Understanding public perception of the need for major change in Latin American healthcare systems

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Abstract

The opinions and experiences of the public regarding health services are valuable insights into identifying opportunities to improve healthcare systems. We analyzed the 2012–2013 Public Opinion Health Policy Survey carried out in Brazil (n = 1486), Colombia (n = 1485), El Salvador (n = 1460), Jamaica (n = 1480), México (n = 1492) and Panama (n = 1475). In these countries between 82 and 96% of participants perceived that their health systems needed fundamental changes. The most frequent barrier to access to healthcare was lack of the primary medical home, difficulties in obtaining medical care during the weekends and financial barriers. Type of health insurance and challenges in obtaining medical care during the weekends were associated with an increased opinion for the need for fundamental changes in healthcare systems, whereas having a primary medical home showed a protective effect. Focusing on tackling organizational and financial barriers and ensuring access to a primary medical home should be placed on the agenda of Latin American countries.

Keywords: Barrier to access, Brazil, Colombia, El Salvador, healthcare systems, Jamaica, México, Panama, public opinion
**Key Messages**

- In Brazil, Colombia, El Salvador, Jamaica, México, and Panama between 82 and 96% of participants of Public Opinion Health Policy Survey perceived that their health systems needed fundamental changes.
- The health systems of these countries need to focus on tackling contextual determinants such as organizational and financial barriers and ensuring access to the primary medical home to facilitate access, reduce out-of-pocket expenses and improve the perception of users.

**Introduction**

During the last two decades, Latin American and Caribbean countries (LAC) have been engaged in an ongoing process of healthcare reforms with the objectives of reaching universal access to health services, reducing inequities, providing financial protection, renewing models of primary healthcare (PHC) services and improving the health status of the population. Brazil, Colombia, El Salvador, Jamaica, Mexico, and Panama are within this trend of reforms. The progress of these countries is visible in terms of the increase in health expenditures and reduction of out-of-pocket expenditures, despite their differences in population size, type of healthcare system and healthcare coverage (Table 1).

**Overview of the health systems reforms**

In 1988, Brazil implemented the Unified Health System (SUS), a highly decentralized National Health Service with a constitutional right to universal access and focus on community-based primary care services. Federal, state, and municipal funds finance the public healthcare system. All Brazilians are entitled to receive healthcare services. Federal, state, and municipal funds finance the public healthcare system. In 2009, the private companies covered 54.8 million beneficiaries (Giedion et al. 2010). In 1998, the Family Health Strategy began to provide PHC services through multi-professional health teams, each serving up to 4000 persons. By 2014, the PHC network had reached 62% of the Brazilian population (Macinko and Harris 2015).

The basis of the healthcare system in Colombia is the Comprehensive Social Security in Health (SGSSS), which is a national health insurance system. In 2013, the government approved Bill 2010 aimed at providing a balanced health coverage and enhancing financial protection for all citizens. Private providers play a crucial role; 70% of health providers belong to the private sector (Giedion et al. 2010). Since 2012, the Colombian Ministry of Health (MoH) has promoted the Primary Health Care Strategy to unify health benefit plans, reach universal health coverage, assure portability of benefits and guarantee financial sustainability (Vice-Ministry of Public Health and Services 2012).

In 2009, El Salvador initiated a reform of its healthcare system under the principles of solidarity, equity, universal coverage with quality and opportunity and at no cost at the point of service delivery (Ministry of Health, El Salvador 2015). The MoH lacks an explicit package of benefits; it delivers healthcare according to the capacity of the providers. Most healthcare services are public. The MoH implemented a PHC strategy through Community Teams of Family Health (ECOS-F) and Community Teams of Specialized Care (ECOS-E) that are integrated networks of PHC (Ministry of Health, El Salvador 2011). In 2014, the ECOS-F covered 75% of the population in rural areas and 25% in urban settings (Ministry of Health, El Salvador 2015).

Jamaica National Health Service provides healthcare at a subsidized cost. In 1988, the government abolished user fees with the aim to provide free healthcare; nonetheless, citizens still must pay rates proportional to their income (Commonwealth Health Online) and 13.5% of the population seek private healthcare (Giedion et al. 2010; Pan American Health Organization 2015). The National Health Fund provides subsidies for the treatment of 15 chronic conditions; therefore, a copayment that can be up to 53% of the discounted cost of medicines is required (Chao 2013). Furthermore, the country has an ongoing program to expand the supply of PHC services (Government of Jamaica, Ministry of Health 2014).

Mexico has several complex and fragmented health systems. The MoH provides healthcare to the population without social security affiliation. The MoH is decentralized at a state level and its central financing mechanism is the non-contributory health insurance program ‘Seguro Popular’, which has an explicit package of benefits and covers 46.3% of the population. Nationwide social security institutions provide healthcare to workers in the formal labor market, government employees and members of the military (38.9% of the population). The private health insurance market covers 6% of the population. There are also a growing number of individual and corporate private providers that deliver almost half of the health services in the country. The fragmented system has prompted wide variability in coverage and quality of PHC services (Saturno et al. 2014).

In 2010, the MoH of Panama defined a three-pronged health policy: to protect the population through regulation and governance of healthcare, improve quality and access to healthcare and promote social participation. Panama’s health sector covers 90% of the population (MoH 14.4%, Social Security 75.6% and private sector 6%). The MoH provides healthcare at no cost regardless of the complexity of the illness. The MoH and Social Security do not have an explicit package of benefits and lack standards of healthcare (Ministry of Health, Panama 2010). The amount and type of services provided varies from one institution to another and is restricted to the capacity and resources available. PHC services are on the agenda of the Social Security. In 2012, the government launched the ‘Plan to Modernize Primary Healthcare’ and built 12 networks with 58 primary care facilities (Panama America 2014).

The reforms of the health systems described earlier aimed at improving access, expanding coverage and providing financial protection; yet, the research questions concerning the experiences and opinions of LAC users regarding their healthcare system remain unanswered. Public experience, opinion and satisfaction with healthcare represent valuable insights for health systems to evolve and improve because they allow identifying differences in context and opportunities for improvement (Bleich et al. 2009; Papanicolas et al. 2013; Munro and DUCKETT 2015).
Studies from developed countries in America and Europe report that users’ satisfaction was associated with the public perception of healthcare affordability (Papanicolas et al. 2013). In the United Kingdom, public satisfaction with the health system declined in parallel with the rating of the primary care physician (Papanicolas et al. 2013). In China, health insurance and personal responsibility for meeting healthcare costs were positively associated with public satisfaction with healthcare systems, whereas perception of unequal access and unethical providers were associated with dissatisfaction (Munro and Duckett 2015). In Russia and Israel, copayments were associated with dissatisfaction (Shmueli 2003; Footman et al. 2013). Factors external to healthcare also relate public expectations with satisfaction. Younger and older ages, low education, rural residency and better health status are associated with low expectations and high public satisfaction (Shmueli 2003; Footman et al. 2013; Munro and Duckett 2015).

The framework to analyze public perception can be constructed through the experiences of users with access to healthcare. Access is the actual use of personal health services and everything that facilitates or impedes their use (Andersen and Davidson 2001). For example, having health insurance is a facilitator, but the user should overcome institutional, transportation and financial barriers that may delay or halt access. Additionally, because PHC services are the port of entry to receive healthcare, the concept of ‘primary care medical home’ (Rosenthal 2008) can complement the analysis of access. Primary care medical home has four attributes: (a) availability of a regular physician or place of care, (b) knowledge of the providers about the patient’s medical history, (c) accessibility to reach the clinics by telephone during regular office hours and (d) coordinated care between the PHC provider and other health professionals (Schoen et al. 2007).

The importance of public insights about access to healthcare prompted carrying out a Public Opinion Health Policy Survey. This paper analyzes how facilitators and barriers for access and having a primary care medical home can be associated with the public opinion of the need for significant changes in health systems of these six LAC countries.

**Study data and methods**

We performed a secondary data analysis of the Public Opinion Health Policy Survey on perceptions and experiences with healthcare systems in Latin America. The survey has national urban representative data from each of the six countries. During 2012 and 2013, data were collected through telephone interviews. Countries...
were selected based on the magnitude of the health reforms and the feasibility of implementing the survey. A nationwide sample list of households served to contact the potential participants. The sampling frame included Random Digit Dialing (RDD) cell phones and landline numbers acquired from the targeted cities. In the surveyed countries the landline coverage is 15-20/100 persons, whereas the mobile phone subscribership is 90–125/100 persons, achieving mobile network coverage of 90% (U.S. Central Intelligence Agency 2016; Sharma and Arese Lucini 2016).

The Harris Interactive firm (The Harris Poll 2015) conducted the telephone interviews through a CATI (Computer Assisted Telephone Interviewing) Over the Web (COW) system. The CATI software allows randomization of eligible household members based on their initials.

The survey used an adapted version of the questionnaire that the Commonwealth Fund and Harris Interactive firm applied in Europe, Australia, Canada and the United States (Schoen et al. 2007). Detailed information of the sampling design, adaptation and pretest of the survey questionnaire and data collection strategy in each country were published elsewhere (Doubova et al. 2016).

The survey included between 1501 and 1505 adults per country. Selection criteria considered any household member ≥ 18 years of age. Only one adult per household was interviewed.

The response rates were as follows: Brazil 40.7%, Colombia 29%, El Salvador 43.8%, Jamaica 31.1%, Mexico 31% and Panama 33.8%. The response rate was calculated as follows: Completeness/Available Sample (not working phones, commercial phones + ineligible <18+ refusals). The questionnaire gathered information on age, gender, education, household size and socio-economic status. This information served to establish the target survey weights for the sample. The Harris Interactive firm also applied the Random Iterative Method (RIM) of weighting (Dorofeev and Grant 2006) to determine the survey weights using the data from recent National Census in each country. After performing RIM weighting, each participant resulted with a single weight value. Individual weight values were then standardized to limit any extreme weighting or outliers.

Study variables

The dependent variable was the participant's opinion of the healthcare system. The question that assessed this variable was: 'Which of the following statements comes closest to expressing your overall view of the healthcare system in this country?' The response options were as follows: 1) On the whole, the system works fairly well and only minor changes are necessary to make it work better. 2) There are some positive aspects to our healthcare system, but fundamental changes are needed for improvement. 3) Our healthcare system has many problems and needs to be completely rebuilt. 4) Not sure. 5) Declined to answer. We split the responses into two categories: 0 = no need for fundamental change; 1 = need for fundamental changes or complete rebuilding.

The study examined six independent variables:

1. Type of health insurance (HI) divided into four categories: A—without HI, B—private HI, C—government tax-based healthcare that included HI with explicit package of benefits and provision of healthcare on demand without an explicit package of benefits and D—social health insurance.
2. Organizational barriers to make appointments: The respondent missed a medical test, treatment, or follow-up visit due to being unable to arrive at the appointment because of organizational constraints.
3. Organizational barriers to attend after hours: The respondent had difficulties in obtaining medical care during the evenings, weekends, or holidays without going to the emergency room.
4. Transportation barriers: The respondent did not visit a healthcare provider because of transportation difficulties.
5. Financial barriers: The respondent answered 'Yes' to at least one of the following statements: (1) I had a medical problem but I did not visit the physician because of the cost. (2) I skipped a medical test, treatment, or follow-up visit because of the cost and (3) I had serious problems paying any health-related out-of-pocket expenditures.
6. Primary care source with essential attributes of a medical home: This variable was constructed as proposed by Schoen et al. (2007). The respondent had medical home when the answer was 'yes' to each of the following statements: (a) The respondent has a regular physician or place of care. (b) The physician/staff always or often know relevant information about the patient's medical history. (c) The healthcare facility is easy to contact by telephone during regular office hours. (d) The physician/staff at the source of care always or often helps to coordinate care with other physicians or sources of care. Participants with a negative response to any question were classified as without medical home.

The study covariates were participants' characteristics: sex, age, education, chronic disease and self-rated health. We identified that the respondent was suffering from a chronic disease if he/she had been informed by a physician of having arthritis, asthma or other chronic lung disease, cancer, diabetes, heart disease, hypertension or depression. The variable 'general self-rated health' was categorized as good (excellent, very good, good) and poor (fair, poor and not sure).

Statistical analysis

Data were weighted using the survey sampling weights. Descriptive statistics was used to depict the general characteristics of the study population. To evaluate the association between barriers to access, having a primary care medical home (as independent variable) and the public perception of the need for significant changes in healthcare systems (dependent variable), we performed a weighted multiple Poisson regression with robust variance model for each country. The coefficients represent prevalence ratios (PR); its interpretation is the same as for risk ratios. Each model was controlled for sex, age, education, presence of chronic disease and self-rated health as potential confounders. This statistical test was used as recommended for cross-sectional studies with high prevalence binary outcomes (Barros and Hirakata 2003). The analysis was performed using the software STATA 10.

Results

General characteristics of the sample

The analysis included 8878 participants (Brazil 1486, Colombia 1485, El Salvador 1460, Jamaica 1480, Mexico 1492, Panama 1475). More women than men responded to the interview. El Salvador had more young participants (9.4%), whereas Panama and Jamaica more often had participants >60 years of age (19.4% and 15.7%, respectively). The proportion of participants with secondary school education or less ranged from 18.5% in Jamaica to 63.6% in...
Brazil. Colombia had the lowest percentage of participants with chronic diseases (25.6%) and Jamaica had the highest (49.1%). Most participants perceived their health status as good, ranging from 78.2% in México to 83.6% in Brazil (Table 2).

Health insurance status, perceived barriers to access, primary care medical home and overall view of the healthcare system

A high proportion of participants from Jamaica and El Salvador reported not having HI (43.5% and 43.7%), Mexico (12.4%), Colombia (41.1%), Panama (1.5%) and Brazil (0%) had lower proportions of participants without HI. Colombia showed the lowest proportion of private HI (5.4%) and Jamaica the highest (26.8%). The government tax-based healthcare that included HI and healthcare on demand ranged from 4.8% in El Salvador to 76.9% in Brazil. Social HI was high in Colombia (70.1%) and low in Brazil (6.3%) (Table 3).

The most frequent barrier to access to healthcare was ‘difficulties in obtaining medical care during the evenings, weekends or holidays.’ The range was from 48.7% in Colombia to 75.5% in El Salvador. The barrier ‘not being able to schedule a medical visit’ ranged from 14.8% in Mexico to 24.5% in Jamaica. Transportation barriers ranged from 7.6% in Panama to 15.8% in El Salvador. Financial barriers were reported more often in Jamaica (56.9%), whereas Colombia had the lowest percentage (23.1%). In all six countries, a small percentage of participants reported having a primary care source where their medical history was known, available and helped to coordinate care. The proportions ranged from 10.6% in Brazil to 22.6% in Jamaica.

Most participants considered that the healthcare system of their country needed fundamental changes or complete rebuilding. The percentages ranged from 96% in Brazil to 82.6% in Mexico.

Factors associated with the public opinion of the need for fundamental changes in the healthcare systems

Several country-specific factors were associated with the public opinion of the need for significant changes in the healthcare systems. The type of HI was associated with an increase in overall opinion of the need for significant changes in Colombia and El Salvador. In México, being affiliated with a government health insurance program showed a protective effect for having this opinion. The variable ‘not able to schedule a medical visit’ was associated with the view that the system needed significant changes in México and El Salvador. The variable ‘difficulties in obtaining medical care during evenings, weekends or holidays’ was also associated with the need for major changes in all countries, except México. The prevalence ratios were significant in Colombia, Brazil, El Salvador, Panama and Jamaica. Financial barriers were associated with the need for major changes in Brazil. However, in El Salvador, this factor showed a protective effect. Finally, having a primary care medical home showed a protective effect on the opinion of the need for fundamental changes to the healthcare system in Colombia, Brazil and El Salvador (Table 4).

Discussion and policy implications

The main results of this study indicate that public opinion must matter as an important source of insights for health systems improvements. Health reforms of these six LAC countries have been directed towards increasing access and providing financial protection. Subsidized HI or provision of healthcare at no cost for the user and the ongoing strategies to strengthen primary care networks are tangible in these countries; nonetheless, 8/10 participants perceived that their health systems needed fundamental changes.

In developed countries, public opinion in evaluating and improving health systems and services is widely recognized. Since 1998, the Commonwealth Fund has performed periodic International Public Opinion Health Policy Surveys in European countries, U.S., Canada and Australia. The surveys measure public perceptions and experiences with healthcare systems, allowing comparisons among countries and over time (Schoen et al. 2007).

The results of this study are in accordance with the report of 17 LA countries in which about half of the participants (47%) answered that they were unsatisfied with the healthcare to which they
had access. Dissatisfaction with healthcare was highest in Brazil (67%), México (41%), Panama (39%), Colombia (38%) and El Salvador (35%) (Kim et al. 2013).

It is pertinent to contextualize the results considering country-specific differences. These countries have different types of contributory and non-contributory health insurance or National Health Systems. Only Colombia and México have explicit benefit packages for the population.

**Availability of health insurance influences public opinion**

In Mexico, having government tax-based HI showed a protective effect. In Colombia, being affiliated with a health insurance program was associated with the opinion for the need for a significant change. Not having health insurance, but being aware that the government provides healthcare on demand at no cost, caused mixed responses. In Brazil, most participants knew that the government was the principal provider of healthcare; no one considered being without the right to receive healthcare. Participants from El Salvador answered that not having health insurance should fuel a significant change of the healthcare system.

**Barriers to access healthcare help to explain public dissatisfaction with the health system**

Public experience about organizational barriers was quite similar among participants. The availability of healthcare during evenings or weekends is an unresolved problem in these six countries and in five of the countries was associated with an opinion for the need for major changes of healthcare systems. However, obstacles to transportation were not significant probably because only urban dwellers responded to the survey. A cross-sectional study conducted in Brazil and Colombia identified several barriers. In Brazil, participants considered that the limited availability of health centers, physicians and medications incurred long waiting times. Participants from Colombia related the barriers to the insurers’ authorizations for users to receive certain services (García-Subirats et al. 2014). In another study in Colombia, the limited time slots available for appointments with specialists, denials of permission for surgeries and medications and economic and geographic constraints were the main obstacles to access health services (Hernández et al. 2015). In Mexico, the evaluation of access to healthcare for persons affiliated with Seguro Popular identified severe deficiencies in infrastructure, human resources and provision of medications at the MoH facilities (National Council for Evaluation of Social Development Policy 2014).

**Financial barriers: still an unresolved challenge**

This finding was more visible in Jamaica and El Salvador where half of the participants encountered this barrier. This can be explained by the fact that, in Jamaica, the National Health Fund drug subsidy program only benefits 15% of the population and the abolition of user fees did not decrease out-of-pocket health expenses. The poor still pay a high proportion of their income. The situation causes implicit rationing because the supply side has not increased in parallel with the increasing demand. In El Salvador, health-related out-of-pocket expenditures reach 85% as a percentage of the private health expenditures; 62% of such expenditures are for the purchase of medications (Ministry of Economy, Department of Statistics and Census of El Salvador 2008). The multivariate model identified an association of the financial barriers with the need for major changes in Brazil, whereas this factor showed a protective effect in El Salvador, signaling that the participants did not relate financial barriers to the need for major changes in their healthcare system.
Table 4. Factors associated with the public perception of the need for fundamental changes of healthcare systems*

<table>
<thead>
<tr>
<th></th>
<th>Brazil</th>
<th>Colombia</th>
<th>El Salvador</th>
<th>Jamaica</th>
<th>Mexico</th>
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<tbody>
<tr>
<td></td>
<td>n = 1473</td>
<td>n = 1436</td>
<td>n = 1406</td>
<td>n = 1378</td>
<td>n = 1479</td>
<td>n = 1450</td>
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<td>Adjusted PR [95% CI]</td>
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<td><strong>Type of health insurance</strong></td>
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<tr>
<td>Without HI</td>
<td>N/A</td>
<td>0.85 [0.68–1.06], 0.162</td>
<td>1.04 [1.01–1.09], 0.040</td>
<td>0.99 [0.92–1.07], 0.807</td>
<td>1.00 [0.91–1.09], 0.992</td>
<td>0.73 [0.50–1.07], 0.109</td>
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<tr>
<td>Private HI</td>
<td>1.03 [0.96–1.10], 0.479</td>
<td>1.02 [0.89–1.15], 0.776</td>
<td>1.05 [0.97–1.14], 0.228</td>
<td>0.99 [0.92–1.07], 0.837</td>
<td>0.94 [0.82–1.07], 0.329</td>
<td>1.01 [0.96–1.06], 0.625</td>
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<tr>
<td>Government HI</td>
<td>0.99 [0.93–1.07], 0.983</td>
<td>1.09 [1.02–1.18], 0.018</td>
<td>1.03 [0.94–1.14], 0.500</td>
<td>1.03 [0.94–1.12], 0.544</td>
<td>0.91 [0.83–0.9], 0.043</td>
<td>1.04 [0.97–1.10], 0.248</td>
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<td>Social health insurance</td>
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<td>Not able to schedule a medical visit</td>
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<td>Yes</td>
<td>1.01 [0.99–1.03], 0.065</td>
<td>1.06 [0.98–1.14], 0.169</td>
<td>1.06 [1.01–1.12], 0.037</td>
<td>1.04 [0.98–1.10], 0.172</td>
<td>1.09 [1.02–1.18], 0.018</td>
<td>1.04 [0.99–1.11], 0.138</td>
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<td>No</td>
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<tr>
<td>Not applicable</td>
<td>1.02 [0.98–1.05], 0.355</td>
<td>1.41 [1.02–1.94], 0.56</td>
<td>0.55 [0.23–1.28], 0.164</td>
<td>1.17 [1.08–1.28], 0.000</td>
<td>1.09 [0.95–1.24], 0.204</td>
<td>1.06 [1.00–1.12], 0.030</td>
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<tr>
<td>Difficulties in getting medical care in the evenings, on weekends, or holidays</td>
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<td>Yes</td>
<td>1.07 [1.01–1.12], 0.012</td>
<td>1.23 [1.10–1.37], 0.000</td>
<td>1.08 [1.01–1.15], 0.030</td>
<td>1.09 [1.03–1.14], 0.001</td>
<td>1.06 [0.98–1.16], 0.153</td>
<td>1.09 [1.03–1.16], 0.004</td>
</tr>
<tr>
<td>No</td>
<td>1.09 [1.04–1.16], 0.000</td>
<td>1.22 [1.08–1.37], 0.001</td>
<td>1.10 [1.02–1.20], 0.019</td>
<td>1.07 [0.95–1.21], 0.250</td>
<td>0.95 [0.81–1.11], 0.484</td>
<td>1.01 [0.90–1.14], 0.812</td>
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<td>Transportation barriers</td>
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<td>Yes</td>
<td>1.00 [0.98–1.02], 0.816</td>
<td>0.99 [0.89–1.11], 0.943</td>
<td>1.02 [0.97–1.08], 0.392</td>
<td>0.92 [0.84–1.02], 0.101</td>
<td>0.91 [0.81–1.03], 0.148</td>
<td>1.01 [0.94–1.08], 0.739</td>
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<td>Not applicable</td>
<td>1.02 [0.99–1.06], 0.156</td>
<td>0.80 [0.52–1.23], 0.321</td>
<td>1.57 [0.87–2.85], 0.135</td>
<td>0.83 [0.62–1.11], 0.210</td>
<td>1.04 [0.93–1.17], 0.458</td>
<td>1.11 [1.02–1.20], 0.014</td>
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<td>Financial barriers</td>
<td>1.05 [1.03–1.07], 0.000</td>
<td>1.03 [0.96–1.11], 0.416</td>
<td>0.95 [0.90–0.99], 0.025</td>
<td>1.01 [0.96–1.06], 0.697</td>
<td>0.99 [0.92–1.08], 0.925</td>
<td>0.99 [0.95–1.04], 0.803</td>
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<tr>
<td>Primary care medical home</td>
<td>0.91 [0.84–0.99], 0.023</td>
<td>0.83 [0.75–0.93], 0.001</td>
<td>0.83 [0.76–0.95], 0.003</td>
<td>0.97 [0.91–1.04], 0.393</td>
<td>0.96 [0.88–1.05], 0.386</td>
<td>0.97 [0.91–1.03], 0.375</td>
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<td><strong>Covariates used for adjustment of the model for confounders</strong></td>
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<td>Female</td>
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<tr>
<td>Age &lt; 20</td>
<td>1.01 [0.98–1.03], 0.653</td>
<td>1.06 [0.99–1.13], 0.887</td>
<td>0.96 [0.92–0.99], 0.041</td>
<td>1.03 [0.98–1.08], 0.237</td>
<td>1.01 [0.95–1.07], 0.779</td>
<td>0.97 [0.93–1.01], 0.114</td>
</tr>
<tr>
<td>Age 20–39</td>
<td></td>
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<tr>
<td>Age 40–59</td>
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<tr>
<td>Age ≥ 60</td>
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<tr>
<td><strong>Schooling</strong></td>
<td></td>
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<tr>
<td>Secondary school or less</td>
<td></td>
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<tr>
<td>Post-secondary or higher</td>
<td>1.03 [1.01–1.06], 0.015</td>
<td>1.11 [1.04–1.18], 0.001</td>
<td>0.98 [0.92–1.03], 0.428</td>
<td>1.04 [0.96–1.13], 0.334</td>
<td>0.96 [0.89–1.02], 0.185</td>
<td>1.02 [0.96–1.07], 0.544</td>
</tr>
<tr>
<td>Not sure/deny to answer/missing</td>
<td>1.06 [0.99–1.12], 0.053</td>
<td>0.83 [0.51–1.34], 0.447</td>
<td>1.02 [0.97–1.07], 0.521</td>
<td>0.99 [0.88–1.13], 0.970</td>
<td>1.13 [0.98–1.32], 0.092</td>
<td>1.01 [0.95–1.08], 0.695</td>
</tr>
<tr>
<td>Chronic disease</td>
<td>0.99 [0.95–1.03], 0.715</td>
<td>0.94 [0.87–1.01], 0.107</td>
<td>0.99 [0.94–1.05], 0.920</td>
<td>0.98 [0.94–1.02], 0.386</td>
<td>0.99 [0.92–1.08], 0.882</td>
<td>0.96 [0.91–1.02], 0.230</td>
</tr>
<tr>
<td>Poor self-rated health</td>
<td>0.97 [0.92–1.03], 0.349</td>
<td>1.04 [0.96–1.13], 0.298</td>
<td>0.99 [0.94–1.05], 0.731</td>
<td>0.99 [0.93–1.05], 0.734</td>
<td>1.13 [1.04–1.12], 0.002</td>
<td>0.99 [0.94–1.06], 0.961</td>
</tr>
</tbody>
</table>

aWeighted multiple Poisson regression with robust variance model. The bold values highlighted the statistically significant adjusted PR (prevalence ratios).
Primary care with essential attributes of medical home requires reinforcement

In our sample, primary care medical home ranged from 10.6% in Brazil to 22.6% in Jamaica, whereas in high-income countries like Australia, Canada, Germany, the Netherlands, New Zealand, United Kingdom and USA, up to 60% of adults reported having a primary care medical home (Schoen et al. 2007). In Colombia, Brazil and El Salvador, having a primary care medical home also showed a protective effect on the opinion of the need for fundamental changes to the healthcare system. Reinforcement of primary care is an ongoing effort in these countries. However, most of these countries need to strengthen their networks of PHC facilities and redirect the model of care to be patient centered and with the characteristics of primary medical home (e.g. primary care clinic that is easy to contact and a regular healthcare provider who has relevant information about the patient and helps to coordinate care with other healthcare providers).

In most LAC countries, availability of a regular physician or place of care is challenging because the contracting conditions are not attractive, particularly for physicians working in difficult to reach areas. Turnover and absenteeism of health personnel is frequent. The providers know little about the patient’s medical history due to the constant turnover and most clinical records are still in paper form, making these records easy to lose. Convenience in reaching the clinics by phone during regular office hours and coordinated care through the primary provider with other suppliers is difficult due to organizational flaws and poorly equipped health services. It is worthwhile to continue efforts to improve the primary care medical home because it has been shown to be associated with better health at the individual and population levels, increased effectiveness and efficiency of health services delivery, and with the potential to reduce health disparities between the rich and the poor (Starfield and Shi 2004).

Study limitations

This study has several limitations. First, the results should be interpreted considering the characteristics of the participants because this was a telephone interview and the study population was restricted to urban dwellers with landlines or mobile telephones. Second, the survey did not include rural populations; thus, the results are representative only for urban populations that range from 55% in Jamaica to 86% in Brazil. Third, there was a low response rate; therefore, we applied survey sampling weights to overcome the potential selection bias and to ensure that the study results were generalizable to the survey target population. Fourth, the six Latin American countries were selected by convenience; therefore, differences from these countries cannot be generalized to other countries in the region. Fifth, the survey offers cross-sectional information; thus, it is not possible to make inferences about causal relationships or the direction of the association between independent factors and public opinion.

Policy implications

According to the opinion of >80% of healthcare users from Brazil, Colombia, El Salvador, Jamaica, Mexico and Panama, fundamental changes to strengthen healthcare systems are urgently needed in these countries. Such changes should focus on the main shortcomings identified by the public and associated with their opinion of the need for changes.

The main shortcomings that should be addressed in all six countries relate to financial and organizational barriers (e.g. out-of-pocket expenditures and receiving medical care during the evenings and weekends) and to the lack of the primary care source with the key attributes of a medical home. Furthermore, access through health insurance should be amplified for those without HI, especially in El Salvador, as well as for those affiliated with social health insurance in Colombia. Enhanced strategies to tackle the above-mentioned deficiencies should remain on the agenda of health reforms and its evaluation activities which, in turn, should include public opinion.

Conflict of interest statement. None declared.

References


