

## Cuba's success in child health: what can one learn?

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Cuba has excellent child health as illustrated by its low child mortality rates. Child mortality rates (under 5 years, infant and neonatal) in Cuba have all been lower than in the USA for many years. WHO figures for 2016 for under 5 child mortality (U5M) show that Cuba has a U5M rate of 5.5 per 1000 live births, whereas the USA has a U5M rate of 6.5 and Costa Rica has a rate of 9.7.<sup>1</sup> Cuba has the second-lowest U5M in the Americas behind Canada with a rate of 4.9. U5M is considered to be an excellent indicator of child health by UNICEF.<sup>2</sup> Cuba is a middle-income country with considerable economic problems exacerbated by the blockade imposed by the USA. How then has it achieved such good child health outcomes?

Cuba's achievements in child health are due to a combination of factors.<sup>2,3</sup> Cuba has an integrated healthcare system with all sections cooperating fully. Universal healthcare and universal education are the basis for good health. Literacy is at 99.7% and this enables public health campaigns to reach the entire population. Free universal education has resulted in Cuba having one of the highest doctor-to-population ratios. Programmes, such as 'Educa a tu hijo' (educate your child), are in place to prepare young children for school.<sup>4</sup> This non-institutional-based programme was developed in rural areas, and subsequently extended throughout the country, as it was recognised that early child development is essential for child well-being.

Primary healthcare is a key feature of healthcare in Cuba. Almost half of all Cuban doctors work in primary healthcare. Primary healthcare exists both in urban and remote rural areas. The presence of health facilities even in remote rural areas is essential to ensure universal access to health. The primary healthcare team usually consists of a doctor and nurse working together in a consultorio (primary healthcare facility). Each team is usually responsible for approximately 300 families. The team know each family both medically and socially, which is important due

to the effect of social determinants on child health. There is a strong emphasis on the prevention of disease. Health promotion is a key feature of Cuban society and involves children's TV programmes as well as schools and the mass media. Healthy eating, the importance of handwashing and exercise alongside sexual health have all been featured in a variety of different campaigns.

There is a recognition that good antenatal care has a major impact on child health. During the pregnancy, each woman is seen at least 12 times.<sup>2</sup> Women with medical or social problems are seen more frequently. Screening for fetal congenital malformations is offered. One of the unique features of antenatal care in Cuba is the provision of maternity homes where women with medical or social problem are offered free residential accommodation for several weeks.<sup>5</sup> At the maternity home, women are given free meals to ensure adequate nutrition for both the women and the fetus. Education about the importance of diet and the minimisation of risk factors, such as alcohol and tobacco, is given. This multidisciplinary approach has seen Cuba achieve a significant reduction in the number of low birth weight (LBW) babies born.<sup>6,7</sup> LBW babies (<2.5 kg) account for 5.3% of all births in Cuba (2015 data).<sup>7</sup> In contrast, in the USA, LBW babies account for 8.3% births (2017 data).<sup>8</sup> Infant mortality rates are significantly higher for LBW babies. Cuba, thus, ensures that fewer babies are likely to be disadvantaged at birth.

Each child is seen regularly during infancy (fortnightly for the first 6 months and monthly between 6 and 12 months) and early childhood by the primary healthcare team. More frequent visits are arranged for infants with chronic illnesses. These checkups occur both in the patient's home as well as the family doctor surgery (the consultorio). This helps to ensure that health professionals have a true picture of family life. A comprehensive immunisation programme is in place



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**Table 1** Immunisation schedule in Cuba

Vaccine	Age
BCG	Birth
HepB	Birth
DTwPHibHep	2, 4 and 6 months
MenBC	3 and 5 months
OPV	<1, 1, 2 and 9 years
DTwP	18 months
Hib	18 months
MMR	1 and 6 years
DT	6 years
Typhoid	10, 13 and 16 years
TT	15 years

(table 1).<sup>9</sup> Cuba was the first Latin American country to eradicate poliomyelitis and as of 2016, had eradicated five other infectious diseases (neonatal tetanus, diphtheria, measles, whooping cough and rubella). In 2015, the WHO validated the elimination of mother-to-child transmission of HIV and syphilis in Cuba. Polyclinics provide a link between primary healthcare and hospitals. Paediatric specialists offer clinics in the polyclinic. This means that children can be assessed in the community without needing to attend the hospital. Polyclinics also offer clinical psychology support to children with mental health problems. This ensures a waiting time of only 1–2 weeks for children with mental health issues.

Breastfeeding rates are high (approximately one-third of infants exclusively breastfed for the first 6 months) and breastfeeding is encouraged by the primary healthcare team.<sup>10</sup> The nutritional state of children in Cuba is good, although obesity is increasing.<sup>10</sup> A positive attitude towards disability is encouraged. The presence of an educated population reduces misconceptions and stigma associated with diseases, such as epilepsy.

Empowerment of women in civil society has been a major achievement in Cuba. First, all girls attend school. Women have the same rights as men in Cuban law and receive equal pay. Maternity leave is 12 months and the women's job is protected by law. The majority of professionals in Cuba are women.<sup>11</sup> Additionally, the majority of Members of Parliament in Cuba are women, with Cuba having the second-highest proportion of women in parliament worldwide. This representation in parliament is a

### Box 1 Key factors in achieving excellent child health in Cuba

- ▶ Universal healthcare
- ▶ Universal education
- ▶ Focus on primary healthcare
- ▶ Immunisation programme
- ▶ Empowerment of women
- ▶ Political commitment of government
- ▶ Adequate nutrition

reflection of the importance of gender equality in Cuba. This empowerment is likely to be a contributory factor to child health in Cuba. Unlike many other Latin American countries, women are in full control of their sexual and reproductive health through the widespread availability of family planning clinics alongside specialised services. Different forms of birth control are available and abortion is provided where requested in a safe environment.

Socioeconomic determinants contribute to health, and to child health in particular. Inequality is a problem in Cuba, like all other countries. The greatest inequalities involve people working for foreign investment companies, self-employees, private workers and individuals working in the tourist industry, who may receive significantly more than official incomes. The Cuban government constantly looks at ways of reducing the inequalities by either raising salaries of state employees or increasing taxes in the private sector. Additionally, Cuba's welfare state ensures that nobody is destitute. Severe malnutrition in children was declared absent in Cuba by UNICEF over a decade ago and malnutrition is not considered a major problem in Cuba.<sup>12</sup> This is despite the problems caused by the economic blockade of Cuba by the USA. Inequalities between regions in Cuba are less than compared with other countries. Regional U5M rates for the years 2015–2018 show the highest rate in Guantanamo in the East (7.5) and the lowest in Pinar del Rio in the West (4.1).<sup>13</sup>

The Cuban government recognises health as a priority. This is of major importance and is recognised as such by groups, such as UNICEF.<sup>14</sup> It is unfortunate that many other governments do not show the same priority to health, and to child health in particular. Investment in people through health, education and social services has unfortunately resulted in less money being available for other services, such as roads, transport and housing. Cuba has shown that despite limited resources a country can achieve excellent child health if the government and citizens are committed to making health and children a priority. Cuba is an example of what is possible. The key factors for ensuring children healthy are listed in box 1.

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