Healthcare prognosis research: Concepts, methodology, and conclusion.

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Introduction

Greek for "fore-knowing, foreseeing," prognosis (v) is a medical term for predicting the likely or expected progression of a disease. It includes expectations for quality of life, such as the ability to carry out daily activities, the potential for complications and associated health issues, and the likelihood of survival (including life expectancy). A prognosis is determined based on the typical course of the diagnosed disease, the person's physical and mental state, the treatments that are available, and other factors. The projected duration, function, and description of the disease's course-such as steady decline, intermittent crisis, or sudden, unforeseen catastrophe-are all included in a full prognosis [1].

Prognostic estimates can be extremely accurate when used on large statistical populations; for instance, it is possible to say with some confidence that "45% of patients with severe septic shock will die within 28 days" because prior studies have shown that this percentage of patients did indeed pass away. Because patient-specific factors can significantly alter the expected course of the disease, this statistical information does not apply to the prognosis for each individual patient. Additional information is required to determine whether a patient belongs to the 45% who will die or the 55% who will survive [2].

Methodology

Disease and prognostic indicators: For predicting the course of cancer, prognostic scoring is also employed. Small-cell lung cancer prognosis is indicated by a Manchester score. Physicians have created the International Predictive Index for Non-Hodgkin lymphoma in order to forecast patient outcomes. Drug-Induced Liver Injury (DILI) (Hy's law) and the use of an exercise stress test as a prognosis indicator after myocardial infarction, which is also used to signal multiple myeloma survival rate, are two other medical fields where prognostic indicators are used [3].

According to studies, most medical professionals overestimate a patient's chance of survival when issuing a prognosis. There are numerical prognostic scoring systems that are more precise for severely ill patients, especially those in an intensive care unit. The most well-known of them is the APACHE II scale, which is most effective when used seven days before a patient is expected to pass away. Understanding the prognosis is crucial for making end-of-life decisions and advanced care plans because it can assist evaluate if it makes more sense to try specific treatments or to forgo them [4].

- The amount of time during and following medicine or treatment during which the condition being treated (often cancer) does not worsen.

- The percentage of participants in a research or therapy group that continue to survive after diagnosis is known as the survival rate.

- The amount of time you have left to live. If not stated otherwise, it typically begins at the time of diagnosis.

The Book of Prognostics of Hippocrates, which was composed approximately 400 BC, is one of the earliest documents relating to medicine. It seems to me a most excellent thing for the doctor to cultivate prognosis because by anticipating and predicting, in the presence of the sick, the present, the past, and the future, and explaining the omissions which patients have been guilty of, he will be the more readily believed to be familiar with the circumstances of the sick; so that men will have confidence to entrust themselves to such a physician. For doctors in the 19th century, especially those who practised French school medicine, the primary goal of medicine was to provide a medical diagnosis rather than to treat sickness [5].

References

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