

Will Corona Virus Pandemic, be a Natural Balance Process given Signal to Convert Self-Centric Human system in an Ecological Sustained system?

Sachin D. Bansode

Assistant Professor, Department of Commerce, P.D. Lions College of Comm. & Eco

ABSTRACT

Alternative approach confines a direct relation to techno-economical development and exploitation of natural system, extinct several ecosystems and increase infectious diseases at the same time. Current intellectuals considered it as a fight between the nature and human but now there is a need to shift in current approach while considering development of human techno-economic system and while dealing with natural system instead of focusing only on a human compartmentalized narrow sense. Otherwise in due time, will natural balance process be signal by Corona Pandemic as deeply spread in a human race indiscriminately worldwide?

Keywords: Corona Virus, Natural Balance, Human System, Ecological Sustained System

INTRODUCTION

Development speed of human civilization in last 300 years geared-up due to advent of technology, energy and market economy resulted into exponential growth of several sectors especially of science, technology and finance on one hand and on other hand several human and natural calamities has raises with several infectious diseases spread globally during same time also adversely affect on health, well-being of people and especially in economic setback experienced periodical depression, slowdown, volatility in profit and global financial market.

Today's human society is purely based on Profit motive and Self-centric approach of development, which leads huge pressure on ecosystem to supply raw material for production and consumption activity resulted in air, water, soil pollution affecting on all living organism. Rapid economic growth widen social inequality, exploitation of natural resources, raising gap in living standard, due to climate change man-made and natural disasters increases globally.

250 years of industrial growth create natural reaction process invisible and polluted atmosphere affects living organisms. So it's crucial to redesign basic concepts and questions from ecological prospective and not commercial angle only for inclusive-sustainable growth.

LITERATURE REVIEW

K. E. Jones (2008) in edited article Global trends in emerging infectious disease stated that Nipah virus in 1998 Malaysia was linked of pig production at the edge of tropical forests where the fruit bat reservoirs live, origins of SARS and Ebola viruses have to bats that are hunted or inhabit regions under increasing human development.

S. S. Morse (2012) edited Prediction and prevention of the next pandemic zoonosis Lancet 370% of infectious diseases originate in animals mainly in wildlife and its emergence from complex interactions among wild, domestic animals and humans.

D. Tilman and M. Clark (2014) in their article Global diets link environmental sustainability and human health explained that human growth leads to environmental degradation, climatic change, social inequality, increase in exploitation of natural resources, high consumption of animal products, energy and other negative global consequences.

Johanna and Delia (2015) in their article The consequences of human actions on risks for infectious diseases: a review suggested a need of multidisciplinary approach in the gaps understanding of ecosystem disease regulation and human actions, medicine, epidemiology science, social, environmental and economic values appreciated by people and social rational.

D. P. van Vuuren and others (2017) in article Energy, land-use and greenhouse gas emissions trajectories under a green growth paradigm suggested to achieve sustainable socio-economic

development, society will pursue a combination of technological advances and shifts to less resource-intensive lifestyles.

J. Hanspach and others (2017) in their article From trade-offs to synergies in food security and biodiversity conservation stated that food production, biodiversity conservation, and climate change mitigation cannot be consider in isolation all these relates with one other.

J. E. M. Watson and others (2018) in the article The exceptional value of intact forest ecosystems explained that protecting forest useful in biodiversity conservation and prevent the risk of disease transmission.

C. R. Wells and others (2019) in the article The exacerbation of Ebola outbreaks by conflict in the Democratic Republic of the Congo stated on social conflict deteriorates health infrastructure and stability due to Govt. deficit health care capacity.

P. Zhou (2020) in his article A pneumonia outbreak associated with a new corona virus of probable bat origin focused that local diseases emergence leads to a global pandemic such as SARS in 2003, H1N1 in 2009, Ebola in 2013-16, Corona at end of 2019 these all causes economic damage in more than 10 billion US dollar.

Moreno Di Marco and others (2020) in their article Sustainable development must account for pandemic risk explained about the disease and fear of disease had considerable economic and social impacts by restrictions on international travel, quarantining of tens of millions people, drops in tourism, and disruption of supply chains for food, medicines, and manufactured products. Estimates of likely economic impact are higher than US \$150 billion.

OBJECTIVES OF THE STUDY

The present study is undertaken with the following objectives:

- 1) - To study the Industrial revolutionperiodicpatternintosix phases that molded the world.
- 2) - To study the Pandemic spread of last three centuries in relation with industrial growth.

RESEARCH METHODOLOGY

Present qualitative study based on secondary data sources likeonline reports, research papers and articles. Critical evaluation, content analysis, rational inductive reasoning methods used as research tools and techniques for subjective interpretation and descriptive conclusion.

Data Analysis

The link between industrial growth and pandemic spread will better understand in below data:

Phase - 1: Invention of Steam Engine till Starts 1st Industrial Revolution (1712 to 1760):

Year	Place	Disease	Death
1720-22	France	Plague	1,00,000
1738	Balkan	Plague	50,000
			1,50,000

Phase - 2: 1st Industrial Revolution till Start of 2nd Industrial Revolution (1760 to 1870):

1770	Russia	Plague	50,000
1772	Persia	Plague	2,00,000
1816-26	Asia & Europe	Cholera	1,00,000
1829-51	Asia, Europe & North America	Cholera	1,00,000
1852-60	Russia	Cholera	1,00,000
1855-60	India & China	Plague	1,20,00,000
			1,25,50,000

Phase - 3: Second Industrial Revolution till End of First World War (1870 to 1919):

1875	Fiji	Measles	40,000
1877-1946	Worldwide	Smallpox	49,55,00,000
1881-96	India & Germany	Cholera	9,000
1889-90	Worldwide	Influenza	10,00,000
1899-1923	Asia, Europe, Africa	Cholera	8,00,000
1910-12	China	Plague	40,000
1915-26	Worldwide	Lethargica (ELP)	15,00,000
1918-20	Worldwide	Spanish Flu	10,00,00,000
			59,88,89,000

Phase - 4: Cold War or 3rd Industrial Revolution till Start of LPG Era (1947 to 1991):

1957-58	Worldwide	Asian Flu	40,00,000
1968-69	Worldwide	Hong Kong Flu	40,00,000
1947-77	Worldwide	Smallpox	45,00,000
1980-81	Worldwide	HIV/AIDS	3,20,00,000
			4,45,00,000

Phase - 5: LPG Era till Start of 4th Industrial Revolution or Cyber Age (1991 to 2010):

2001	Nigeria	Cholera	400
2003	Worldwide	SARS	774
2008-09	Zimbabwe	Cholera	4,293
2009	Worldwide	Swine Flu(H1N1/09)	5,75,400
2010	Haiti	Cholera	10,075
2010-14	Congo	Measles	4,500
			5,95,442

Phase -6: 4th Industrial Revolution or Cyber Age till Corona Pandemic (2010 to 2020):

2011-12	Pakistan & Sudan	Dengue Fever	521
2012	Worldwide	MERS	862
2013-18	West Africa	Ebola	13,775
2015	India	Swine Flu	2,071
2015-16	Worldwide	Zika, Yellow Fever	153
2016	Yemen	Cholera	3,886
2017-18	USA	Seasonal Flu	80,000
2017-18	India	Nipah, JapaniesEnephalities	82
2019	Congo, Samoa	Measles	6,083
2019	Asia-Pacific, Latin America	Dengue Fever	2,000
2019-20	Worldwide	Corona (COVID-19)	1,90,567
			3,00,000

Knowing Industrial Development 6 Phases (280 Years) Relating Pandemic Death Toll:-

Phases Period	Years in Phases	No. of Pandemics	Death Toll	Country	Regional or World
1 st – 1712 to 1760	48	1	1,50,000	1	1
2 nd – 1760 to 1870	110	2	1,25,50,000	4	6
3 rd – 1870 to 1919	49	7	59,88,89,000	4	7
4 th – 1947 to 1991	44	4	4,45,00,000	0	4
5 th – 1991 to 2010	19	4	5,95,442	4	2
6 th – 2010 to 2020	10	13	3,00,000	8	6
	280	31	65,69,84,442(65.7Cro.)	21	26

DISCUSSION

The first industrial revolution started from 1760 which replaced hand manufacturing process in steam engine mechanical process for the production of cloths in textile industry. Thereafter second industrial revolution started onwards 1870 speedily due to the invention of electricity, New transportation means e.g. Railway, Tram, Motor car, sources of financial and market economy covering and spreading rapidly all over the world. Electrification of world began through England and America from 1880 due to electricity production and distribution system. It boosts industrialisation, transportation and market economy throughout world, due to growing network of the electric railway, electric-tram. At the same time, in year 1888-89 worldwide around 10 lakh people died due to influenza fever. In year 1899 due to Cholera pandemic which started in India and spread worldwide wherein around 8 lakh people died.

Several experiments in radio broadcasting had successfully taken place from 1906 to 1915. Therefore in 1916 day-night radio broadcasting on a commercial basis was started in England and America. During the period from 1915 to 1926, a whole decade is suffered from Encephalitis lethargica pandemic (Polio, Coma, Brain Diseases) due to which around 15 lakh people died. Till now no proper medicine has been found on this physical and mental disease. After 1st World War 1918 to 1920 around 10 crore people died due to Spanish flu pandemic.

After World War - II, 1951 to 1955 speedy use of Atomic Energy initiated first Atomic Power Plant to produce electricity and first Atomic Submarine were developed by the USA. During the period pocket radio transistors and small batteries, mass production started in Europe and USA. In 1957-58 around 40 lakh people died due to Asian flu influenza fever.

The period 1957 to 1969 is well known as 'Space Race' opens new front of Cold War between Russia and America. Russia launched the first artificial satellite and started the first human space mission in which two Russian astronauts rotate to the earth orbit by a space shuttle. Whereas America invented rocket technology and also launched Apollo- 11 mission in which Neil Armstrong a first human being who steps at the Moon on 26 July 1969. In 1968 around 40 lakh people died due to Hong Kong flu influenza fever all over the world. From 1877 to 1977 more than 50 crore people were died worldwide due to smallpox fever.

During 1971 to 1997, two-decade known by unique inventions in the public transport system. In this time Russia developed first permanent Space station, America developed first Space shuttle and Supersonic Jet aero-plane and Japan develop first high-speed bullet train and semi-automatic car. While 1980 onwards till now more than 7.5 crore of people infected due to HIV/AIDS and around 3.2 crore people died all over the world.

After 1991 onward the whole world shifted to new age known as LPG era, featured in Wireless Technology. During this period computer and internet are widely spread and mobile connections also increase rapidly all over the world. Due to the introduction of the cable network along with hundreds of Satellite Television channels reached the grass root level in all classes of society. During the same time auction of the Satellite Spectrums on commercial basis started which has resulted, more than 20,000 satellites roaming in the space. In 2009-10 Swine Flu (H1N1/09) pandemic infected 70 lakh people and more than 5,75,000 people died. In 2013-18 due to Ebola around 14,000 people died in West Africa, in 2017-18 due to Swine Flu 80,000 people died in USA. Since 17.11.2019 till 23.4.2020 due to COVID-19 pandemic, more than 27 lakh people were infected and 1.9 lakh people died worldwide in 210 countries.

Aforesaid 1st Phase of 48 years, 1 Pandemic spread in 1 country, 1 region and resulted into death of 1.5 lakh people. 2nd Phase of 110 years, 2 Pandemic spread in 4 countries and 6 times world and death of 1.25 crore People. 3rd Phase of 49 years, 7 Pandemics spread in 4 countries and 7 times in world and death of 59.88 crore people. 4th Phase of 44 years, 4 pandemics spread 4 times in world and death of 4.45 crore people. 5th Phase of 19 years, 4 Pandemics spread in 4 countries at 2 times in world and death of 5.95 lakh people. Present 6th Phase cover 10 years, 13 Pandemics spread in 210 countries at 6 times in world and death of more than 3 lakh people till 23.4.2020. In all six phases of industrial growth consequently spread 31 Pandemics in 21 countries, 26 times in world and more than 65.7 crore people died.

CONCLUSION/SUGGESTION

From above analysis and discussion we concluded that it's now time to think over old paradigm of growth which continuously depletes global commons like air, water, land, energy sources. So need to change thought form economical prospective to ecological dimensions as essential requirement of future generation quest for sustainable development. It requires new norm at all level from government to private policy formulation and execution by diverting global economy towards ecological concerns on carrying capacity, natural balance, promote intellectual honesty to protect and preserve living organisms and ecosystems, is a real growth.

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