

1 Oct - 19 Oct 2018 LONG EDIT

There were 33 messages from 19 contributors in 12 countries (Cameroon, Germany, India, Jordan, Nigeria, Pakistan, Rwanda, Switzerland, Uganda, UK, USA, Zambia and Zimbabwe).

1. Introduction

Andy Nobes: This reminded of this recent article by Maru Mormina, quoted below:

'Scientific capabilities are shaped by country-specific political and institutional contexts, and are thought to reflect countries' different trajectories of development and patterns of strengths (Bartholomew 1997). Seen from this perspective, scientific development is a local phenomenon rooted in the knowledge, skills, etc. accumulated over time and which constitute a nation's innovation capital, its preferred solution for advancing development. Scientific knowledge as a social good and knowledge creation as a social capability emphasise the importance of construing S&T as spatially and temporally situated, and therefore of paying attention to the unique enmeshing of historic, cultural and social influences that determine the institutional landscape of local research and innovation systems and their functioning. This should warn funding bodies and capacity building experts against the temptation of simply transferring decontextualized blueprints or repackaging solutions mechanistically — a one-size-fits-all apprroach. Instead, it calls for more flexible and innovative ways of fostering capacity, beyond simply developing skills so that scientists may fit some pre-defined model, but supporting people, organisations and institutions to challenge current states of affairs and effect change.'

'In fact, the knowledge assets contained in patents or scientific publications is a particular type of existing knowledge that can be expressed and shared through formal language, i.e. codified [...] This type of codified knowledge/information is often assumed to be relevant and applicable to the needs of developing countries and directly transferrable to these

contexts (Chan and Costa 2005). This is not always the case, as scientific knowledge and derived technologies are purpose-driven and context-dependent (Fu et al. 2011). [...] and in response to the specific needs of those nations, access to knowledge by LMIC is not straightforward. It requires developing absorptive and adaptive capabilities necessary for its acquisition and subsequent translation into technologies adapted to local conditions.'

Science, Technology and Innovation as Social Goods for Development: Rethinking Research Capacity Building from Sen's Capabilities Approach (Open Access) https://link.springer.com/article/10.1007%2Fs11948-018-0037-1

Musafiri Rogers, Rwanda: What is knowledge? Is every knowledge in developing countries truly imported? I think in every part of the world, there are discoverers, if I may call them so, from whom their discoveries are shared. How do people discover? If every knowledge in developing countries is imported, then this will stop the moment these countries will start generating their own knowledge.

Charles Dhewa, Zimbabwe: As the world grapples with SGDs [Sustainable Development Goals SDGs] it seems important to think about the critical role of different levels of knowledge in all these noble efforts.

2. Why do developing countries rely on importing knowledge?

Najeeb Al-Shorbaji, Switzerland: Developing countries rely too much on foreign imported science. Monolingualism is part of that; lack of good research and publishing industry in developing countries is another part.

Chris Zielinski, UK: There may be perfectly good reasons why developing countries choose to restrain their ambitions in basic research (financial and infrastructural reasons, mainly) and why they may simply work to adapt imported knowledge (although we are typically talking about information here - materials in books and journals, rather than knowledge delivered by a human being).

3. Why is locally produced research important?

Armand Seraphin Nkwescheu, Cameroon: There is a constant need for health systems and health services research in developing countries - and this really should be done locally, and written up for publication locally.

Of course there is scope to publish health services/systems research internationally as well. And when such publication is in open access journals, it becomes accessible in developing countries as well. In this way, open access can enable the full circle of knowledge sharing to take place, allowing people to "import" their own knowledge from international sources.

I agree with the author that African universities are not playing their role at full capacity. Even leaders/policy makers who can be viewed as pure products of these universities have not made it. They easily turn to the quest for political power and as usual time comes to wash out easily their achievements/public image. As one politician once said, the lack of models or role model in our societies is prevailing and younger ones are lost.

Charles Dhewa is inspired by examples from the agricultural field but the same holds for the public health or simply health. The imbalance in goods imported for feeding is same for medicines. All contribute to nurture dependence from the source

African should accept their past history (slavery and colonial past) and also the uncertainty of the future (think more of development than growth). We should not be doing the same thing over and over and expect a different result to happen

Charles Dhewa, Zimbabwe: We probably need a rich blend of imported and local knowledge, the same way some countries are insisting on foreign content being a lower percentage than local content in finished products. Due to advances in technology, the West can certainly see opportunities faster and run faster than local knowledge holders. Imported worldviews that are currently being reinforced through formal education systems will not build the capacity of developing countries to localize knowledge from other parts of the world. In other words, developing countries will always be called developing countries because they will be trying to play catch up all the time.

It seems the topic requires an entire symposium where it can be tackled from diverse angles.

Massimo Serventi, Uganda: Knowledge is meant for dissemination, no matter where it originates.

However one kind of knowledge/teaching should be local and not imported: management of health care systems.

I was always intrigued by the fact that Europe is disseminated by lots of schools on 'healthmanagement/public health' where African students aspire to go.

In fact management has political connotations and is context-dependent. An African doctor/leader cannot expect to learn best management principles in London, from teachers that spent few years or months in Africa. Yes, he will learn the theory but once home he will face the reality of an environment full of inefficience, corruption, demotivation. He will become frustrated himself and abandon soon the public service.

By inverted parts it has little sense that an expat with little or nil experience of African context do feel the need/importance to teach Africans on how to manage their own health system.

Yet it happened and still happens.

Uzoma Nwosu, USA: We should be looking for local solutions as well, despite the obvious challenges. All friends of developing nations should help them develop local solutions.

Armand Seraphin Nkwescheu, Cameroon: I agree with you that knowledge is meant to go every where. Importation cannot stop but once imported it should help to transform lives. Charles made it clear: "What is the impact of African universities on the life of local citizens after more than half a century of existence/independence?"

I also agree with Ana that health system is one of the domain we (African) should not expect to learn or acquire experience from the developed countries. Theory is taught and left to you to handle it.

In a nutshell, local universities should be set to transform their leaders of tomorrow.

Flora Todlana, UK: Thank you for your interesting topic. I note that you are a Chief Executive Officer of KTA at the Harare City Council and the Mbare Agricultural Markets. What is your genuine and honest view regarding the current public health state of Mbare and its Agricultural effects and role to the public? What is the involvement of your Knowledge Transfer Africa in this devastating and health hazardous experience? Surely the Harare City Council technocrats and people of high calibre like KTA must work in collaboration with the current government and other important Stakeholders to improve the systems out there (and/or import the knowledge from the West) : especially the Sanitation and the sewerage systems which I believe may be detrimental to cholera outbreaks that are threatening peoples lives currently.

This is a very important public health bone of contention in the Harare City Council and other developing nations who may find themselves in a similar situation. Surely this may hinge upon the policies and political consequences but can be corrected through a multidisciplinary collaboration. Therefore, I may humbly conclude by saying, importing knowledge will never stop as long as we continue to fail dismally to formulate our own indigenous effective policies and strategies that are aimed at eradicating such public health hazards/pandemics in our own communities: a licence to cholera outbreaks and other capitalistic epidemics. I thank you All.

Charles Dhewa, Zimbabwe: My organization is located at a City Council Building in Mbare but I don't work for the Harare City Council. We are a social entrepreneur and knowledge broker that works in more than 20 agriculture markets in Zimbabwe, including Mbare which, I agree with you, requires revamping to ensure food safety and avoid primitive diseases like cholera. For the past three years we have been nudging the council and government to direct resources towards improving agricultural markets where the majority get their food. Local authorities and policy makers are now listening a bit and we hope things will change for the better. One way we have been advocating for action is gathering evidence in agricultural markets on a daily basis and sharing it with the city council & government.

4. Should countries stop importing knowledge?

Joseph Ana, Nigeria: But why should developing countries stop importing knowledge, anyway? Knowledge is created for dissemination, no matter where it is developed. In the last few years the developed countries have been asking themselves what they can learn from developing countries, in other words what knowledge can they import from developing countries?.

It is not the importing of knowledge by developing countries that is the problem, rather it is what is done with the imported knowledge. Is it localised to context before use? And probably more importantly what investment in knowledge are developing countries making in their own environment?. What investment in research and knowledge creation are developing countries making in matters that concern them even more than it concerns the developed countries?.

In today's Hifa forum I read, Flora's comment, that '----- Therefore, I may humbly conclude by saying, importing knowledge will never stop as long as we continue to fail dismally to formulate our own indigenous effective policies and strategies that are aimed at eradicating such public health hazards/pandemics in our own communities: a licence to cholera outbreaks and other capitalistic epidemics.' I concur to her statement.

Armand Seraphin Nkwescheu, Cameroon:. "The values comes from importing knowledge critically, taking into account "local' circumstances". It is clear that knowledge is importable all the time and nothing can prevent this. The issue is that African countries seem to import goods and missing the point that behind a product reaching you, there is a knowledge/know how behind. I may postulate that nature provide anything everywhere but it is left to people living somewhere to observe, domesticate/appropriate to solve their problems.

Health is one of such domains where Africans (both leaders and intellectuals) should acknowledge they don't have to import without discrimination. I mean they can't afford to learn by experience all the time if ever they do.

Sandy Oliver, UK: My country, the UK, imports knowledge all the time and benefits from it. Rather than importing knowledge unthinkingly the value comes from importing knowledge critically, taking into account our own circumstances.

With colleagues I've recently had an opportunity to think about different forms of knowledge for development - knowledge that is generalizable and knowledge that is context specific - and how the two can be combined appropriately. Our thoughts, and citations from the extensive literature, are published here. https://cedilprogramme.org/wp-content/uploads/2018/10/Stakeholder-Engage...

Flora Todlana, UK: Honestly speaking in this era and climate I do not think we should be worrying and cracking our heads repeatedly on this matter - unless if it is just for the sake of

dialogue. We all know for sure that we will always either import or transfer knowledge to suit our needs despite its origins: this will happen till the end of time.

Musafiri Rogers, Rwanda: I think the majority agree that importation of knowledge isn't a problem. To the contributors in this field from developing countries who are also in influential decision making and guiding positions, let's not blame each other or others for importing blindly and instead play our roles in generating knowledge, and importing knowledge wisely and with a critical approach, as we tap into the assistance and partnerships that we can get from colleagues from developed countries.

5. The difficulty of disseminating knowledge

Charles Dhewa, Zimbabwe: Knowledge cannot be easily disseminated the way we disseminate information. It is easier to disseminate prescriptions like "take three tablets daily after a meal" or a manual on how to assemble & operate a dialysis machine. The most important missing knowledge in developing countries is how to produce those tablets using local herbs, what to put in tablets & why as well as how to produce a context-specific dialysis machine from scratch, for instance. Without focusing on knowledge, most development efforts just contribute to information overload.

Aijaz Qadir Patoli, Pakistan: I think this is not as simple as simply askes. Einstein said: "All knowledge flows from experience." And historically too the phenamena of "Cultural diffusion" from high gradient to lower ones is evident. Birth of civilizations in history had knowledge driven; both immaterial knowledge (intellectual & scientific etc) and material knowledge (methods & techniques of doing things). This flow of knowledge from then developed world to then developing is marked centuries of landscape mostly through armed expeditions. Greek, Roman & Islamic knowledge & technologies dissemination sprawled. Now we have knowledge management platforms, but the phenamena perhaps a natural law of social sciences continue to manifest itself. But now complexities have created need of contextualized generation of idiginous knowledge through integrated benchmark system.

6. Should we think in terms of Knowledge transfer and knowledge exchange?

Anna E Schmaus-Klughammer, Germany: We should not think in borders and nations regarding healthcare. Diseases will not stop at borders either.

Let us cooperate. The South can find solutions and the North will import solutions. Let us find solutions together.

Obi Egbuniwe, USA: What if the topic was revised from "knowledge importation" to "knowledge transfer"? Will your opinion remain the same? I have attended conferences/seminars in the US delivered by Subject Matter Experts (SMEs) from subsaharan countries. How would such situation be classified? The effectiveness and efficiency

of global/public/community health will eventually depend on Health Information Exchange (HIE) once adopted via Electronic Health Record (EHR) systems integration and Clinical Decision System (CDS).

On the contrary, practical knowledge importation or transfer may not be beneficial to developing nations without appropriate planning, resources, and Needs Assessment (NA). A practical example is a previously addressed subject in this forum, Universal Health Coverage (UHC). Just because the program is effective in some developed nations does NOT necessarily mean it will in developing nations that are not equipped to operate and sustain the program.

Knowledge transfer/importation drives quality care; therefore, should be encouraged.

Armand Seraphin Nkwescheu, Cameroon: This concept of "Knowledge transfer" has always beaten my imagination. I may claim to have read enough/comprehensively about it but as of now I find it empty. I will be grateful if you could share substantive information on the concept which to the best of my knowledge is or has disappeared from the limelight(A least in the African countries perspectives). It has always appeared to me as one could also think of "Brain transplant" for African! no, i don't believe it ! Knowledge is present everywhere without discrimination. It is about mastering your environment with the skills and knowledge inherited overtime as a legacy from previous generations.

Kenneth L Chanda, Zambia: I think health information exchange sounds embracing because dynamics of the 1950s and 1960s have changed where the north prescribed almost everything including names. Conditions could relatively different even knowledge base may not be the same. However information sharing is beneficial on both sídes.

Vijayluxmi Bose, India: My experience tells me that it is more question of customizing and adaptation, training cadres to work with international protocols, building health literacy into community mobilization programs that needs to happen with more robustness, supported by political will at all levels.

Aijaz Qadir Patoli, Pakistan: expertise in eHealth can promote knowledge exchange and pave the ways for developing world to generate knowledge in their own local contexts as the global importance of credible knowledge generation in LMICs is one fundamental for prevention of pandemics. HIV/AIDS jolted the perusal of Almaty declaration and changed the scenario. Similarly now higher internationalization of contacts among nations and discovery of new & human-animal infectious elements (mainly emerging from LMICs with otherwise high potential of sustainable development) make importance of integrated global knowledge management imperative. The complexities of global health issues that cut across multiple sectors, seek review of sources of knowledge also, not traditionally confined to medicine or public health or health services delivery. The need to study global health seeking behaviors in given contexts and transform them to achieve objectives of universal goal of health particularly universal health coverage.

Joseph Ana, Nigeria: So how do Africa s or LMICs learn to do all that Charles has listed

[http://www.hifa.org/dgroups-rss/when-will-developing-countries-stop-impo... without learning from those who already have the knowledge? I.e the HICs.

"~All knowledge flow from experience" Einstein.

Michele Meltzer, USA: "Let's build a future where people are no longer dying for lack of healthcare information"

There are many layers to this discussion but the mission of HIFA says it all, "Lack of healthcare information, whether from the West or local, is potentially catastrophic". The members of this group have a vast collective experience. Information about rheumatology is not being taught at many medical schools because there are no teachers. Rheumatology for All [rheumatologyforall.org/], along with other groups, is trying to figure out the best way to disseminate this knowledge. We are aware that medical students everywhere are busy and not likely to read extensively about a topic on which they will not be tested or receive credit. We are exploring ways for rheumatology topics to become part of the standard curriculum at medical schools, community health works, etc. We are open to any ideas.

Patricia Swinfen, UK: Please look at www.swinfencharitabletrust.org

Attached [*] is an application form. We are an English Charity working with hospitals and clinics in 78 countries of the developing world, dealing with doctors who look after poor, sick, and disabled people.

7. Information transfer in Zimbabwe

Charles Dhewa, Zimbabwe: Here is a fresh example of why I am concerned about developing countries' obsession with importing knowledge:

Two days ago the Zimbabwean government released US\$7 million to pharmacies so that they can import drugs. If it is true that the majority of medicinal drugs come from natural plants and trees, African countries like Zimbabwe, DRC and other others with abundant natural plants & trees, would not be spending forex importing drugs. They are doing so because knowledge on extracting drugs from trees and natural plants is not available locally. By importing drugs they are importing surface knowledge like prescriptions on how to use the imported drugs.

A country whose health system is entirely based on foreign currency and foreign knowledge is certainly sleep-walking into extinction.

Flora Todlana, UK: I beg to disagree with you in that there is no expertise for manufacturing medicinal drugs in Zimbabwe: Charles, you and I know why????? All along we had pharmaceutical companies in the country working hard to supply the whole country with medicinal drugs till a certain period where things went out of control in the country financially then there was scarcity for a lot of commodities and basic things. Our biggest

problems are: negative policies, failure in maintaining sustainability, wrong priorities, poor accountability, failure to keep up with pharmaceutical technological advancement due to poor if not no funding whatsoever, poor economic policies and strategies: yet all the natural resources are abundant in the country, the expertise is there but no money Charles. Do we have any options given the above deadly characteristics but to import drugs from those countries who know how to manage their affairs better than us!!

Obi Egbuniwe, USA: Sub-Saharan countries do not lack the intelligence to push the needle closer success; instead, they are glued to a stand-still by corrupt leadership. What percentage of the allocated funds do you think will go into the specified program? Only in that part of the world are politicians and government employees richer than entrepreneurs. What happened to research and development? Such investments are discouraged for fear of eliminating the leaders sources of embezzlement. Corruption has become an accepted behavior.

I am an advocate for information transfer and believe that its effectiveness and sustainability are directly related to the integrity of the stakeholders. Recently, a state government in one of the sub-saharan countries in West Africa chose the option to send 50 employees to the US for a two weeks training over having two trainers go to the country; a cost variance of over \$252,000.00. Wonder why the former option was chosen though less cost beneficial?

It is impossible to plug a square hole into a round peg. Integrity and accountability yield success. Give a man a fish and you feed him for a day; teach a man how to fish and you feed him for life.

Flora Todlana, UK: Zimbabwe lacks no expertise, intelligence nor 'know how' but the financial capacity, policies and red tape. Our policies are clearly not in place and virtually no accountability whatsoever! Our situation in Zimbabwe is clearly self inflicted and seem not an urgent political agenda for a long time. You can have the most intelligible ideologies and concepts for Zim but they have no room to stand a chance of execution as everything is politicised!!! I am not political personally but only a public health research person. Our biggest problem is fear to drive such scientific ideas to our politicians: the gap continues to widen and yet our problems are deepening in a fierce rate.

Charles Dhewa, Zimbabwe: Thanks for your rich insights. However, I think the issue goes beyond different experts blaming corrupt politicians. Africans who have been exposed to other parts of the world, like you and me, have to rise up and be counted. We can start leading transformation in our small ways from wherever we are. It is easy to blame politicians as if they are standing in the way of predictable progress yet the entire society should play its role.

I am glad that your passion is information transfer which is very important in changing lives. In almost all African countries including big economies like Nigeria and South Africa, why is nutrition knowledge still locked in academia and health institutions? There have not been efforts to develop appropriate ways of sharing nutrition knowledge with the majority, except students studying medicine and other related sciences. In health institutions knowledge about nutrition is still locked in health personnel who can only share it through surgeries, clinics and hospitals when they give prescriptions to patients. Unless you become a patient you don't access some of the knowledge.

There have not been meaningful efforts to increase ordinary people's awareness of nutrition issues. Pathways of simplifying and localizing science and nutrition are still missing. We have not developed appropriate terminologies that people can relate to in their daily lives. For instance, terms like Iron, Zinc and Vitamins A, B, C, D and other labels do not have local equivalent explanations. It means we are still using imported knowledge and terminologies. Ordinary people wonder what is the difference between Iron as steel and Iron as nutrition or whether these are related. What is the difference between Zinc as nutrition and Zinc as roofing material?

When their relative is admitted in hospital, people bring bananas, oranges, apples and other fruits for the patient with no idea of what these fruits have in terms of nutrition and what they contribute to the patient's healing process. They are not informed from a nutrition perspective. Otherwise, they would also bring other wild fruits or tubers with equivalent nutritional components if they knew the science behind the nutrition.

Consumers and patients have a lot of unanswered questions and in the absence of clear answers, they end up depending on beliefs and trusting the people giving them prescriptions. Simplifying science to be part of ordinary people's daily lives does not require foreign currency or a politician giving us instructions.

Profiles

HIFA profile: **Joseph Ana** is the Lead Consultant and Trainer at the Africa Centre for Clinical Governance Research and Patient Safety in Calabar, Nigeria. In 2015 he won the NMA Award of Excellence for establishing 12-Pillar Clinical Governance, Quality and Safety initiative in Nigeria. He has been the pioneer Chairman of the Nigerian Medical Association (NMA) National Committee on Clinical Governance and Research since 2012. He is also Chairman of the Quality & Performance subcommittee of the Technical Working Group for the implementation of the Nigeria Health Act. He is a pioneer Trustee-Director of the NMF (Nigerian Medical Forum) which took the BMJ to West Africa in 1995. He is particularly interested in strengthening health systems for quality and safety in LMICs. He has written Five books on the 12-Pillar Clinical Governance for LMICs, including a TOOLS for Implementation. He established the Department of Clinical Governance, Servicom & ehealth in the Cross River State Ministry of Health, Nigeria in 2007. Website: www.hriwestafrica.com Joseph is a member of the HIFA Steering Group: http://www.hifa.org/people/steering-group

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HIFA profile: **Vijayluxmi Bose** is a Health Communication and Education Specialist for an independent consultant in India. Professional interests: Public Health, communication, qualitative health workforce capacity building, health systems strengthening, policy-advocacy and health communication education, health literacy. vijayluxmi.bose AT gmail.com

HIFA profile: **Kenneth L Chanda** is Associate Consultant and Lecturer at National Institute of Public Administration where he is lecturing in Records Management. He is co-author of The development of telehealth as a strategy to improve health care services in Zambia. Kenneth L. Chanda & Jean G. Shaw. Health Information & Libraries Journal. Volume 27, Issue 2, pages 133139, June 2010. He recently retired as Assistant Medical Librarian at the University of Zambia. Masters degree in Development for Commication, patient advocate. klchanda AT gmail.com

HIFA profile: **Charles Dhewa** is the CEO of Knowledge Transfer Africa (Pvt) Ltd based in Harare, Zimbabwe. He is a HIFA Country Representative

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HIFA profile: **Armand Seraphin Nkwescheu** is a Public Health Consultant at the Cameroon Society of Epidemiology. Professional interests: Road traffic injury, Neglected Tropical Diseases with emphasis on snakebites and envenoming, Non communicable Diseases, Health systems and Development Evaluation. nkwesch AT yahoo.com

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HIFA profile: **Anna E Schmaus-Klughammer** is president of the association "One World Medical Network". The goal of the association is to improve medical care in LMICs (Low and Middle Income Countries).Our activities start from building primary and specialized health care facilities and continue to organize national cancer screening with connections to national and international expert doctors using telemedicine networks. Training of medical personnel is also an important part of the work of the association. One World Medical Network e.V., Ulrichsbergerstrasse 17, Deggendorf in Germany. info@owmn.org www.owmn.org

HIFA profile: **Massimo Serventi** is a long-standing Pediatrician working in Africa since 1982. He currently works on a volunteer basis in an excellent missionary/credited hospital in north Uganda, St. Mary's Hospital-Lacor-GULU. He has worked for several NGOs in 6 African/2 Asian countries. His interests include clinical and community pediatrics, adherence to clinical guidelines and school education as the major determinant of good health. massimoser20 AT gmail.com

HIFA profile: **Najeeb Al-Shorbaji** recently retired from the World Health Organization (WHO), where he has worked since 1988 in different capacities. He was most recently Director of the Knowledge, Ethics and Research Department at WHO headquarters, Geneva. Previously he was Coordinator for Knowledge Management and Sharing in EMRO (Eastern Mediterranean Regional Office), Egypt. He is a member of a number of national and international professional societies and associations specialised in information management and health informatics. He has authored over 100 research papers and articles presented in various conferences and published in professional journals. He is a member of the HIFA Steering Group.http://www.hifa.org/people/steering-group http://www.hifa.org/people/steering-group

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HIFA profile: **Chris Zielinski:** As a Visiting Fellow in the Centre for Global Health, Chris leads the Partnerships in Health Information (Phi) programme at the University of Winchester. Formerly an NGO, Phi supports knowledge development and brokers healthcare information exchanges of all kinds. Chris has held senior positions in publishing and knowledge management with WHO in Brazzaville, Geneva, Cairo and New Delhi, with FAO in Rome, ILO in Geneva, and UNIDO in Vienna. Chris also spent three years in London as Chief Executive of the Authors Licensing and Collecting Society. He was the founder of the ExtraMED project (Third World biomedical journals on CD-ROM), and managed the Gates Foundationsupported Health Information Resource Centres project. He served on WHO's Ethical Review Committee, and was an originator of the African Health Observatory. Chris has been a director of the World Association of Medical Editors, UK Copyright Licensing Agency, Educational Recording Agency, and International Association of Audiovisual Writers and Directors. He has served on the boards of several NGOs and ethics groupings (information and computer ethics and bioethics). UK-based, he is also building houses in Zambia. chris AT chriszielinski.com

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