

The increasing popularity of Real World Data with 186 studies presented at ASCO 2019

186 real-world data studies have been presented at ASCO 2019. These studies highlight the increasing awareness on the value of real world data and real world evidence. Among these studies, 113 studies were on the efficacy, the safety or the quality of life, 74 studies on the patient care and follow-up and 22 studies on medical practice.

The most outstanding in these studies is the diversity of their applications :

1/ Benefit evidence for cancer with small population

The challenge for cancer with small population such as male breast cancer is that randomized clinical studies are hardly conducted due recruitment difficulties. To overcome this drawback, a study¹ described the treatment benefit in real world conditions of male breast cancer patients treated with palbociclib in combination with endocrine therapy.

2/ Synthetic control arms

Another example of the use of RWD is the development of synthetic control arms (control arms from previously conducted randomized trials). Synthetic control arms offer the benefit to increase patient access of experimental drugs with promising benefits. In this context, a study, presented at ASCO, showed² that synthetic control arms approximated the original overall survival hazard ratio and 95% confidence interval in metastatic non-small cell lung cancer.

3/ Survival prediction

Real world data are also used to train artificial intelligence model to predict survival. Such model could be used to help therapy decisions depending on the predicted patient risk. An artificial intelligence model was trained on a set of about 55,000 lung cancer patients then validated on a set of 8,468 patients³ by predicting the probability of survival beyond 90, 180 and 360 days from any point in a lung cancer patient's journey. The accuracy of the predictions was high and tumor status, medications and functional status were found to be significant.

4/ Determination of the optimal combinations and sequences

The wide range of possible combinations and sequences available for metastatic colorectal cancer treatment presents a major challenge to clinicians, who need to identify the optimal treatment for a patient. Real world data can be used to describe the treatment patterns and outcomes in routine practice⁴ and later to define an optimal sequence strategy for individual patients. For instance, the simulations estimated that the median progression free survival of 25% of the patients could have been improved by 94 days with another treatment sequence.

Methodology : search for the keyword "real world evidence" in the database "ASCO 2019 Abstracts & Videos" (2019 ASCO Annual Meeting Search Results)

¹ <https://meetinglibrary.asco.org/record/176918/abstract>

² <https://meetinglibrary.asco.org/record/174601/abstract>

³ <https://meetinglibrary.asco.org/record/176968/abstract>

⁴ <https://meetinglibrary.asco.org/record/176930/abstract>

Our expertise

OpusLine supports you to accelerate your project with health data in real world

REALD WORLD STUDIES



We conduct real world data studies with strong expertise on the methodologies and a deep knowledge of the health system

Bertrand de Neuville

+33 6 69 01 59 63

bertrand.deneuille@opusline.fr

DATA INTELLIGENCE



We provide a deep knowledge of Health data, use cases and analytics tools to maximize your BI initiatives

Olivier Floch

+33 6 37 99 28 64

olivier.floch@opusline.fr