Making A Difference: The Kenya Program

Richard Jackson, PT, OCS[1]
Shala Cunningham, PT, DPT, PhD, OCS, FAAOMPT[2]
Daniel Kangutu, PT, MSc, HDOMT[3]
Martin Otieno Ong'wen, PT, HDOMT[4]
Anna Jackson[5]

[1]President Jackson Clinics Foundation Inc., President Jackson Clinics, LP, Middleburg, VA
[2]Assistant Professor, Doctor of Physical Therapy Program, Radford University, Roanoke, VA
[3]HOD Physiotherapy Department, Kenya Medical Training College
[4]Mentor, Jackson Clinics Foundation
[5]Vice President Jackson Clinics Foundation, Vice President Jackson Clinics, LP, Middleburg, VA

THE BEGINNING: RICHARD JACKSON, PT, OCS

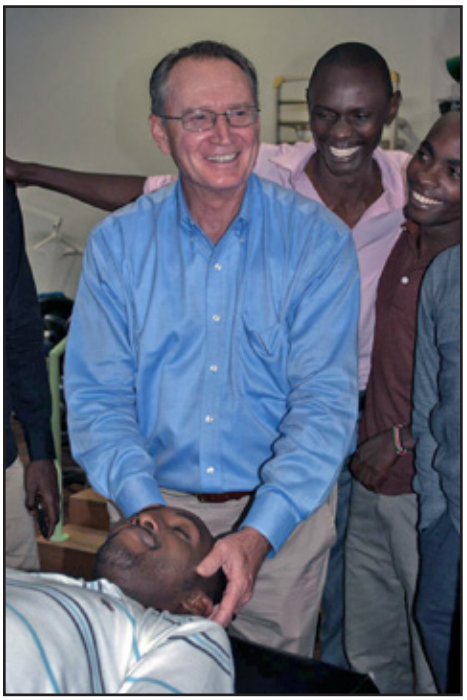
It is hard to say just when the Kenya project started. Maybe 40 years ago when I spent two years there as a Peace Corps volunteer. I taught physical therapy at Kenya Medical Training College (KMTC) in Nairobi. The relationships that were formed at that time continue to have a positive influence on today's activities.

Anna Jackson, my wife and business partner, and I have spent a number of years building a multi-office practice. When we arrived at a point where we could think of more than business survival, we decided to look at creative ways to develop our staff. What experience could we create that would give them a vehicle to serve others and simultaneously make significant changes in their view of the world and their role in it? We decided to create an international volunteer experience in a developing country for our clinical staff. We wanted to help them develop and flourish in this world and in the profession while serving others internationally. We also wanted to do something of long term, sustainable benefit for physical therapists in a developing country and through them to affect positive change in that country's health care. We believe strongly that "*when you find your way in this world, help others to find theirs.*"

There was a bit of serendipity regarding the Kenya project. It began with a chance meeting at the World Congress of Physical Therapy (WCPT) conference in Amsterdam in 2011. I met a physiotherapist who was one of my students at KMTC almost 35 years earlier. He invited us to Nairobi to see if we could help in the development of a Bachelor of Science (BSc) upgrade for the diploma holders in Kenya. Kenyan physiotherapists go to school for 3 years right out of high school and receive a diploma, not a bachelor's degree. The WCPT has deemed that the minimum standard of education for a physical therapist is the BSc degree.

During our first meeting in Nairobi with administrators at KMTC, we determined that the process of upgrading a Kenyan diploma through an American University was expensive and laborious and did not necessarily teach physiotherapists to be better clinicians. The Kenyans emphasized that if they could not get an American BSc, they would like a program that upgraded their skills and education. We decided to work on the BSc upgrade later and within the Kenyan educational system. Before the first meeting concluded, we developed the construct for an 18-month Orthopedic Residency Program with an emphasis on Orthopedic Manual Therapy (OMT). Classes would be two weeks long taught by American educators. We would send a lead teacher and a teaching assistant for each class. Classes would be held every 3 months and cover 6 areas of orthopedic study: Clinical Reasoning, Cervical/thoracic, Lumbopelvic, Shoulder/arm/hand, Knee/hip, Foot/ankle. KMTC agreed to grant a Higher (Advanced) Diploma to our OMT graduates. In addition, we would send clinical mentors to teach our students during their regular patient care. Each cohort consisted of approximately 20 Kenyan physiotherapists. We decided to have 2 to 3 cohorts running each year. The program launched in 2012. Finally, during the first two years we identified Kenyans who would begin as teaching assistants; they were projected to take over teaching duties by 2018. They would need to become faculty members at KMTC so discussions were started early in how to embed this program into KMTC and how budgeting would be handled.

We accomplished a lot in those first meetings. Normally it would take a lot longer to get so much done but the structure of The Jackson Clinics Foundation allowed us to make decisions without consulting an administrative board or committee. We are essentially self-funded and Anna and I are the only two officers in the Foundation. Our



Richard Jackson and students.

experience in Kenya and Ethiopia points out important lessons that we have learned in developing foreign-based programs. First, time with decision makers in the country is limited. This fact required us to be able to make decisions and even improvise quickly. It is nearly impossible to get effective communication when you are separated by 8,000 miles. Second, it is essential to have your resources in order. Financial strength is a critical component to program development. Developing countries do not have resources to spend without going through the next budget cycle. A primary advantage we have had is that our programs have had minimal cost to the schools we have worked in. We do expect some contribution on their end, such as housing, but the primary costs have been shouldered by our Foundation.

It was essential at the outset to know who

all of the stakeholders were. It took subsequent trips to meet with everyone but it was necessary. This took us to various levels of administration from faculty to ministry governance.

Once the project was outlined, a Memorandum of Understanding (MOU) was drafted and signed by all involved. This document clearly outlined who was responsible for what. In Kenya, KMTC agreed to supply housing, teaching space, and class recruitment. The Head of the Physiotherapy Department (HOD) would be the coordinator on the ground. KMTC also agreed to grant a Higher Diploma to graduates. They agreed to supply in-country transportation. The Jackson Clinics Foundation (TJCF) agreed to recruit and transport teachers, assistant teachers, and mentors. TJCF was responsible for curriculum development, tracking attendance and grades, and all necessary testing. An MOU is a guideline and is built on trust. There are no legal "teeth" in an MOU.

When we established our foundation, it was necessary to determine our mission, vision, philosophy, and goals. Goals needed to be specific and clearly indicate the objectives of each goal. The completion requirements of participants had to be defined. The "endgame" had to be determined. Projects need to have a beginning ***and*** an end. We feel strongly that the end must be clearly sustainable or there is no point in beginning. We planned months in advance and realized that good outcomes can take years. We were prepared for the long run, which meant clear expectations of our own financial commitments.

When we launched in 2012, we planned forward a number of years in advance. That included our own trips, at least 4 per year, to meet with stakeholders and students to ensure that everything was running smoothly. Programs fail when organizers are not on the ground tending to details. In addition to the above, curriculums needed to be developed and teachers needed to be recruited. There was a lot of up front work to be completed and Ben Keeton, PT, DPT, our Director of Clinic Operations, did most of this. Classes needed to be scheduled, mentors needed to be scheduled, and volunteers needed to be oriented to the country and program.

We learned something important at first contact with our Kenyan and Ethiopian students. They have consistently demonstrated a high degree of intellect and an impressive enthusiasm for learning. We realized that what was lacking was access to new ideas. The internet is still hard to come by and the internet does not teach an organized, programmed didactic and manual skills education. This was true for Kenya and Ethiopia. Access was all they needed to soar in their profession. They do spend their lean resources on tuition to participate in the program. Student tuition pays the teacher's accommodations. This is a hardship for them but it also makes them personally invested. Some students are sponsored by their employers. All students have to commit 8 weeks a year to attend courses. This effectively eliminates any personal leave they may accrue. For at least half of the students this involves long journeys to Nairobi, finding housing, and being away from family. The program is expensive for them and requires numerous sacrifices. They gladly do this for the education they receive. I cannot express how grateful our students are for anything that is done for them. It is safe to say that their enthusiasm and commitment has a profound effect on our volunteers.

A key component to success has been the volunteers who have travelled on their own time to freely give of their education and skills. Without volunteers, there would not be a project. Many people have gone multiple times, often to both countries. The number of heroes in our program is too long to list here. The personal effect on our staff members has been transformational, giving them a new view on their role in this world, and new understandings regarding wealth and poverty. This has had a very positive effect on our core business. A special thanks goes to Shala Cunningham who has repeatedly travelled to Kenya to study our program outcomes. Finally, the Head of Department at the Physiotherapy school at KMTC, Daniel Kangutu Muli, has shouldered the administrative burden of starting this new program without reimbursement and without complaint. He is committed to the advancement of the profession in Kenya. I doubt that any project like this can survive without a person "on the ground" who is committed to the success of the program.

We have just started our seventh cohort, and this year, 100% of the courses are taught by Kenyans. TJCF is sending university professors from the United States to monitor the classes and to help educate the Kenyan teachers in teaching methodology. The curriculum and course syllabus and schedules are preprogrammed. KMTC has hired one full time teacher for the program and will hire a second soon. We have hired a Kenyan full-time to mentor students and graduates who do not live in Nairobi. Mentorship is a key to the success of any residency and it seemed that the only way to get the people who live in the countryside mentored was to hire someone to do it. This is something that will need to be taken over by KMTC in 2019. Finally, we have recently launched a program to teach all of the other core subjects in physical therapy that are now being taught by University professors from the United States. The future of our foundation in Nairobi will be outlined by Anna Jackson later in this paper.

Daniel Kangutu and Richard Jackson.

PROGRAM OUTCOMES: SHALA CUNNINGHAM, PT, DPT, PHD, OCS, FAAOMPT

In order to assess if the goals of the program were being met, evidence-based outcome measurement became essential. A combination of quantitative and qualitative measures were used to perform the educational program evaluation. The assessment included both learning outcomes and the participants' perceptions. Three participant goals were chosen for the primary assessment. The goals included higher diploma graduates will (1) demonstrate the ability to examine and evaluate patients, arrive at a physical therapy diagnosis, determine prognosis, and develop interventions for patients according to the APTA Description of Specialty Practice Orthopaedics, (2) report professional development and career advancement, and (3) achieve improvements in patient outcomes. In addition, barriers and facilitators for participation in the program were explored to allow for ongoing adaptations to the provision of the education to support student success.

To examine the OMT program's influence on clinical reasoning development, a pre- and post-test design was used to compare the clinical reasoning skills of residents at the initiation of the residency program and following completion of the residency program. Similar to residency programs in the United States, a live patient examination was used as a clinical performance evaluation. Furthermore, interviews of the participants explored the clinical reasoning process used during the live patient examination. The use of both an objective assessment and interview allowed for the evaluation of perceptible and imperceptible elements of clinical reasoning. Perceptible elements of clinical reasoning include the interaction of the therapist with the patient and the performance of tests and measures to determine a patient's impairments. Imperceptible elements include the therapist's rationale for the choice of objective measurements and the development of hypothetical diagnoses.

To examine the perceptible elements, a live patient examination assessment tool was developed using two rounds of data collection for the determination of the tool's validity and 3 rounds of data collection for determination of interrater reliability. The assessment tool was derived from the practice dimensions of the DSP Orthopaedics and used the format of the Assessment Tool for Physical Therapists: Orthopaedics provided by the American Board of Physical Therapy Specialties. The final tool included 64 items with 3 levels of scoring: unsatisfactory performance, satisfactory performance, and not applicable. Not applicable was used when the assessment or treatment was not appropriate for the patient presentation. Categories on the assessment tool included examination, evaluation, diagnosis, prognosis, and intervention. Following the live patient examination, semi-structured individual interviews with the residents explored how the resident determined the hypothetical diagnosis and the reasoning for the intervention provided.

Residents also completed a professional development and career advancement survey. The survey was based on a questionnaire created by Smith et al and Jones et al to determine the impact of residency education on the professional development of residents in the United States. The survey was adapted for the Kenya residency program to assist with the interpretation of items by the residents. The adapted survey included demographic information and 19 items related to the residents' professional development and career advancement. The survey used a 5-point Likert scale ranging from major positive to major negative. Cronbach's alpha for the questions regarding professional development was 0.864 and 0.712 for the questions regarding career advancement.

Interviews with the residents sought to explore barriers and facilitators for completion of the program. Furthermore, past graduates and their employers were interviewed to explore the influence of residency training on clinical practice. The semi-structured interviews were performed by an investigator not associated with the program's administration to limit bias. The phenomenology approach was used to analyze the data. Information from the interviews was coded and general themes identified by the primary investigator. NVivo for Mac was used to arrange codes. Thick descriptions and narratives of the participants were provided to inform the themes. To ensure credibility of the themes, member checks were also performed.

The results of each of the outcomes were triangulated to provide an overall assessment of the program. There has been a significant improvement in the residents' clinical reasoning development from the initiation of the program until the completion of the program. During the final live patient examination, residents collected additional cues (subjective and objective) to guide their hypothetical diagnosis and interventions based on the patients impairments. Residents collected an average of 36.1% of the available cues in the history and examination at the initiation of the program. At graduation, the residents assessed 81.3% of available cues. Furthermore, residents demonstrated a significant improvement in the ability to identify relevant data, prioritization of limitations, development of a hypothetical diagnosis, screening for medical referral, and selection of the intervention approach. This is directly related to cue interpretation and hypothesis generation within the hypothetical-deductive reasoning model. During the interviews, the residents discussed using a combination of hypothetical deductive reasoning and narrative reasoning to determine a hypothetical diagnosis and develop a treatment plan that is consistent with the patient's explanatory model for the pathology. This enabled the resident to value all of the patient's symptoms and not the tissue response to testing alone.

On the surveys, residents noted improvements in professional development and career advancement similar to residents in the United States with a positive influence of the residency program on the ability to use a logical clinical reasoning process, perform a systematic clinical examination, determine the nature of the patient problem, diagnose complex patients, treat effectively to achieve projected outcomes, treat in a time efficient manner, and perform overall patient management. Dissimilarly to residents in the United States, the Kenyan residents have not consistently seen an improvement in salary and contributions to research have been limited to the use of evidence-based practice. During the interviews, residents noted that the residency training was not accepted as formal advanced training, therefore, promotions and increases in salary were not available within the current pay structure based on highest degree earned.

Past graduates and their employers were interviewed about the impact of the program on patient care. Past graduates have noticed a decrease in patient visits per episode of care and improved patient outcomes. Graduates and employers also reported an increase in number of referral sources. Furthermore, as patient outcomes improved, residents became mentors to their colleagues by providing consults for difficult patient cases. Graduates have also offered continuing education to colleagues and peers within their institutions to assist with the development of the profession within their communities.

Individual interviews with the residents sought to explore barriers and facilitators for completing the program. The residents faced multiple barriers for participation including

travel to the residency site, financial costs associated with the residency, and securing time off of work in two-week increments. To offset these barriers, the residents found support through social networks including family, employers, fellow residents, and the residency program itself. The program has been able to increase the support of residents by using an onsite administrator and providing additional mentoring throughout the program and following graduation.

As the program has progressed, adaptations based on outcome measurement has allowed for improved provision of the education and increased resident support. Continued program assessment will be crucial to ensure that positive outcomes continue when the program is taught solely by Kenyan instructors associated with KMTC in 2019. Sustainability is achieved by ensuring the continued quality of the education through objective feedback to Kenyan teachers by United States based university instructors, and by supplying detailed curriculums, syllabi, tests, course schedules, and ongoing support to the Kenyan instructors. Dedicated instructors have been hired by KMTC and ongoing mentorship of students and graduates will be ensured.

THE REVOLUTION OF PHYSIOTHERAPY PRACTICE IN KENYA: DANIEL KANGUTU, PT, MSC, HDOMT, HOD PHYSIOTHERAPY DEPARTMENT KMTC

The Kenya Medical Training College (KMTC) established under an act of parliament, is a State Corporation under the Ministry of Health entrusted with the role of training various middle level health disciplines including Physiotherapy in the health sector.

Physiotherapy in Kenya started in 1942 in an informal apprenticeship arrangement under a renowned orthopaedic surgeon, William H. Kirkaldy Willis. This was to mitigate the injuries and disabilities that came about as a result of the two world wars of 1914 – 1918 and 1939 – 1945. It was not until 1966 that the first formal 3-year diploma course was started with assistance of the British Government.

The clamor to upgrade our training from diploma level to bachelor's degree started in mid 1990s with no success. It was not until the middle of 2011 when I met Richard Jackson on his way from Ethiopia and we discussed informally about upgrading Physiotherapy training in Kenya. After this first encounter my feeling was two-fold—excitement and skepticism. First, excitement because I met someone who shared the same vision and action plan for improving Physiotherapy training in Kenya. Second, skepticism because of the challenges I imagined we would face from education administrators who previously had shown not one iota of willingness in supporting previous such initiatives.

When we discussed the proposal with the KMTC administration, it was taken positively. The challenge was that the institution is not mandated by law to offer bachelor programs unless it collaborates with a credited university. This proved to be unattainable because of the logistics and expenses involved. Instead we opted to start Orthopaedic Manual Therapy (OMT) as a higher diploma program that is aimed at improving knowledge and clinical skills of the Physiotherapist.

Starting off, the program faced many challenges. Many Physiotherapists adopted a wait-and-see kind of attitude. This was due in part because this was an unknown program to them and secondly, they expected a Bachelor's degree and not another diploma. I had to use several tactics to get the first cohort to start the training.

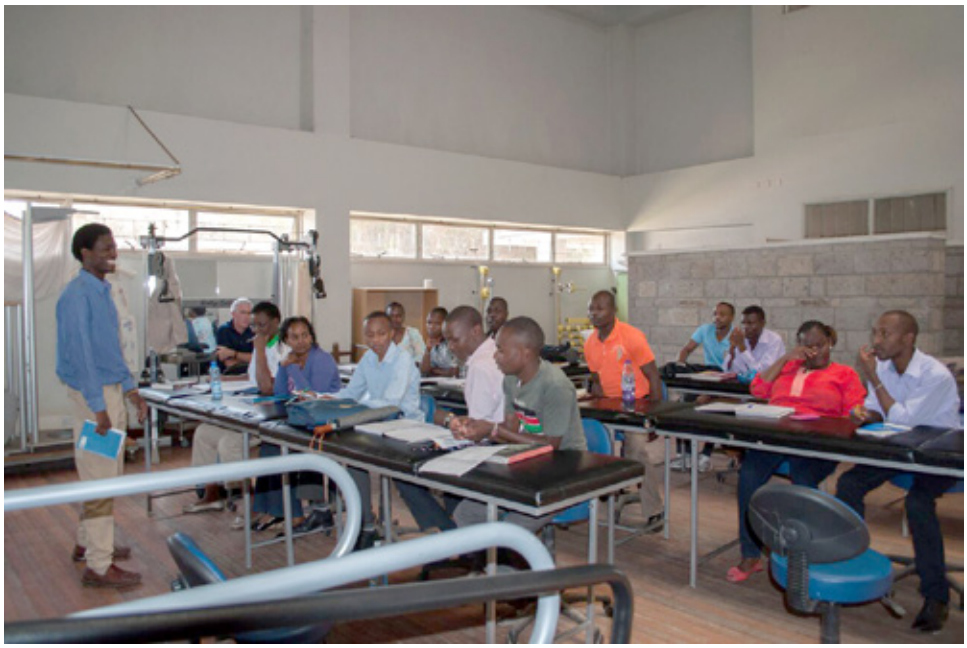
The training brought a paradigm shift in the management of musculoskeletal conditions. The effects were noticeable and swept across our health care facilities leading to an increased demand for the training. Now the program attracts not only those with diploma training but also those with a Bachelor's degree as well as a Masters. Currently there is a clamor to decentralize the training from Nairobi and establish other centers across the country.

This program has achieved a lot in terms of the number of graduates and the outcomes of the training has been noticed by the patients/clients, employers, and the community. The graduates of this program are demanding advanced training but my biggest challenge is what kind of certification would it be? Which institution would offer the certification? There is a need for the law to be changed so that KMTC can offer trainings for higher qualifications other than diplomas so that such programs can progress to the highest level possible.

A GRADUATE'S PERSPECTIVE: MARTIN OTIENO ONG'WEN, PHYSIOTHERAPIST

I was almost a year out of physical therapy school and I had been practicing in a private clinic where I had some mentoring from one of the most skilled clinicians we have in Kenya. My goal at the time was to be a better clinician, to gain all the knowledge I could get so that I could be in a position to be of some help to the people who looked up to me as a medical professional. In Kenya, the autonomy of practice comes by the mere fact that one is in the health field. In short you are called a doctor regardless of the position you have in a facility. I had to always humbly decline that name at the time since I did not feel deserving.

Joining the Orthopedic Manual Therapy program gave me the courage, the meaning,



Martin Otieno, student teaching.

joy, and pride of calling myself a Physiotherapist. My practice as a Physio has grown tremendously, from making decisions that turned out to save people's lives, to making their saved life worth living. I would say that has humbled me not just as a Physio but also as a person who people in need come to for help.

"I have learnt that I still have a lot to learn" Maya Angelou once said and this to me is a continuous realization. I joined the program because I wanted to learn more. I was hungry for knowledge, and looking for avenues that would help me change how I treated my patients. Physiotherapy for me at the time was getting boring and getting into a routine that did not have any tangible changes for my patients. The short-term relief and feel good effect after modality based therapy was exciting, but there was little or no problem solving. I could not answer the hard question from my patients "daktari will I ever get better?" My frustration always kept me asking questions, reading, looking things up, but I still did not get that far. I did hear of the program from Mr. Daniel Kangutu, from my mum (who is a physio), and a few colleagues. I was at the time contemplating doing a Physiotherapy degree and hearing the stories about the OMT program did get me excited to join.

When I joined the program, I had no idea what was going to happen. I had been reading a lot of textbooks at the time on Physiotherapy that talked about certain processes of evaluating, assessing, and treating patients, processes that we had not quite been taught how to go about in college. I was for the most part excited to join since I had looked up the lecturers coming to teach the program and had come across some of their names on the textbooks that I did read. I was at the time really fed up of administering treatments that did not show any form of tangible improvement. During my clinical rotations at the outpatient department, I had wondered why patients with low back pain had such huge files. I had wondered how the treatment method was just the same, why nobody was questioning the process despite the lack of improvements in patient's lives and why we still did the things we did that did not actually change anything. I had wondered why nobody was asking questions. I needed answers and my expectation was that I would get these answers in the Orthopedic Manual Therapy classroom.

I realized that this was going to be a life changing moment for me on the first day of class when I met Dr. Joe Godges and Dr. Kevin Pozzi. They asked the exact same questions that I had in my mind at the time, "why don't our patients get better? What can we do about it?"

Joining the OMT program was the best thing that ever happened to me as a Physiotherapist. Meeting all sorts of experienced trainers from different parts of the United States, therapists from both academia and the clinical world, as well as those involved in research was invaluable. I got the chance to meet up to almost 50 therapists with a great deal of knowledge in the Physiotherapy world. My clinical skills shot through the roof. I became more aware of things, I started to listen more, to understand what my patients were going through. I would say I became more aware. Every moment with my patients became exciting experiences not just for myself but for them as well. They got better faster, they got educated, and I had learned the answers to their questions. Not only that, I learned different ways of answering them depending on what they needed to know and how to guide them through the information. The most fulfilling aspect of it were the short texts of gratitude, the small gift cards and small gifts that I did get from them. They appreciated my care.

I developed a strong relationship with people, my communication skills got better, and I could now explain to people what a Physiotherapist is and what we do. I got confident and I started to teach the skills I had to other therapists I came across. I came to understand that teaching was the best way to learn. At first it was a challenge but with the continuous classes and mentorship it started looking like something I could get good at. So, I kept going to classes and felt that I could not miss any OMT offering.

At the beginning of the program (OMT) we were met with resistance, lots of resistance, from our peers. It was too much and at times I did feel like giving up. We kept pushing. Gradually, we started to gain respect from our peers and other medical professionals. I attribute this success to our patients. They spread the word that things were changing in Physiotherapy. Consequently, the OMT therapists started to get noticed. Other physiotherapists started to ask questions. They wanted to know where we received the training. They wanted to join the team. That was when we realized that we did get more than we had bargained for. Our expectations had not only been met but exceeded. We had answers that were valuable to our patients, but also were able to earn respect of our peers and even teach them what we knew.

A year ago I got employed by the Jackson Clinics Foundation to do mentoring for the Physiotherapists who had graduated from OMT and the OMT students working in the rural areas of Kenya. This was the turning point in my life as a Physiotherapist, the baptism by fire of being the first therapist to do a mentoring program in rural Kenya. It was a new step in the education system in Kenya. It was a humbling moment in my life, from the challenges it came with to the numerous joys that came later. Going to the rural areas made me realize how huge an impact the program had on patients. Our therapists could pick up potential red flags, do evaluations, and demonstrate sound clinical reasoning. They can design comprehensive treatment plans, all due to OMT education.

The conversations with doctors changed. There were times when Doctors did not have a clue what Physiotherapists did. Space allocation for Physiotherapy clinics in the hospitals was not a much-needed priority. That has since changed. We are starting to see interactions between therapists and doctors becoming synchronous and jointly aimed at our patients' welfare. The impact is massive. The gap is being bridged, there is progress. Sometimes we feel it is slow, but the impact is a big one. I would say, as Professor Rob Landel told us in class, "FIGHT ON."

The program is viewed in two ways. (1) As one of the best things that ever happened to Physiotherapy in Kenya and East Africa with a little bias of my own opinion. It is appreciated so much that employers of Physiotherapists recommend that those who apply for a job be OMT trained. (2) On the other hand, it is viewed as a threat to other on-going programs related to higher learning centers that offer Physiotherapy services. Regarding this I would say that "there is no positive growth that does not come without some healthy competition."

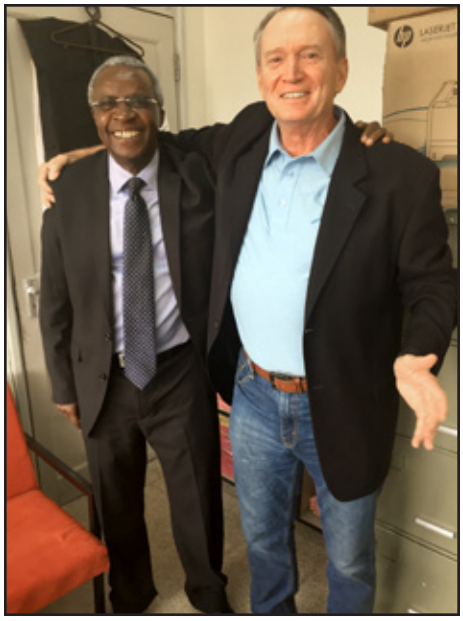
I do not think there would have been a better program that could have changed the scope of Physiotherapy practice in Kenya. The changes are tremendous. The patients can attest to that. For example, it is getting very difficult for a therapist who is not OMT-trained to see patients who have been treated by an Orthopedic Manual Therapist. The doctors and orthopedic surgeons are starting look for OMT-trained therapists to assist in seeing their patients. The number of referrals from other specialists has grown as has the number of patient-patient referral.

KENYA'S FUTURE IN PHYSIOTHERAPY: ANNA JACKSON

It is hard to discuss the future of the Kenyan program without taking a moment to reflect on how we got there. Our original vision and mission, nearly 7 years ago was to find a course of action to upgrade diploma physiotherapists in Kenya to a Bachelor's degree. Simple, right? No, wrong! The struggle to get where we are and the path to where we are headed is truly a testament to our flexibility, perseverance, and patience.

Our vision began with a simple invitation to come to Kenya, visit the Kenya Medical Training College (KMTC), meet with a few key personnel and begin the discussion of upgrading the current 3-year physiotherapy diploma to a bachelor's degree. It became clear that the vision of the upgrade would be met with a variety of barriers, seemingly impossible to overcome. So, we flexed our brains and decided to add a program for diploma graduates to learn and grow practical skills. The Higher Diploma in Orthopedic Manual Therapy (OMT) was born, consisting of 6 key courses over 18 months. Curriculums were written and volunteers from American Universities and The Jackson Clinics came to teach. An impact was and still is being made! Skills have markedly improved. Patients see and know the difference. From one to two and now 6 cohorts totaling more than 100 dedicated students have graduated from KMTC with their OMT. All the while, we have held on to the original vision, to upgrade the diploma graduates to bachelor's degrees. Each time we have travelled to Kenya, we have continued to meet with various doctors, administrators, and educators to discuss some course of action to move towards a path to this upgrade. I am so pleased that this path has finally been revealed.

Last fall, Richard Jackson was on a teaching trip to Kenya and was told by Daniel Kangutu, KMTC's Physiotherapy department head, that there was potential for a meeting with the acting Vice Chancellor of an organization called African Medical Research and Educational Foundation (AMREF). This meeting was intriguing because AMREF had just been granted the credentials as an International University. That said, we have been to a lot of meetings that were intriguing but have ended with empty results. Richard told Daniel, "if the guy shows up" which in Kenya is like a 50/50 chance, "come to the classroom and give me a sign, I'll break from class and come out to meet him." Well, the gentleman did show up, Richard entered the



Peter Ngatia and Richard Jackson.

room and the formalities of introduction began. The acting Vice Chancellor, introduced himself as Peter Ngatia. Richard gave the typical Kenyan greeting, squinted his eyes a bit and said "Peter Ngatia?" (Richard recalled that when he was a Peace Corp volunteer in Kenya back in the late 70s he had worked with a teacher by the same name. This individual actually worked with Richard for a year to take over the course material that Richard had written and was teaching at the time. This teacher was and is Peter Ngatia.) Peter looked back at Richard, with a thoughtful expression and replied, one matured man looking at another, "You are Richard Jackson! I wasn't sure, so many years ago." Of course, it is a wonderful thing to realize that this path to a bachelor's upgrade had seeds sown nearly 40 years ago.

The AMREF supports Kenya's movement towards sustainable development goals under 3 pillars: training, health service delivery, and health care financing. The AMREF has been sending students to various Kenyan educational institutions for years and made a decision that by opening their own university they could better control costs and the level of education provided to its students. That afternoon Peter, Richard, and Daniel began the most fruitful discussions to date. Indeed a path has been paved via AMREF's International University (AMIU) for the KMTC physiotherapy diploma students to upgrade to a bachelor's degree. Patience has paid off.

All of the time and energy students of the OMT program have dedicated will be considered. Graduates that have taken the course work from our advance diploma program will have their course work accepted towards the bachelor's degree. This degree is focused on professional development and not so much on the general education of the students. We have our work cut out for us with this wonderful development. Curriculums have been outlined (many thanks for Dr. Cheryl Footer), volunteer teachers are being called to service, and so this new direction begins! Now that we see a bachelor's degree is possible, we believe our vision now extends to finding the path for Master's and Doctoral degrees.

The KMTC Higher Diploma in OMT will continue to be offered. KMTC has hired one of our OMT graduates, Erastus Osewe to manage and teach in this program. This valuable program has been fully integrated into the KMTC physiotherapy program. In addition, we have lunched an educational program in Rehabilitation at KMTC that will cover the non-orthopedic areas of physical therapy (neurology, pediatrics, geriatrics, cardiopulmonary, integumentary). We have also set in motion mentoring for the OMT graduates that live in the rural areas of Kenya. Martin Ong'wen, a passionate physiotherapist and graduate of this program, is traveling to mentor and ensure skills taught are not forgotten.

Another truly unique program was started last year. Shenandoah University is sending rising third year DPT students to Kenya through our Foundation and KMTC to be mentored by our OMT graduates. Normally students are sent to developing countries to teach and to treat. In this case, they are being sent to be mentored and to learn. This is very exciting to our Kenyan counterparts. The tables have been turned and they are quite proud of that fact.

In July 2018, the First Annual Meeting of OMT graduates is to take place at the beautiful AMREF conference center. These 100 + OMTs will gather try to answer the next big question, "What is the Future of OMT?"

Truly our deepest gratitude lies with the many volunteers and students who continue to make this journey with us. Their ability to ebb and flow with the tides of challenge and change is admirable. We will continue to be flexible, patient, and persevere. Our students are our inspiration. It is through these amazing individuals that we see the difference being made with patients, it is working! Teach One, Treat Many. Their future is so bright!