated conditions (e.g. preeclampsia);
- High-risk race/ethnicities [This seems to apply to all Afro-Caribbean peoples];
- Lipid abnormalities including elevated lipoprotein(a)  $\geq 50$  mg/dL ( $\geq 125$  nmol/l) or elevated apoB  $\geq 130$  mg/dL [Not easily available here];
- Some specific biomarkers like C-reactive protein (CRP)  $\geq 2$  mg/L and ankle-brachial index (ABI) <0.9.

On the other hand, optimal risk factors include:

- Non- obese patient (male waist circumference < 35 inches female < 30 inches);
- Total cholesterol < 4.7 mmol/L (<180 mg/dl), or LDL cholesterol < 3 mg/dl (< 116 mg/dl);
- Untreated blood pressure <120/80 mmHg;
- Non-smoker;
- No diabetes;
- No alcohol abuse (males < 2 drinks daily, females < 1 drink daily, no binge drinking)

As in any other effort to improve health of Caribbean people, an effort must be made to promote the intervention or it will be left collecting dust in an office somewhere. The current COVID-19 vaccination plan is a case in point- the anti-vaxxers were allowed to get a head-start in getting their messages across, in a wide variety of media, and this stifled the acceptance of genuine health promotion messages. Similarly, Ministries of Health (and Wellness) should aggressively target all primary care workers about the availability and usefulness of this tool if improved health of Caribbean peoples is to be achieved. For too long we

COMMENTARY... *cont'd*

have been lamenting on the negative impact of NCDs on the health and lives of our peoples, and the damage they cause to our economies; now is the time to move away from the 'whatever will be will be' approach. We have a new tool in our tool-box, and we must use it.

The Cardiocal calculator is by no means a done deal. "By 2025, the HEARTS model will be the model for the CVD risk management including hypertension, diabetes, and dyslipidemia in primary health care in the Americas"<sup>1</sup>.

It is hoped the individual countries will include country-specific epidemiology data and country-specific resource inventories to fine tune management of individual patients. As Sir George Alleyne, former Director of PAHO, told the Caribbean Heads of Government in 2005, "mortality rates from NCDs in Caribbean countries are many times higher than in 'first world' countries". This unfortunate scenario persists today, even while COVID-19 siphons off our limited

health resources and endangers the lives of our NCD patients. We must make optimal use of limited resources, using every tool available.

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## DERMATOLOGY NOTES

### CHRONIC LEG ULCERS...JOURNEYING THROUGH THE YEARS



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 dermatologist*

"To have striven, to have made the effort, to have been true to certain ideals ... this alone is worth the struggle "...Sir William Osler.

## Historical Aspects

Chronic leg ulceration of various causes, has been a significant health concern throughout history. The Old Testament of the Bible quotes:

"From the sole of your foot to the top of your head, there is no soundness, only wounds and welts, festering sores, not

cleansed or bandaged or soothed with oil"... Isaiah 1:6

"Jehovah will smite thee in the knees and in the legs with evil ulcers, whereof thou cannot be healed from the sole of thy feet unto the top of thy head." Deut 28:35

Yet it was Hippocrates (460-375 BC), as described in his Corpus Hippocraticum, who first noticed an association between varicose veins and ulceration. He suggested applying various herbs to ulcers and also recommended the use of two layers of bandages on the legs, known as "a double compress", to produce firm compression for ulcer management.

Likewise, Celsus (53 BC-AD 7) advised using compression to alleviate chronic venous ulcers in the form of plasters and linen roller bandages. In addition, he advised of an operation specifically by exposure and then avulsion of the vein in the leg.

However, in those times although alleviation was justified, complete healing was discouraged. This was the result of an



## CME UPDATE... cont'd

Ancient Greek theory popularized by Galen (131-201 AD) that ulcers were due to an accumulation of bad and feculent humours.

Complete healing ran the risk that the acrid humours could accumulate in the body causing serious illness, madness and even death. In fact, ulcers were considered a great means of health - So great was this belief that ulcers were dressed with irritant substances such as roots of gentian so they could flow afresh. If this failed, an issue or ulcer could be created generally by using peas inserted into the wound to keep it open and control the size.

Although several important publications including Andreas Vesalius's *De Humani Corporis Fabrica* in 1543 and William Harvey's *De Motu Cordis* in 1628 challenged many aspects of humoral theory, it remained dominant until the mid-18th century.

In 1676 British surgeon Richard Wiseman, aware of the association of varicose veins and leg ulcers, coined the term "varicose ulcer" and reintroduced the idea of compression in the form of laced stockings. Gradually the concept of the "varicose ulcer" became firmly established and by the middle of the 19th century few surgeons doubted that varicose veins caused leg ulcers.

The varicosities were treated by various methods including: ligation, application of caustic substances to the overlying skin, puncturing and severing the vein.

In 1868, John Gay published in the *Lancet* a novel approach to leg ulcers stating that ulceration was not a direct consequence of varicosity but of other conditions within the venous system, thus coining the term venous ulcer.

In 1916, John Homans highlighted the significance of deep venous thrombosis for ulceration and later Limon (1938) and Cockett (1953) drew attention to the incompetence of the communicating veins as a potential cause, thus forming the basis for present day theories of venous leg ulcer pathogenesis.

### Pathophysiology

Typically, contraction of large muscles of the leg, namely the gastrocnemius and soleus, helps to return blood to the heart by 3 sets of veins:

- Deep veins

- Superficial veins
- Intercommunicating/perforators



There is a microcirculation and macrocirculation system (Fig 1)

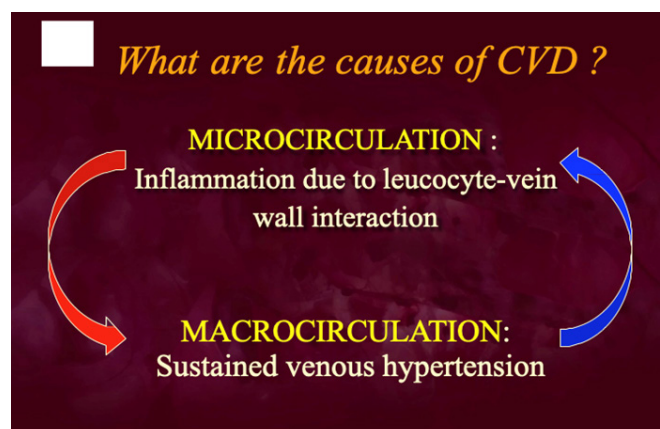
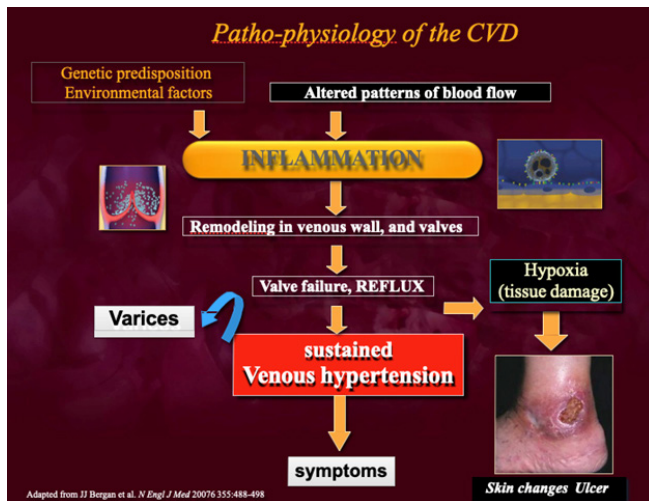


Fig 1 Relationship between microcirculation and macrocirculation systems

Valves in the veins allow the blood to flow uni-directionally, preventing blood from returning in a downward direction or pooling.



## CME UPDATE... cont'd



However, as seen in Fig. (2), altered patterns of blood flow or venous stasis can occur in many conditions and this ultimately can lead to venous hypertension. Venous hypertension is associated with distension and elongation of capillary loops, remodeling in the venous wall and with this fibrinogen can leak into surrounding tissues through widened endothelial pores. Fibrin is also laid down in the capillaries, forming a "cuff" which limits diffusion of oxygen/nutrients to the skin and lymphocytes, during periods of stasis and can further accumulate, plug capillaries and contribute to local ischemia. Sustained venous hypertension can lead to clinical symptoms such as: gravitational/stasis eczema, edema, inflammation, induration, ulceration, fibrosis and calcification.

### Causes

Certain factors, both genetic and environmental, increase a patient's risk of developing venous stasis. Causes include, but are not limited to:

- Venous thrombosis – risk of such is increased with e.g. immobility, OCP use and Factor V Leiden mutation- which occurs in 5% of population and is associated with increased DVT x 5.
- Absent valves – dominantly inherited.
- Muscle disease – which can be neuromuscular as well as disuse atrophy with severe arthritis.
- Other risk factors include: elevated BMI, female, lower socioeconomic groups, previous trauma.

### History/Presentation

As mentioned, there are many different risk factors and underlying causes that can result in venous hypertension and chronic venous ulcers. An underlying history of trauma

frequently triggers the nonhealing venous ulcer, occurring insidiously over many years. However it is important to rule in or out deep vein thrombosis (DVT) as most events of DVT are silent, with a possible family history and episodes of leg immobilization.

Also note a history of pitting and/or nonpitting edema in which the leg swelling does not usually respond to diuretics, and it must be highlighted that pain or painless ulcers maybe associated with night cramps.

### Clinical Features

**Cutaneous lesions:** The earliest is soft tissue tenderness even with normal appearing skin. Soft tissue injury that precedes ulcerations can begin in the subcutaneous tissue and visible changes may not appear for some time.

Frequently one notes pigmentation - the appearance of discrete brown macules due to hemosiderin deposition, stasis purpura and melanin deposition following inflammation. These are petechial lesions like "cayenne pepper" sprinkled about the gaiter area. Hemoglobin breaks down with iron remaining in the skin as hemosiderin, resulting in impressive discoloration. Notedly with this, capillaritis can occur due to hemosiderin following extravasation of RBC with pericapillary inflammatory changes.

**Edema:** Swelling occurs especially when venous hypertension is aggravated by medical conditions eg CCF.

**Stasis Dermatitis:** Erythema, scaling, pruritus, erosions, oozing, crusting and occasional vesicles may occur at any stage. This is typically at medial supramalleolar region where microangiopathy is most intense, It can also be associated with eczema, particularly itchy, red, scaly patches.

Overtime, lichenification may occur with 58-86% of patients developing allergic contact sensitization to topical therapy. In particular, dermatitis medicamentosa can occur, associated typically with: lanolin, parabens, anesthetics, rubber from elastic stockings, antibiotics, especially: neomycin, soframycin, framycin and gentamycin, - whereas topical tetracycline is usually safe. There can also be an auto-sensitisation reaction on face, neck and arms or contact allergic reaction elsewhere on the body.

Pseudo-Kaposi's sarcoma occurs with exaggerated stasis dermatitis, presenting as well-defined purple plaques due

## CME UPDATE... cont'd

to increased number of thick-walled vessels lined by plump endothelial cells with extravasation of RBC and deposition of haemosiderin.

**Lipodermatosclerosis:** *Sclerosing panniculitis, hypodermatitis sclerodermiformis*

Pliable subcutaneous fat is gradually replaced by fibrosis and the skin feels indurated. This fibrosing panniculitis is characterized by bound-down indurated plaques that begins at the medial ankle and extends circumferentially around the entire leg causing constrictive strangulation of venous and lymphatic flow. This is pathognomonic of venous and lymphatic hypertension due to increased matrix turnover caused by a chronic inflammatory reaction in response to escaped plasma constituents and increased risk of leg ulcer. Brawny edema is present above and below the plaques, resulting in the classical "Upside down champagne bottle" sign.

This indurated, woody sclerodermatous "inverted champagne bottle", leads to fixation of ankle joint and limitation of the muscle pump.

**Varicose veins:** These are common, increase with age and are especially noticeable on standing with smaller ones on dorsum of foot or ankle. They are usually asymptomatic but aching, cramping, itch, fatigue, swelling can occur with discomfort on prolonged standing. Superficial varicosities are referred to as thread veins.

**Venous flare:** Occurs with tortuous dilated veins around ankles.



**Atrophie blanche:** *Livedo vasculitis/ segmental hyalinizing vasculitis.*

This is skin over areas of fibrosis, which are porcelain white plaques and atrophic with surrounding hyperpigmentation and telangiectasis.

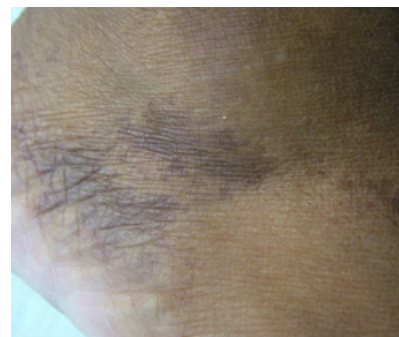
This is also associated with disorders of coagulation or autoimmune disease. Occasionally acute inflammation leads to acute septal panniculitis.

**Ulcer:** This is the final sign of cutaneous malnutrition/ breakdown of epithelium, which can be caused by minor injury or infection. Ulcers typically are located over the gaiter area (but anywhere below knees) - usually on the lower 1/3 of the medial malleolus, but can be lateral, and are usually tender/ shallow/ irregular/ red based or yellow slough. Small ones maybe painful and larger ones painless.



### Progression

**Pitting edema:** is particularly worse at the end of the day and usually disappears at night, described as a tight feeling in the edematous leg with night cramps. The capillary filtration rate increases as a consequence of the increased ambulatory venous and consequently capillary pressure which overwhelms lymphatic drainage. The edema has low protein content and pits easily mainly present around the ankle.



## CME UPDATE... cont'd

*Corona phlebectatica paraplantaris:*

Ankle flare: This is an early sign and is a direct consequence of increased capillary causes the vessels to expand.

Pressure erythema: This is one of the first signs of evolving chronic venous insufficiency as there is increased capillary pressure and grouped confluent very small telangiectasae develop often near incompetent perforating veins.

**Eczema:** 1: Statis dermatitis hypostatic eczema, venous eczema; dermatitis veineuse, starts around varicosities at the medial ankle in the region of Cockett perforating veins in the lower 1/3 of the leg relatively sharply demarcated, sometimes interspersed with papules and vesicles which may extend beyond the main area of eczematous skin. Scaling and itching develop causing lichenification.

- 2: Asteototic dermatitis (eczema craquele - crazy pavement) associated with frequent washing of the skin causing extreme dehydration of the skin.
- 3: Impetiginization of eczematous dermatitis, wet eczema is often colonized with bacteria yeast fungi.
- 4: Secondary spread (id eruption auto sensitization eczema) itching and spread elsewhere on the body including palms, soles.

**Complications**

Further complications also include: recurrent ulcerations, open wound infections, generalized dermatitis which may occur due to Id reaction and rarely exfoliative erythroderma, further predisposition to thrombi, and permanent changes as previously mentioned: hemosiderosis; fibrosis, loss of valvular function.

All patients with advanced venous disease have some degree of lymphatic impairment resulting in verrucous changes and cutaneous hypertrophy referred to as Elephantiasis nostra verrucosa.

**Management**

There are many different aspects of management of chronic venous ulcers. The most essential are the application of 30-40mmHg pressure compression bandages. They tend to heal in 6 months, 50% or more in one year. Failure to heal can be dependent on being: large in size, long in duration, having a previous history of: venous ligation stripping and/or hip/

knee replacement, poor mobility, calf pump dysfunction, risk of DVT, Ankle brachial index < 0.8, and presence of fibrin on wound surface.

However other conservative measures to implement include: rest and elevation of leg to 12 in (30cm) above the level of the hip, local removal of debris, cleaning agents and other foreign bodies e.g. maggots, further absorbent dressings also help to soak up exudates in a moist environment, as well as exercise, diet and full medical examination including measurements and Duplex/Doppler ultrasound for assessments and progress.

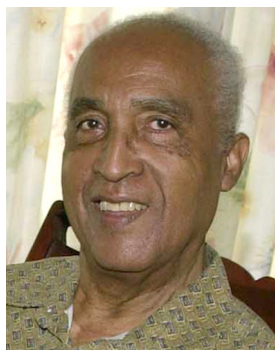
Other aspects of management include treatment of progression and complications e.g. treatment of eczema, utilizing patch test to diagnose allergic contact dermatitis, and treatment of infection/ cellulitis.

Furthermore, there have been recent surgical options such as: skin grafting split skin; tissue engineered (Type 1 bovine collagen cultured allogeneic cells) keratinocytes fibroblast from human neonatal foreskin; sclerotherapy - recently using foam; tools for virtual dissection; 3D reconstruction by volume rendering and display by QuickTime VR as well as virtual travel inside the foot and leg in stereovision.

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## PHYSICIANS IN HISTORY

# DISTINGUISHED BARBADIAN DOCTORS IN HISTORY, NO.1 DR. SIR FRANK RAMSEY, WHO ELIMINATED INFANT MALNUTRITION IN BARBADOS



by **Professor Emeritus  
Sir Henry Fraser**

One of the great pioneers of health care in Barbados was Dr. Sir Frank Ramsey. He revolutionised the feeding of infants in Barbados, and eliminated malnutrition in ten years of dedicated, pioneering work.

Frank Cuthbert Ramsey was born in Bay Street on August 21st, 1926, in a period that has been described as a ferment of political conscience raising. Clement Inniss, Clennell Wickham, Dr. Charles Duncan O'Neal and others were publishing and preaching against the oligarchy, and young Frank was a bright schoolboy, alert of what was going on in Bridgetown.

He was the son of Gilpin and Meta Ramsey, who lived next door to the home of the Graham family; Mr. Graham was a shipwright and the father of Sir Albert "Bertie" Graham. Amazingly, these two childhood neighbours and friends would become the pioneering paediatricians preserving the health and lives of thousands of Barbadian children for almost forty years, and teaching hundreds of medical students, nurses and younger paediatricians.

Frank attended the now tragically demolished St. Mary's Boys' School from 1931 until at the age of 10, he won a Vestry Exhibition to Combermere School. After three years there, his ambition to study science was achieved by winning an Armstrong Scholarship to Harrison College in 1939, at 13. This was literally the other side of the fence from Combermere.

At Harrison's he joined the class of contemporaries Clifford Husbands, Noel and Algy Symmonds, Eric Bishop, Clyde

Walcott and other Bajan greats. He excelled at cricket and academically, became Head Boy in 1945, and won a Colonial Development and Welfare Scholarship in 1946. This took him to London, to King's College and King's College Hospital, where he graduated in medicine in 1952.

He returned to the West Indies after interning at King's College Hospital and getting married to Jean Seegobin, a beautiful and charming Trinidadian graduate nurse whom he met in London. He was a rotating house officer from 1935-54 at the new University College Hospital of the West Indies in Jamaica soon after it opened.

He came home to the Barbados General Hospital the following year, as a Medical Officer, at a time when conditions were still very basic if not primitive, and the Queen Elizabeth Hospital was still nothing but a dream and a promise. It was the era of several malnourished infants in one bed. Sir Frank wrote in his autobiography how Dr. Humby called in an Advocate photographer and the resulting report in the paper led to the dismissal of Dr. Humby. Let us hope that doctors speaking the truth will not be fired in today's world, although I know it still happens in some countries.

In 1955, Dr. Ramsey boldly established a general practice at the historic house Rus in Urbe on Crumpton Street, while continuing to work as a visiting medical officer at the hospital.

In 1961, he returned to the University Hospital on a Commonwealth Scholarship, for experience in paediatrics and then went on to the world famous Hospital for Sick Children at Great Ormond Street in London. He obtained the Diploma in Child Health, and after a year in Scotland obtained the M.R.C.P., followed by a post at the state-of-the-art Hammersmith Hospital and Royal Postgraduate Medical School in London, my own alma mater for specialty training and my PhD.

After further specialty experience as Senior Registrar in Paediatrics at the University Hospital once more, he returned home to the new Queen Elizabeth Hospital in 1965 as consultant paediatrician.

*PHYSICIANS IN HISTORY... cont'd*

By this time his passion was the distressing challenge of infant malnutrition, which was exceedingly high in Barbados. With a Macy Foundation grant he established the ground-breaking, visionary National Nutrition Centre in 1972, as director. Unfortunately, the Centre was built on the Martindale Road and Delaware Swamp lands, and by the time Sir Frank retired it was splitting in two and eventually had to be demolished! It was relocated to a site in Ladymeade Gardens, near to the Winston Scott Polyclinic, where it continues a general educational and counselling role.

Sir Frank's huge contribution to the nations' health was the work of his National Nutrition Centre. His team of nutritionists and nurse visitors transmogrified infant nutrition from a scandalous state of poor practices and a shockingly high rate of malnutrition, both marasmus or calorie deficiency and kwashiorkor or protein deficiency syndrome, to a great public health success story.

In less than ten years, his approach of education at all levels of the community and the health care profession eliminated the problem. His team of nurses were in fact dedicated nurse educators, and they created trust across all communities. He collaborated with researchers at Harvard University, with joint publications on the impact of infant malnutrition on development.

He organised the first National Health and Nutrition Survey of Barbados in 1978, with which I assisted. He also organised our first national nutrition conference, in July of 1978, during which the threat of the obesity related chronic non-communicable diseases was emphasised for the first time.

Sir Frank accepted many leadership roles – including Associate Dean of our Faculty of Medicine at the UWI, Cave Hill and Queen Elizabeth Hospital; Chairman of the Child Care Board from 1972-73 and 1976-81; and Director of the National Health Service Board, from 1984 to 1986. During this period the Drug Benefit Service, a model programme for providing essential drugs, was initiated and served as a PAHO model for the region.

He was also Chairman of the Royal Commonwealth Society, Barbados Branch, a President of Rotary Club of Barbados, Founding Member of the Barbados Children's Trust and a Justice of the Peace. He never stopped working.

His publications include academic papers on malnutrition, and he is widely published in journals of paediatrics,

nutrition, psychology and psychiatry. He has also written two books: Protein-Energy Malnutrition in Barbados. and Sir Frank Ramsey – a Life of Service. And working with Sir Maurice Byer, he developed the green vaccination card for the childhood vaccinations that saved so many lives. If only he were here today to sway those rebels, hesitants and sceptics.

He received many honours and awards, including PAHO Public Health Hero in 2002, and a knighthood in 2007, for his outstanding contributions in medicine, public health and nutrition. He is survived by his wife and four children, including Geoffrey Ramsey, well known consultant planner, project manager, and landscape architect.

Sir Frank was a giant among his peers, and while abolishing malnutrition, he warned Bajans of the dangers of over-nutrition and obesity. The warning was ignored and so we pay the price now!



## BAMP STATEMENT- COVID-19

# BARBADOS ASSOCIATION OF MEDICAL PRACTITIONERS (BAMP) STATEMENT ON THE INCREASED INCIDENCE OF COVID-19 AND HEALTH MISINFORMATION.

COVID-19 has been in the phase of community transmission since February 2021, but the high transmissibility of the delta variant means that greater numbers of persons are now being affected, as predicted by the University of the West Indies models. Recent efforts to mitigate disease spread have included tightening of curfew restrictions, some reduction of indoor gathering and reinforcing mask-wearing, hand sanitisation and physical distancing.

Vaccination is a key means of reducing transmission of the virus, however, we are keen to point out that a person is not considered to be maximally protected by vaccination until two weeks after the second dose. Therefore, we must play 'catch-up', as the rate of spread of the more transmissible variants is well ahead of the rate of double vaccination.

Whilst every effort to encourage vaccination must continue, we must be careful not to polarise the population into vaccinated versus unvaccinated, but seek to research and quickly understand and address the underlying reasons for the ongoing vaccine hesitancy in the wider society. Whilst these efforts are ongoing, we reiterate the call for consideration of a policy-driven mandate for vaccination of healthcare workers, which already has a precedent in practice. We believe that our weak, sick and elderly population must be protected when seeking care from healthcare providers.

The tying of the lifting of social restrictions to the administration of an absolute number of vaccine doses should not be the only method used to determine whether or not we are doing enough to reduce the numbers becoming infected. Re-evaluation of set public health measures, after two weeks, should take into account many other factors, including the reporting of the true positivity rate in the community, which may be achieved by deducting those PCR tests done by travellers from the denominator. There is also a need to continue to consider the reporting of cumulative incidence, as a trigger for assessing the need for intensification of public health interventions. BAMP also continues to call for regular reporting of COVID variants through surveillance of community swabs and genetic sequencing.

In widespread community transmission, efforts at contact tracing are quickly overwhelmed. Therefore, a strategic plan for community surveillance with an educational campaign that clearly enunciates the policy-driven rationale for regular

testing of frontline workers, hotspots and those in government institutions, should be urgently instituted.

We are currently witnessing the progressive dwindling of limited human and physical health resources. Rationalisation of services that can be safely offered at public health institutions, including the Queen Elizabeth Hospital, is now a priority and patients must receive clear guidance for their next steps, lest we create a tsunami of NCDs and unintended consequences.

Finally, we must look at the dangerous misinformation being spread on the internet and on social media. Those who seek to denigrate the tireless and unstinting efforts of the healthcare workers of Barbados, should be ashamed of themselves. Our death rates have remained low because of the quality and excellence of the Barbadian health care system and the wonderful professionals who work within it.

BAMP salutes every public health practitioner, doctor, nurse, maid, pharmacist, orderly, clerk, administrative official and general worker in our health system, particularly those at the QEH, Harrisons Point, other Isolation Centres and Polyclinics. Medicine is a noble and time-honoured profession worthy of societal respect and our doctors and nurses are second to none. We will not sit idly by while persons of no repute slander our distinguished medical professionals, and we ask these cowards, who hide behind the relative safety and anonymity of the internet, to immediately cease and desist and think about the damage that they are causing to society as a whole. To our medical professionals, we advise you to ignore the detractors and fight on, continue to do all you can in the face of this deadly enemy called COVID-19. Always remember why you chose to care and the many patients and relatives who are thankful that their lives have been touched and enriched by all you do.

BAMP believes it is time for the Barbadian government and regional governments to look collectively at the dangers of health misinformation as a threat to public health that is as dangerous as the COVID-19 pandemic. We must consider taking steps to enact legislation that will prohibit people from making false and misleading health claims in any form of media, without providing extensive supporting evidence.

**Lynda Williams**  
President, BAMP  
For BAMP COVID-19 Task Force



## BAMP COUNCIL 2021-2022

NAME	TITLE
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Dr Natasha Sobers	3rd Floor member
Dr Adrian Waterman	4th Floor Member

## NOTICES

The Ministry of Health and Wellness and the COVID-19 Vaccination Unit are asking for volunteers to urgently assist with clinical support at vaccination sites across the island over the upcoming weeks.

This is likely to be a sustained effort which is occurring on the background of community transmission of the delta variant in Barbados. Doctors are needed at community vaccination sites and this may include some after hours times (4-7 pm) and weekends. Your support is greatly appreciated.

Please email BAMP at [info@bamp.org.bb](mailto:info@bamp.org.bb) and leave your name and address, stating ***Volunteer for Community Vaccination*** in the heading. Your name will be shared and will be contacted with regards to scheduling.

## INSTRUCTIONS TO AUTHORS

### INSTRUCTIONS TO AUTHORS

The BAMP Journal is a publication of the Barbados Association of Medical Practitioners (BAMP). It is now effectively approaching its fifth decade of publication, having replaced the initial Newsletter of the Association, whose publication commenced in 1976.

The Editor is assisted by members of an Editorial Committee, chaired by the Public Relations Officer of BAMP Council, and is comprised of a cross section of BAMP membership, from Professor Emeritus to medical resident.

There is also an Advisory Board of seven senior members of the profession and since the beginning of 2011, with the publication of the Journal, submitted papers are peer reviewed, usually by members of the Advisory Board, or other local specialists in the relevant area. Expansion of the Advisory Board and of our reviewers to include international experts is planned.

Manuscripts should be clear, concise, accurate, and where appropriate, evidence-based, but written, in the words of the Royal College of Physicians, "with a style that retains the warmth, excitement and colour of clinical and medical sciences". Content may range from letters to the editor and clinical case reports to short Commentary articles, clinical or epidemiological studies, CME review articles or historical articles. Good items of medical humour are accepted, and quality photographs or paintings may be submitted to adorn the cover, which will have the new, dramatic masthead above a photograph or painting. Historic photos, are welcome.

Authors are asked to indicate with their submission any competing interest, including any funding for a study. They are asked to submit in Word, to edit their work carefully, and to provide full name and qualifications, address (email address optional), a word count, a portrait photograph.

References should be indicated in the text with an Arabic numeral in superscript and not bracketed e.g.<sup>1</sup> or <sup>6,7</sup>, numbered in order of appearance and listed at the end, using the style of "Uniform Requirements" in the New England Journal of Medicine and as referenced here: (New Engl J Med 1997; 336: 309-15).

They should give the names of up to four authors. If more than four, they should give the first three followed by et al. The title should be followed by the journal title (abbreviated as in Index Medicus), year of publication, volume number, first and last pages. References to books should give the names of authors (&/or editors), title, place of publication and publisher, and year of publication.

References should be not more than 10 in number.

Other examples, taken from the instructions in the Journal of the Royal College of Physicians, are:

1. Abbasi K, Smith R. No more free lunches. BMJ 2003;326:1155-6.
2. Hewitt P. Trust, assurance and safety – the regulation of health professionals in the 21st century. London: Stationery Office, 2007. [www.officialdocuments.gov.uk/document/cm70/7013/7013.pdf](http://www.officialdocuments.gov.uk/document/cm70/7013/7013.pdf).

Accuracy of references is the responsibility of the author.

Photographs and illustrations should be submitted as separate attachments and not embedded in the text.

Submission of an article implies that it represents original work or writing and is not submitted elsewhere.

Relevant articles of interest that have been published elsewhere may be accepted if clearance is obtained from the first journal and republication is stated, or may be abstracted for airing in the BAMP Journal, with appropriate reference.

Articles, letters and all items should be submitted to BAMP Office ([info@bamp.org.bb](mailto:info@bamp.org.bb)).

# BAMP

JOURNAL



BARBADOS ASSOCIATION OF MEDICAL PRACTITIONERS JOURNAL