

Is a new health crisis looming?

JOSÉ JAVIER ARANGO-ÁLVAREZ • ARMENIA (COLOMBIA)

DOI: <https://doi.org/10.36104/amc.2022.2765>

Carlos Andrés is an imaginary patient who, on December 6, 1989, at the age of 45, was diagnosed with «end-stage kidney disease» secondary to his more than five-year history of diabetes mellitus. In those days, when we as a society lived in a troubled (tumultuous?) country (1), Carlos presented to a hospital's emergency room one afternoon.

“Carlos, your kidneys do not work and we need to do dialysis,” the doctor told him.

“Dr., I don't have money to pay for dialysis,” was the last conversation Carlos had with his doctor, before dying four days later from uremic syndrome.

The above describes the situation we experienced at that time in Colombia, due to a healthcare system which, to that point, had been unplanned, with only 22% coverage, and approximately 59% out-of-pocket expenses (2). In the best cases, almost 47% (calculated using the current coverage of the subsidized regimen) of the population who were found to need dialysis due to kidney disease had to die without the possibility of this treatment (3). Or, if they had the good fortune of not dying because their kidney function improved, they had to suffer the agony of trying to obtain extremely basic medications with high side effects, with no chance of receiving new generation medications which could even delay the progression of the disease (4).

It was after the democratization processes like the 1991 Constitution (5) and subsequent Law 100 of 1993 and Law 1751 of 2015, among others (6,7), that we structured our rights-based social pact and, thus, future “Carloses” and all Colombians, as a society, were able to obtain access to better health care, including medications and technology to improve our quality of life.

Below, I will try to present some data from that time period, compared to today, and a few recommendations on what to do for the immediate future: in 1991, we had 1,115 patients on dialysis in Colombia (34 patients per million inhabitants) (8). At that time, only 22% of the population with end stage renal disease had access to this therapy.

Today, we have approximately 34,511 patients (678 per million inhabitants) (9), with coverage expanded to 97.78% (3), and a reduction in out-of-pocket costs from 59.6% in 1990 to 15.1% today (10). Forty-seven percent of patients on dialysis belong to the subsidized health insurance regimen (3); in 1991, these patients did not have access to this treatment.

We have increased our public healthcare spending as a percentage of the gross national product (GNP) more than 10 times, from 0.5% in 1991 (2) to more than 7% today (11), and we will end 2022 with 9%. This spending is reflected in the treatment of many diseases; today we have other medications or technologies not just for chronic kidney disease, but also for its precursors such as diabetes and hypertension, not to mention comorbidities like coronary disease (12).

We increased our life expectancy, as a society, from 69.5 years in 1989 to 77 years in 2021 (13). This life expectancy has also been transferred to patients on dialysis, who live twice as long today as they did in 1990, with an average lifespan for diabetic patients of 75.4 years (9).

Dr. José Javier Arango-Álvarez: FACP, MBA. Especialista en Medicina Interna, Nefrología y Administración Financiera. Presidente ACMI 2022-2024.

Correspondencia: Dr. José Javier Arango-Álvarez, Armenia (Colombia).

E-Mail: jj.arango@uniandes.edu.co

Received: 31/X/2022 Accepted: 1/XI/ 2022

Out of our total healthcare budget in 2008, we spent 12.5% on dialysis; today, this cost is less than 5%. However, some insurance companies spend up to 19% (14), mainly those who could improve their treatment of precursors like diabetes and hypertension, moving “upstream,” as I call it (towards prevention), and thus avoiding cardiovascular and renal outcomes (9).

Now some current data: 16 insurance companies manage 75% of the nation’s coverage, each with more than one million people insured. According to the latest High-Cost Account public report, we have grown by 10% in diabetic patients; some insurers have an incidence of 15.9 per 1,000 inhabitants, and others 0.01 per the same 1,000 inhabitants. Here we see that the diagnostic strategy is very important, as it is precisely those insurers with more diabetes diagnoses and better diabetic control who generally have prevention programs which translate into a lower percentage of patients with catastrophic illnesses per 100 inhabitants, lower mortality and, thus, lower cost in any setting (going “upstream”) (9).

Thirty-five percent of all patients with chronic kidney disease have diabetes mellitus as a comorbidity or precursor. This figure is higher than that in Europe, where out of every 100 renal patients, 24 are diabetic (15). On top of this, in Colombia, we spend three times more on diabetic complications than on medications to control the disease (16).

Today, out of every 100 patients who die in all stages of kidney disease, 38 are diabetic, and in Stage 1 this percentage can reach 46%, which could reflect lower access to health care (prevention programs) in this population (9).

We can continue to improve; of every four diabetics, only two have their glycosylated hemoglobin measured every six months, and only one of these reaches the goal of less than 7%. In addition, 23% of the patients with chronic kidney disease have an accelerated loss of more than 5 ml/min in their glomerular filtration rate; however, for some insurers, one out of two patients have this accelerated loss of kidney function (9), even though in 2018 the fourth most prescribed drug not charged to the capitation payment unit (CPU) was an antidiabetic drug without target organ damage protection (17), and in 2019 the third most prescribed drug (in billions of pesos) in the country was an insulin analog, exceeded only by two biological medications (18). Here is another great opportunity.

Comparing the financial reports from 2020 and 2021, more than eight insurers had a negative EBITDA (zero cash flow), which restricts their recruitment; more than 10 had a negative equity adding up to more than three trillion pesos (19). Meanwhile, these are the insurers with the highest healthcare expenditure on chronic kidney diseases and high-cost diseases and, interestingly, a lower rate of diabetes diagnosis (9). Thus, patients enter the healthcare system with catastrophic diseases. The insurers with the best financial soundness have experience in diagnosing and managing diabetes; comparing the information, they have

a controlled incidence and prevalence with lower mortality (9), and I ask, “Why should we punish them?”

Allow me to go “Back to the Future,” as in the classic Michael J. Fox film: if “Carlos Andres” were to arrive at the same hospital today (November 2022) with the same symptoms, at the very least he would have a 98% chance of being admitted for dialysis, and he would not have died four days later. In addition, depending on his assigned insurer, he would have a life expectancy of 5-25 years (9); but, best of all, thanks to the healthcare policies which we have constructed as a society and without overlooking any of the system’s actors, chronic diseases would be diagnosed in early stages. Furthermore, he would have access to medications and technologies included in our healthcare system which would control his disease and halt “target organ damage,” avoiding complications like heart failure, cerebrovascular events, dialysis and death (20-22).

I recently attended a healthcare forum, where the topic came up of reaching where the healthcare system has not reached in these almost 30 years; the advocates of this policy justifiably show different statistics for healthcare indicators in what the government calls “Deep Colombia.” These indicators range from greater maternal-infant mortality to a lower overall life expectancy. However, healthcare access for diseases such as those that I am obviously more familiar with, like “chronic kidney disease,” has improved by more than 200%, even in that part of the population. This made me reflect and remember the classic and recent economists, as well as think, “How do we in health care reach those places where the invisible hand of the market has not reached?” And I believe the answer, without destroying what has been created, is: “with the visible hand of the State,” improving healthcare constraints.

It remains for all of the system’s actors: health insurance companies (EPSs), healthcare institutions (IPSs), the government, patients, medical associations and society in general, to join in “creating shared value” (23) and thus continue advancing in the improvement of our patients’ quality of life, using the available healthcare technologies for the segments that will benefit from them, ensuring goal monitoring, adherence and less target organ damage. This would translate into what we would call studies of economic evolution in health care: cost-effective models (24-27).

Thomas Piketty, in “A Brief History of Equality,” describes the institutional mechanisms which allow “Real Wealth for the Nations.” Of the six mechanisms he proposes, I would like to highlight: “Universal Health Coverage;” as a society, we have definitely advanced in this aspect, and we should build on this advance, without destroying what has already been gained (28).

“The compass will indicate true north from where you find yourself, but will not warn of the deserts, swamps and gorges you will find along the way. If, as you seek your destiny, you launch yourself toward it without paying attention to the obstacles, you will only manage to sink in a swamp...” (29).

References

1. <https://www.semana.com/nacion/articulo/la-colombia-de-los-90/13845-3>
2. <https://colaboracion.dnp.gov.co/CDT/Estudios%20Economicos/Incidencia%20del%20gasto%20p%C3%ABlico%20en%20salud%201990-1999.pdf>.
3. <https://www.minsalud.gov.co/proteccionsocial/Regimensubsubido/Paginas/coberturas-del-regimen-subsidiado.aspx>
4. <http://www.oitopsmexico99.org.pe>
5. <https://www.minsalud.gov.co/sites/rid/Lists/BibliotecaDigital/RIDE/INEC/IGUB/constitucion-1991.pdf>
6. **Guerrero R, Gallego A II, Becerril-Montekio V, Vásquez J.** Sistema de salud de Colombia. *Salud Publica Mex* 2011; **53** (supl 2):144-155
7. *Salud Pública de México* 2015; **57** (5), septiembre-octubre
8. *Acta Médica Colombiana* 1991; **16** (5), septiembre-octubre
9. <https://cuentadealtocosto.org/site/erc/>
10. <http://www.andi.com.co/Home/Noticia/17183-colombia-entre-los-paises-de-latinoamer>.
11. **Eduardo Lora.** Economía Esencial de Colombia. Las raíces de las Crisis. Segunda Edición, octubre 2021.
12. <https://www.minsalud.gov.co/salud/POS/Paginas/plan-obligatorio-de-salud-pos.aspx>.
13. https://datos.bancomundial.org/indicador/SP.DYN.LE00.IN?end=2019&location_s=CO&start=1960&view=map&year=1990
14. *Rev Gerenc Polit salud*, Bogotá (Colombia), 2016; 15 (30), enero- junio: 212-223
15. *Rev Panam Salud Pública* 2018; 42.
16. <https://www.scielosp.org/article/rpsp/2009.v26n1/55-63/>.
17. <https://www.portafolio.co/economia/los-cinco-medicamentos-mas-prescritos-en-2018-532183>.
18. <https://www.sic.gov.co/sites/default/files/documentos/032021/ES-Sector-Farmacaceutico-en-Colombia.pdf>.
19. <https://www.semana.com/economia/macroeconomia/articulo/sector-salud-la-crisis-de-las-eps-se-agravo-por-cuenta-de-la-pandemia/202116/>.
20. https://www.nejm.org/doi/10.1056/NEJMoa1607141?url_ver=Z39.88-2003&rft_id=ori:rid:crossref.org&rft_dat=cr_pub%20%200www.ncbi.nlm.nih.gov.
21. [https://linkinghub.elsevier.com/retrieve/pii/S2213-8587\(20\)30369-7](https://linkinghub.elsevier.com/retrieve/pii/S2213-8587(20)30369-7).
22. *Nefrol Latinam* 2017; **14** (19): 12-21
23. <https://www.iarse.org/uploads/Shared%20Value%20in%20Spanish.pdf>. Front
24. *Pharmacol* 2021; Jul 12 (12): 634561. doi: 10.3389/fphar.2021.634561. eCollection 2021.
25. **Levy et al.** *Deabetology and Metabolic Syndrome* 2010; (2):16
26. *Diabetes Ter* 2021; **12**: 1901-1914.
27. *Frontiers in Pharmacology* 2012; May, (12).
28. Piketty Thomas. Una Breve Historia de la Igualdad. Ariel. 2021
29. IMDb, Lincon (2012), citas.

