



U.S. Surgeon General Richard Carmona and some young friends during a visit to a New York City school.

EDITORS' NOTE After dropping out of high school, Dr. Richard Carmona enlisted in the U.S. Army. While serving, he earned his G.E.D. and went on to become a combat-decorated Special Forces Vietnam veteran. After leaving active duty, he attended Bronx Community College of the City University of New York, where he earned an Associate of Arts degree. He then attended the University of California, San Francisco, where he earned a bachelor of science degree and then a medical degree, graduating at the top of his medical school class. Trained in general and vascular surgery, Carmona also completed an NIH-sponsored fellowship in trauma, burns, and critical care. He was then recruited jointly by the Tucson (Arizona) Medical Center and the University of Arizona to start and direct Arizona's first regional trauma care system. He went on to become the Chairman of the State of Arizona Southern Regional Emergency Medical System, as well as a professor of surgery, public health, and family and community medicine at the University of Arizona. Public health came as a second career. Carmona went back to school while working in order to complete a master's degree in public health at the University of Arizona. He has also served for over 25 years with the Pima County Sheriff's Department in Tucson, including as deputy sheriff, detective, SWAT team leader and department surgeon. He is one of the most highly decorated police officers in Arizona. He has served as a medical director of police and fire departments, and is a fully qualified peace officer with expertise in special operations and emergency preparedness, including weapons of mass destruction. In 2002, he was nominated by the president and unanimously confirmed by the United States Senate to become the 17th Surgeon General of the United States. After successfully completing the statutory four-year term of the U.S. Surgeon General, he was named Vice Chairman of Canyon Ranch and President of the Canyon Ranch Institute Board of Directors. Carmona is

The Power and Possibility of a Healthy World

An Interview with Richard H. Carmona, M.D., M.P.H., FACS, President, Canyon Ranch Institute

also the first Distinguished Professor of Public Health at the Mel and Enid Zuckerman College of Public Health at the University of Arizona, and the first Distinguished Professor of Health Promotion and Entrepreneurship at The Ohio State University College of Nursing.

ORGANIZATION BRIEF A 501(c)3 nonprofit public charity, Canyon Ranch Institute (www.canyonranchinstitute.org; CRI) catalyzes the possibility of optimal health for all people by translating the best practices of Canyon Ranch and CRI's partners to help educate, inspire, and empower every person to prevent disease and embrace a life of wellness.

What is the status of health care reform today, and are the important issues being addressed?

Very little of the substantive discussion around health care reform has taken place, at least in the public forum. Unfortunately, it's been diluted with political extremism.

We need to look at our 'system' of care. We don't really have a health system – we have a sick care system; one that rewards providers for taking care of people who get sick. Incentives aren't properly aligned because health professionals make their revenue by treating people who have disease. We have a perversely incentivized system. We also have the best science in the world often delivered in an inefficient and sometimes ineffective manner. According to the World Health Organization, the United States spends more per capita on health care than anyplace in the world, sometimes by many multiples. Yet, depending on the health metric, we're only the 25th to 40th healthiest nation. How can that be when we generate the best innovative products and 80 percent of the drugs on the market come from U.S. research?

It's because the system is ineffective and inefficient, and because the American population still practices bad behaviors that result in chronic disease and unsustainable health care costs. Three-quarters of U.S. health expenditures go toward treatment of chronic diseases – many of which are preventable.

We spend over 18 percent of our Gross Domestic Product on sick care; 75 cents of every health care dollar is spent on treating chronic disease. Therein lies the value proposition for rightsizing this system: advance health literacy, prevent disease, and promote wellness.

This is not to say that people who practice healthy behaviors don't get sick. However, the vast disease burden that we deal with on a daily basis is the result of chronic illnesses such as heart disease, asthma, depression, and Type 2 diabetes. Take smoking – almost half a million people die from it every year and millions more suffer from chronic diseases like emphysema and bronchitis as a result of smoking; children develop more ear infections; and women exposed to secondhand smoke have smaller babies who have a higher incidence of asthma and chronic infections later in life.

Obesity is another issue: over nine million American children are overweight or obese, and obesity is the most potent accelerator of chronic diseases known to mankind. If you're obese, you are at a much higher risk of getting Type 2 diabetes or accelerated cardiovascular disease; you may have a stroke; and you may develop other diseases. If you already have diseases, obesity makes them worse.

When you list all of the things that we're paying for, so much goes back to lack of healthy lifestyle choices and not understanding how these choices impact our quality of life and our cost of care.

Is this a matter of individual decisions or can government regulation play a role? Can more be done to encourage people to take responsibility for their own health?

That debate goes on in public health forums as well as in business circles.

Mayor Mike Bloomberg tried enforcing it by banning the large cups of carbonated beverages in New York. The question is, where does the regulation stop? Does everybody have to memorize a manual about what they can and cannot eat? I understand the intent, but we have to look at policy realistically.

Most of my colleagues in public health understand that the best chance of us succeeding is to change behaviors and improve the health literacy of the nation so that people understand there are consequences to their decisions. If you continue to be sedentary, eat the wrong foods, smoke, and engage in high-risk activities, predictably, you will cost society more money and die sooner.

Also, the example you set for your children and grandchildren will be poor, because they will replicate those behaviors going forward in life.

The idea is to take the best science and deliver it in a culturally competent, health literate manner so the end-users, all people, are

impacted by that message in such a way that they change their behaviors in a sustainable way – that they start walking every day; they never smoke; they eliminate high-risk activities in their daily endeavors and they educate their children to be discriminate in how and what they eat, and kids remain physically active.

We have the science and knowledge to be successful. The translational element is so difficult because we're a heterogeneous society: there is no such thing as the 'average' American. We must embark on this journey of improving the health literacy of the nation, which we do at Canyon Ranch Institute, and in doing so, we will start to affect a cultural change where people start to accept some of the responsibility.

Government has a responsibility to provide information and programs to incentivize people to make healthy choices. But, the government can't do it alone. The government has to meet the public halfway and help those who don't understand that there is an opportunity for each of us to be individually responsible for our health through the decisions that we make every day.

We can't underestimate the challenges we face such as the fact that 20 percent of children grow up in poverty. By the time they're in adolescence, almost half of the children in the United States are in some type of support program, which is embarrassing for the greatest nation in the world. We pay the consequences because later in life, those social determinants come back to haunt us as those children get older, practice bad health habits, and become a societal burden.

Do you feel it is possible for real change to occur or is it tough to remain optimistic?

Real change can happen and I'm optimistic. This is our mantra at Canyon Ranch Institute: The Power and Possibility of a Healthy World.

It means that we have to engage the American public – all 320 million of us have to understand that there is an element of personal responsibility. Government does have a role to educate the public where necessary and put programs in place. It's clear, based on the trajectory we are on today with spending over \$2.8 trillion on health care, that if we project into the next decade, we'll be spending 25 percent of our GDP or \$5.5 to \$6 trillion. It's breaking the bank already. We can't afford this any longer.

Eventually, we'll be forced to do the right thing for economic reasons, although we should have been acting incrementally over the past decades when this scientific information became available.

Do young people still desire to enter the health care industry and will we have the talent in health care that we need going forward?

For a while, the applications to medical school and some health professions dropped, but they're back on the rise.

However, we have young professionals coming out of medical school with debt that exceeds \$150,000. Many are forced to go into professions that will pay more, like surgery and

other specialties. What we really need is to incentivize all of our health professionals to start focusing on primary care and prevention.

If we continue to argue the politics of health care and who pays, that won't address the issue. If we don't do something, we know the costs will continue to rise.

Finding the best path forward is what we need to do, devoid of the political rhetoric and focused on substantive discussion of what will work, based on evidence and best practices.

Overall, we are seeing a brain drain and exporting a significant amount of our master's and doctorate students to other countries to compete against us.

In minority populations, as many as a third of U.S. students drop out of high school. How can we hope for a diverse workforce in health professions when we can't get a third of these kids out of high school?



In October 2009, Canyon Ranch Institute (CRI) and Urban Health Plan (UHP) cut the ribbon to open The UHP-CRI Health & Wellness Center in the South Bronx, New York. The center is the home base for the CRI Life Enhancement Program at UHP. Pictured left to right: UHP CEO and President Paloma Izquierdo-Hernandez, M.P.H., M.S.; Richard H. Carmona, M.D., M.P.H., FACS; UHP Founder Richard Izquierdo, M.D.; and CRI Executive Director and Board Member Jennifer Cabe, M.A.

It's critical that we make sure we have systems in place that give all students a chance to reach their fullest potential, even if they are living on the margin.

It's extremely important that we understand the social determinants of health. The best predictor of health status and one's success or failure is socioeconomic status.

We have to make sure that we're not continuing to disadvantage people because they start in a disadvantaged way. If we want a healthy workforce, and we want these children to become assets to society and not liabilities, we have to ensure that they get the appropriate education and encourage many of them to get into the hard sciences, because this is where we need to continue to innovate and where the money will be in the future.

When your term as U.S. Surgeon General ended, what excited you about leading Canyon Ranch Institute?

Even as U.S. Surgeon General, I always used the best practices of Canyon Ranch as an example of the right value proposition: pursuing optimal health and wellness for all.

In a resort setting, it is limited to people who can afford to come. What appealed to me is that the owners and founders desperately wanted to export the intellectual property they had developed over 30 years of being the preeminent

leaders in health and wellness. They said, we want to make sure those who can't come here get the benefits of what we have developed.

I was asked to be Vice Chairman of the corporation and to help with business, but also to be the President of Canyon Ranch Institute to make sure the knowledge they had accumulated over decades – on how to keep people healthy and well in a sustainable manner – could be shared with underserved communities all over the world; this appealed to me.

I kept my academic credentials, but working with my colleagues and our partners at the Canyon Ranch Institute gave me a platform and a universe of intellectual property to disseminate through all of the partnerships that our team has created.

We have proof of concept now, data that has been generated over the years to show that we can build sustainable programs within some of the most economically challenged communities, improving health metrics and empowering people to make healthier choices for themselves and their families. With health may come a better chance of being employed and staying out of the hospitals, and children having a better chance of graduating and enjoying successful, productive lives.

How do you evaluate success when you have such a lofty goal? Can you put metrics in place to track impact?

At Canyon Ranch Institute, we were determined to distinguish ourselves in several ways. We hold ourselves out to be thought leaders who are willing to tackle the most complicated public health issues in the world. We have built a board and team of those thought leaders with the intellectual

capital that we need to make these changes. We run all of our partnerships and programs in an academic fashion; and at the onset of every single program, we determine the community health needs and how we will measure sustainable change and cost effectiveness over time.

To be considered thought leaders in this space, we needed to publish, so every one of our programs eventually has papers written and presentations given about it.

As a result, our leadership has been invited to join committees that are developing policy for the nation and the world related to health and wellness. Everything we have accomplished has come from a prospective plan.

We want to build and grow an organization that is recognized as a credible source of information on its own, which has demonstrated through its programs that it can affect sustainable behavior change, resulting in improved quality of life and decreased cost. Our programs are evidence based; the metrics are there. We simply start off defining what must change in order to help us define success. This can be economic change, health change, community improvements, and so much more. We set high standards because we recognize that Canyon Ranch Institute must lead through innovation, which means both applying and developing the best available science to meet our important mission. ●