



Research Article

COVID-19 PANDEMIC AND EFFECTS ON MATERNAL AND CHILD HEALTH

Dr Himanshu Sharma MBBS,MD

Officer Commanding, Station Health Organization, Allahabad, Uttar Pradesh, India

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ABSTRACT

When health care services are disturbed and availability of food is scarce either due to lack of purchasing power or decreased accessibility (due to any crisis /disaster, or in the current COVID -19 pandemic) there is an increase in child and maternal morbidity and mortality. Worldwide efforts are made to mitigate spread of COVID-19 disease and reduce morbidity and mortality from severe acute respiratory syndrome Corona virus 2. As of 20 May 2020 more than 3, 23,000 have died from COVID-19 and various studies show that millions will die in future. Due to the worldwide lockdown and fear of acquiring COVID-19 diseases, most of the individual stopped seeking health care. Further, government orders of staying at home leads to reduced purchasing power and inability to pay for health care services. Overcoming the negative impacts of the pandemic will require focus on maternal and child interventions even with the risk of COVID-19 transmission. Continued provision and implementation of these interventions is essential to save maternal and child lives.

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INTRODUCTION

When health care services are disturbed and availability of food is scarce either due to lack of purchasing power or decreased accessibility (due to any crisis /disaster, or in the current COVID -19 pandemic) there is an increase in child and maternal morbidity and mortality. Worldwide efforts are made to mitigate spread of COVID-19 disease and reduce morbidity and mortality from severe acute respiratory syndrome Corona virus 2. As of 20 May 2020 more than 3, 23,000 have died from COVID-19 and various studies show that millions will die in future. (1,2) Worldwide governments are managing COVID-19 pandemic at all the levels and policy makers are making guidelines for health care workers and general public (3). In making decisions stake holders must consider indirect health effects of the Covid-19 apart from imminent health effects. Studies of the previous outbreaks eg. Ebola Virus outbreak of 2014 in West Africa depict that the indirect effects were more severe than the outbreak of Ebola itself.(4) Data from different countries shows that mortality rate for COVID-19 is low in children and women of reproductive age (5) but these groups are vulnerable and can be affected by the disturbance of the health services especially in developing countries. Moreover, the vicious cycle of malnutrition, Vitamin A deficiency and lack of accessibility of routine immunisation (eg. measles vaccine) will lead to increase child morbidity and mortality in low-income and middle-income countries (LMICs).

Therefore there is a constant need to consider maternal and child health amid the COVID-19 pandemic and the consequences at stake.

MATERNAL AND CHILD HEALTH

Recently published study in The Lancet Global Health by Timothy Robertson and colleagues quantifies the potential indirect effects of COVID-19 and maternal and child mortality. It is a modelling study to estimate the indirect effects of the coronavirus pandemic on maternal and child mortality in LMICs.(6) They used the Lives Saved Tool (LiST) to estimate the additional indirect maternal and under-5 child deaths that could be indirectly attributed to COVID-19 pandemic response strategies. (7) They made model of three possible scenarios of reduction in the coverage of essential maternal and child health services and of an increased prevalence of wasting over 03, 06, and 12 months. These three hypothetical scenarios had different variables and grades of disruption of healthcare services. In first scenario, assumptions were mild reductions in the availability of health worker and supplies due to reallocation of resources to the COVID-19 pandemic response, accessibility to health services, movement restriction, fear of getting infection and economic challenges. Primarily, this lead to decrease in motivation for care seeking behaviour especially antenatal care (ANC) and postnatal care (PNC). Secondly, increase in out of pocket expenditure / travel cost and reduced income affected the accessibility of health services. In second scenario, assumptions were greater disturbance of health care system due to decreased work force,

**Corresponding author: Dr Himanshu Sharma*

Officer Commanding, Station Health Organization, Allahabad, Uttar Pradesh, India

preventive and curative services. Disruption of global, national, local supply chains resulted in decreased availability of contraceptive, routine child vaccines, ANC supplements and child birth accessories eg. Steroids, Uterotonics. Treatment for trivial child morbidity eg. ORS, antibiotic, antimalarial also became inaccessible. In third scenario, assumption were severe disturbance in health care system and international/national governments imposed lockdown forcing non essential worker to stay at home. These strict movement restrictions reduced the access to health care facilities by the health seekers indirectly. Findings of this study are devastating with astronomical rise in additional maternal and under-5 child deaths resulting from the potential disruption of health care systems and decreased access to food. Researchers estimated that reductions in the coverage of essential maternal and child health services of around 45% for 06 months would result in 1,157,000 additional child deaths and 56,700 additional maternal deaths.(6) They estimate that this data would represent a 9.8–44.7% increase in under-5 deaths per month and an 8.3–38.6% increase in maternal deaths per month, across the 118 countries included in their analysis. (6)

CONCLUSION

Due to the worldwide lockdown and fear of acquiring COVID-19 diseases, most of the individual stopped seeking health care. Further, government orders of staying at home leads to reduced purchasing power and inability to pay for health care services.COVID-19 pandemic is challenging for both developed as well as developing countries. There is also uncertainty over how COVID-19 will manifest further hindering governments efforts to curb its spread and reopen their battered economies. As such LMICs are suffering from various communicable and non communicable diseases and are hub of diseases like HIV, Tuberculosis, malnutrition, malaria apart from outbreaks of various infections leading to high morbidity and mortality. In addition to this LMICs are having poor health care infrastructure which cannot cope with the above mention health challenges as well as COVID-19 disease simultaneously. (8) World Health Organisation (WHO) is requesting all the nations to ensure the continuity of health care services and programmes along with fighting COVID-19. However, infodemic and fear due to misinformation may decrease or even reverse the progress achieved in various health indicators especially maternal and child mortality during the past few decades in LMICs. Children are not only at the risk of malnutrition and infection but also of loosing and being separated from their family members / care givers. It is very important to avoid indirect effects of COVID-19 on maternal and child health. National programmes should keep providing core maternal and child care services. Decreased access to clinics, schools, social workers, water and sanitation is a particular threat to the most vulnerable populations, and the lack of child protection is dangerous especially to women and children .Impending above all of these concerns is the threat of economic impact of both the pandemic control measures governments are taking and the global recession of post COVID-19 era (9). Overcoming the negative impacts of the pandemic will require focus on maternal and child interventions even with the risk of COVID-19 transmission. Continued provision and implementation of these interventions is essential to save maternal and child lives.

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