

At present, Tropical Ocean-Global Atmosphere Programme develop some models and those models make possibilities in prediction of El Niño phenomenon one year in advance, though the causes for the origin and occurrence of El Niño are still not well-known to the scientific communities.

El Niño and La Niña, both appear on alternate years causing reverse events of warming and cooling, sometimes drought and flooding, though La Niña favour the southwest monsoon rain in India. La Niña phenomenon is associated with sea surface temperatures and weather phenomena opposite to those of El Niño. Indian Ocean monsoon, for instance, are typically drier than usual in El Niño years but wetter than usual

in La Niña year - explain Trujillo and Thurman, the world-class oceanographers. During forecast of southwest monsoon, these phenomena are also mentioned and supported by the experts of India Meteorological Department that states that the ENSO Neutral conditions are currently prevailing over the equatorial Pacific Ocean. The IMD officials add that the global models indicating cool ENSO conditions are likely to prevail during the monsoon season with some possibility of development of weak La Niña conditions in the later part of the monsoon season. Overall, ENSO Neutral and strong La Niña conditions have major influences and impacts on the expected above normal rainfall during southwest monsoon season of 2020 in and around the entire India.

History of Technology

The Needle's Eye of World Trade: 150 years of Suez Canal

After a very troublesome beginning of the great human project the Suez Canal was opened 150 years before. Ten thousand people gathered on the 16th and 17th November 1869 in the Egyptian city Port Said. At the top of the list of guests along with the Egyptian Viceroy Ismail Pascha before all there were representatives of big European governments King Franz Joseph of Austria-Hungary, the French queen Eugénie, Crown prince Friedrich of Prussia. They all came in order to celebrate the opening of the millennium old dream: the completion of Suez Canal, the waterway between the red sea and Mediterranean sea, the artificial man made connection between the two seas. The ship carrying the noble guests

moved more or less in a convoy on the water surface of 58 meter wide and 8 meter deep canal.

The construction work continued for ten years. Infinite troubles had been overcome. Ten thousand workers had been active in the middle of the coast without infrastructure and machines. The strategy was relatively simple. On the far reaching surface of the isthmus between the Mediterranean and gulf of Suez in the red sea there were several big and small natural water bodies. Between these water bodies to begin with a small channel had to be dug with great difficulty with dredging ship. This great human project was designed in France.

In 16th century venician traders (canvassed) for a new canal with the Egyptian governor Osmans. The business with India and China on the land route was dangerous and troublesome. The Philosopher Gottfried Wilhelm Leibniz had proposal to Ludwig XIV for similar canal construction. France was fully interested in competition with Great Britain in order to get a foothold to the World trade and Indian trade in this case. Certainly such a canal would have been naturally in Britain's outstanding matter for serious consideration.

First in 19th Century this matter made the European powers serious. Napoleon Bonaparte initiated in 1799 an expedition to Egypt. This geographer came to conclusion that the canal construction should be delayed. On the basis of measurement it was accepted erroneously that the water level of red sea remains 10 meter higher than that of Mediterranean Sea and therefore sluice gate would be necessary.

First the Austrian engineer Alois Negrelli could do away with the error from the world in the middle of 19th century. Over the years Negrelli researched on the Mediterranean coast and geographical conditions on the strait and finally proposed the line without sluice as is the canal today.

As the designer of the Suez Canal Negrelli however has not gone in history. He died already in 1858 one year before the commencement of the work. The French Jurist and diplomat Ferdinand de Lesseps (1805-1894) could gain the title by declaration put in paper. With that Lesseps was engaged with the technical questions of canal construction than with the political economical and financial matter.

In his diplomatic career Lesseps brought the matter to the consul in Alexandria when he regularly visited the house of the Egyptian governor. The end of his diplomatic career he used this connection in order to promote the

canal construction idea. Lesseps' friendship with Muhammad Said who in 1854 took over as the governor was deep Lesseps could convince him and obtained from him the concession for the founding of Suez Canal Company which should construct the canal and should manage it for 99 years.

It was the big work of Lesseps to keep this company alive against massive resistance, Political resistances. Great Britain tried to create problem with the canal construction. Financial impedance first trial to get shareholders went top sided (wrong) and led the company to the end of bankruptcy. Diplomatic opposition as the construction of Canal was taken-up there was no permission of the Osmanian Kingdom which had been brought up by Great Britain against the plans. This took place later first after eight years of construction.

After ten years of construction time the project was however expanded. The Suez Canal after a dragging beginning became an important Needle's eye for world trade. It was manifold expanded and massively constructed, it was by Egyptian government and was the Central point of many crises and wars. After the six day long war in 1967 the canal made became an apple of discord for several years between Israel and Egypt. 14 ships were stranded in the canal for 8 years.

The history is and remains fascinating. Till today the canal performs that which had been expected of it. The sea route between Rotterdam, Antwerp or Hamburg and Hong Kong or Shanghai was reduced by the Suez Canal approximately one-third compared to the journey round Africa. About 18,000 ships travelled across through the canal in 2018 in sections about 11 hours along the borders between Africa and Asia.

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