

VAC_23 - Technological roadmap in COVID-19 vaccine production

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Introduction: The 2030 Agenda is a global action plan created to eradicate poverty and promote a decent life for all. Goal 3 of the Agenda aims to ensure a healthy life and promote well-being, from the population's access to vaccines and essential medicines and promoting support for the development of vaccines and medicines. To contribute to the realization of the 2030 Agenda, the Technological Roadmap (TRM) tool is described to elucidate technological and market trends for future investments and partnerships and the development and production of vaccines for Covid-19. The TRM is a very prominent tool of Technological Prospecting area due to its performance and versatility in establishing market trends, studying technological trajectories and the profile of sector agents, monitoring of competition over time and in the identification of new business opportunities.

Objective: The objective of the present study is to show the Technology Roadmap (TRM) tool and how it can assist in the Development and Production of Covid-19 Vaccines.

Methodology: This work consists of an exploratory study that monitors the Covid-19 vaccines launched and under development, from the Integrity® database, as well as from ANVISA and FDA, from 2019 to February 2022.

Results: 224 were retrieved data that supported the construction of the TRM demonstrating a current market situation with data on vaccines already registered or in emergency use, as well as vaccines in different stages of development, that is, pre-clinical and clinical stages (phases I, II, III). Of these, 16 data refer to products that are in phase III of the clinical study where the product can be submitted to regulatory agencies for evaluation of emergency use, given the current pandemic situation.

Conclusion: The study based on TRM in addition to the current market assessment allows monitoring of what is under development, including new technologies and perspectives and how to identify the technologies that should receive investment so that the research budget can be properly invested.

Keywords: Technological Roadmap; Covid-19; Vaccine