Social determinants of health, equity and the COVID-19 pandemic in the Americas

Sebastian Garcia Saiso
Director ELH

May 18, 2021.
Content

1. Pandemics are not socially neutral
2. The Social Determinants of Health
3. Persistent Inequality
4. Health inequalities and Covid19
5. Covid19 economic impact
6. The road to 2030 is now a postpandemic road
Pandemics are not socially neutral events

The social determinants of health conceptual framework

Source: Amended from Solar & Irwin, 2007
Persistent inequality in the three dimensions of sustainable development

<table>
<thead>
<tr>
<th></th>
<th>2000</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>GDP per capita (int. $ constant)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>lowest</td>
<td>4,738</td>
<td>6,488</td>
</tr>
<tr>
<td>lower</td>
<td>8,461</td>
<td>11,978</td>
</tr>
<tr>
<td>median</td>
<td>13,314</td>
<td>18,534</td>
</tr>
<tr>
<td>higher</td>
<td>18,399</td>
<td>24,619</td>
</tr>
<tr>
<td>highest</td>
<td>45,155</td>
<td>60,670</td>
</tr>
</tbody>
</table>

| Education attained (years) | | |
| lowest | 7.1 | 9.4 |
| lower  | 8.1 | 10.4 |
| median | 9.4 | 11.4 |
| higher | 13.1 | 12.1 |
| highest| 13.1 | 13.6 |

| Access to basic sanitation (%) | | |
| lowest | 54.0 | 69.8 |
| lower  | 73.4 | 87.2 |
| median | 82.3 | 90.4 |
| higher | 88.3 | 93.5 |
| highest| 98.9 | 99.5 |

PAHO Health in the Americas 2020; Washington DC: 2021 (upcoming)
**SDG-3 protopandemic precursors in the Americas**

Successful improvements in regional averages — no sizable changes in inequalities

- **maternal mortality (MDG 5)**
  - Target: reduce 3/4 from 1990 to 2015
  - Outcome: 101.8 (1990); 51.7 (2015)

- **child mortality (MDG 4)**
  - Target: reduce 2/3 from 1990 to 2015
  - Outcome: 42.6 (1990); 14.6 (2015)

- **tuberculosis incidence (MDG 6)**
  - Target: curb the incidence
  - Outcome: 55.7 (1990); 28.4 (2015)
Inequality gradients in SARS-CoV-2 prevalence, Brazil; May-June 2020

Cifuentes MP et al. J Epidemiol Community Health 2021 ahead of print [doi:10.1136/jech-2020-216275]
Excess mortality in Lima City by extreme wealth quintiles, 2020


3-day moving average

3. day moving average

age-standardized mortality rate (x 100,000 pop)

poorest quintile
richest quintile
lockdown

epidemiological week 2020
Social inequalities and covid-19 in Santiago de Chile City


Reductions in Life Expectancy due to COVID-19, USA 2020

Source: Andrasfay T, Goldman N. Proc US Nat Acad Sciences 2021 [https://doi.org/10.1073/pnas.2014746118]
Social capital, the determinants of health, and covid-19

social capital = social trust + group affiliation + civic engagement + confidence in state institutions

• 46 studies (mostly ecological, mostly from North America and Western Europe)

• 44 studies show that **disadvantaged groups are more negatively impacted** through:
  - higher COVID-19 infection rates
  - worse COVID-19 severity
  - lack of access to treatment
  - higher COVID-19 mortality rates

• Health gradients by employment category (higher infection rates for employees than for managers)

• Health gradients by race/ethnicity identity (higher infection rates in minorities)
Negative impacts associated to:

- Poverty and reliance on daily wages, or the informal economy
- Weak social assistance programs
- Deprived housing, deprived public areas and poor services
  - Housing and public area crowding
  - Poor sanitation and lack of hygiene facilities
- Poor health coverage and poor access to health care
- Poorly paid and poorly supported working conditions
- Poor/inappropriate information
- Living and working conditions requiring public transport / higher mobility

- 153/200 countries had offered cash transfers
- 94/200 offered financial obligations support
- 70% of Q1 in LMIC one member lost job
COVID-19 immediate economic impact

Extreme poverty prevalence
% total population
Regress into poverty 14 years

GDP growth rate
%

ECLAC/PAHO, July 2020
**COVID-19 immediate economic impact on income inequality**

<table>
<thead>
<tr>
<th>variation</th>
<th>country</th>
</tr>
</thead>
<tbody>
<tr>
<td>Between 1.0% and 1.9%</td>
<td>Guatemala</td>
</tr>
<tr>
<td></td>
<td>Paraguay</td>
</tr>
<tr>
<td>Between 2.0% and 2.9%</td>
<td>Honduras</td>
</tr>
<tr>
<td></td>
<td>Nicaragua</td>
</tr>
<tr>
<td>Between 3.0% and 3.9%</td>
<td>Bolivia</td>
</tr>
<tr>
<td></td>
<td>Costa Rica</td>
</tr>
<tr>
<td></td>
<td>Panama</td>
</tr>
<tr>
<td></td>
<td>Dominican Republic</td>
</tr>
<tr>
<td>Between 4.0% and 4.9%</td>
<td>Colombia</td>
</tr>
<tr>
<td></td>
<td>Uruguay</td>
</tr>
<tr>
<td>Between 5.0% and 5.9%</td>
<td>Brazil</td>
</tr>
<tr>
<td></td>
<td>Chile</td>
</tr>
<tr>
<td></td>
<td>El Salvador</td>
</tr>
<tr>
<td></td>
<td>Mexico</td>
</tr>
<tr>
<td>6.0% and more</td>
<td>Argentina</td>
</tr>
<tr>
<td></td>
<td>Ecuador</td>
</tr>
<tr>
<td></td>
<td>Peru</td>
</tr>
</tbody>
</table>

- The Gini index for the region would increase by 4.9 percentage points from 2019 to 2020.
- The increase would vary by country between 1% and 8%.
- Eight out of 10 people in the region (491 million people) will live with incomes below 3 poverty lines: $ 500 per month.

ECLAC, July 2020: projected variation in the Gini Index in 2020; Latin America (17 countries)
COVID-19 and inequalities in the social determinants of health: reciprocal impacts

SARS-CoV-2 transmission dynamics unveils and exacerbates social inequalities:
Neither the exposure nor the susceptibility to the infectious agent is homogeneously distributed in the population; they disproportionately concentrate in socially disadvantaged, vulnerable, and excluded groups.

Underlying social inequalities fuel SARS-CoV-2 transmission dynamics:
Lack of access to health care and to quality information in the socially disadvantaged leave them more exposed and more susceptible to the infectious agent.

The short-, medium- and long-term consequences of the COVID-19 inequality syndemic are structural, multidimensional, and intersectional: immunization, infant mortality, maternal mortality, nutrition, fertility, domestic violence, mental health, chronic conditions, discrimination, alienation, and other numerous and unfairly distributed health and social spill over effects....
The sense of urgency to address and eliminate unfair inequalities in the opportunities for health and well-being on the road to universal health and sustainable development has been suddenly fuelled by the emergence of the new coronavirus pandemic, which has dramatically exposed and amplified social inequalities and, therefore, health inequalities.

The road to 2030 is now a post-pandemic road and, consequently, society as a whole should review and rethink its priorities toward building resilient systems to combat future pandemics.

Health policy makers must recognize the primacy of the principle of equity: equity is a societal value with a central role in social decision-making, the conduct of civilized life, the identity of peoples and institutions, and the promotion of population health.

In this post-pandemic future, health policy accountability on pro-equity decisions and actions will be better informed if guided by explicit measurable goals for health inequality reduction/elimination.