

ECONOMIC IMPACT OF USE OF PREVENTIVE 1000 MG/DAY VITAMIN C IN FLU SEASON DEPENDING ON A DECISION TREE MODEL FOR TURKEY

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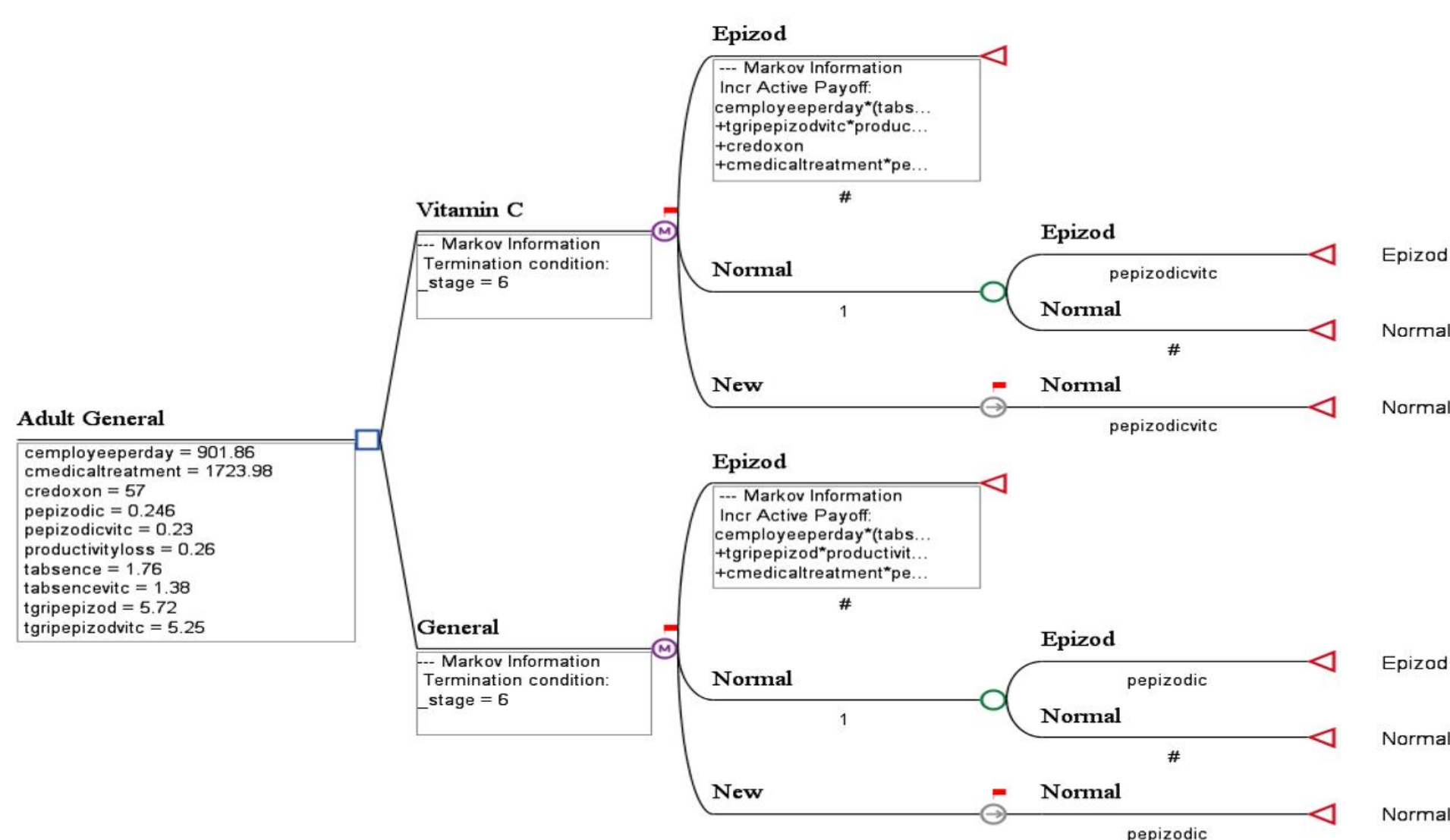
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Objectives

Vitamin C is an essential nutrient involved in the repair of tissue and the enzymatic production of certain neurotransmitters. It is best known for its antioxidant properties, being able to scavenge damaging reactive oxygen species, thus protecting the body's cells and tissues from oxidative damage and dysfunction. This study aims to develop an economic model to demonstrate the burden of absenteeism and presenteeism cases caused by preventable common cold and flu using 1000 mg/day Vitamin C vs doing nothing in Turkey.

Decision Tree Model



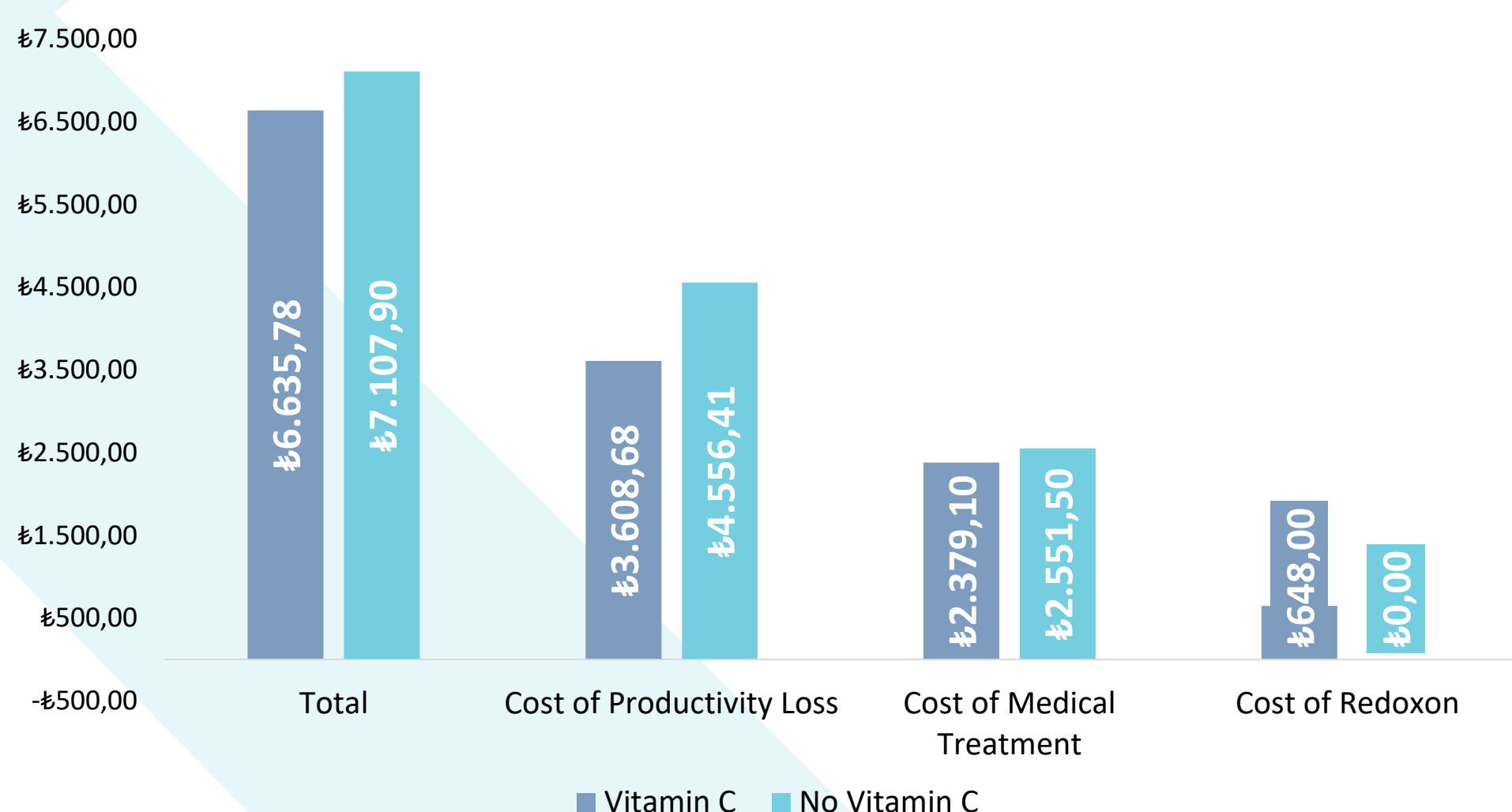
Methods

The models were conducted for understanding the possible loss of productivity of white-collar professionals and medical cost, employer spending per employee, healthcare usage, possible changes in seasonal common cold episodes, length of common cold episodes, productivity loss depending on absenteeism, and presenteeism have been retrieved from the literature search. A decision tree model for 6 months has been conducted. The model has been conducted to calculate the economic burden of using Vitamin C and doing nothing for 6 months horizon.

Results

According to the decision tree model, economic impact of using 1000 mg/day Vitamin C and doing nothing arms were calculated for productivity loss - 3.608,68 TL vs. 4.556,41 TL, medical treatment - 2.379,10 TL vs. 2.551,50 TL, and total 6.635,78 TL vs. 7.107,90 TL including cost of Vitamin C 648,00 TL, respectively. The economic benefits of using 1000 mg/day Vitamin C on productivity and healthcare per flu season has been calculated as 472,13 TL depending on the model.

Decision Tree Model Results



Conclusion

According to the results of the decision tree model, 1000 mg/day Vitamin C has been shown to provide economic benefits for productivity and healthcare costs.