REQUIREMENTS OF STATISTICAL METHODOLOGY FOR HEALTH MANAGERS

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INTRODUCTION
As in all areas, statistical data are important for high quality decisions and research in the field of organizing, executing and analyzing management activities. The level of success in management is directly related to problem solving and developed decision-making skills. Statistical data allow managers to make a correct decision. Therefore, accurate and reliable data and the methods to analyze them have a great importance for health administrators. The Health managers having knowledge of statistical methodology may be more successful in decision making than those without it.

METHODS
A program of management was implemented at the Gulhane Military Medical Academy. Before the management training, a pre-training test was applied to managers. To evaluate the contribution of the education to managers, a post-training test was applied. Their approaches to statistical methods in their management experience were summarized as "considers", "partly considers" and "doesn’t consider". Pretest and posttest results of the participants were compared with Student’s t-test.

RESULTS
Out of 81 participants; 21 (26.0 %) were strictly, 30 (37.0 %) were partly considering the statistical methods in their work life. The group of the managers who was not considering these methods consisted of 30 (37 %) people. The score of the group considering the statistical methods was significantly higher than the other groups (F=29.070; p<0.001). Pretest and posttest scores were 71.71±12.11 and 76.92±12.05, respectively. The difference between these two scores was statistically significant (t=3.032; p=0.003). It was shown that the scores of the managers considering the statistical methods were higher than the other groups (F=29.070; p<0.001).

CONCLUSIONS
The managers understanding the necessity of statistical methods and also using these methods were more successful than the others. These managers have showed a good performance after the training course. Although the other participants had improved their scores, these improvements were not adequate. At the end of this management training program, it was realized that statistical methodology has a great effect on decision making for health managers. In order to have efficient and effective decisions in management, statistical techniques are indispensable tools in decision making.