CHAPTER V

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 SUMMARY

Given the nature of the work for software professionals, amount of stress levels induced, eating habits, work ethic, etc, these professionals are today vulnerable to an array of problems ranging from high BP to obesity to back problems, etc. The work typically involves sitting in front of a computer for an average of 8 hours a day. And while the scope for exercise is minimal in this line of work, what adds to the problems is the consumption of at least 2 to 6 teas/coffees a day to beat stress. The situation is rapidly deteriorating given the current recession and hence tighter deadlines and longer working hours. Today, the need for a proper diet coupled with ample exercise for these software professionals cannot be over emphasized. Cycling is an effective mode of aerobic exercises which is more beneficial to sedentary men like software professionals. Spinning cycle exercises is having more benefits than regular cycling exercises. There are many different forms of protein supplements and each offers a different benefit and some even offer a few cons. Researches show taking protein supplements help them build the muscle that they need. For many people they find that this practice is not a good idea while others think that it does not hurt anything. The truth of the matter is that there are pros and cons to this and there is

further scope for research in this direction with the knowledge to stay safe. In this research, the investigator was interested to find out which of the different experiments, that is, spinning cycle exercise, or protein supplementation, or combination of both is beneficial to software professionals in beneficially altering their lipid profiles and testosterone level.

The purpose of the present study was to find out the effect of spinning cycle exercise and protein supplementation on lipid profile and testosterone level on obese men software professionals. For the purpose of the study, sixty (N=60) obese software professionals from Chennai city were selected as subjects at random and their age ranged between 27 and 47 years. They were divided into four groups consisting of fifteen (n=15) subjects each. The selection of control and experimental groups were done at random. Experimental group I underwent spinning cycle exercise for 45 minutes in a day for three days per week for 12 weeks. Experimental group II underwent protein supplementation for 12 weeks. Experimental group III underwent the combination of both spinning cycle exercise and protein supplementation for 12 weeks. And IV group acted as control group. Subjects who were in the control group were not exposed to any experimental treatment. Prior to the experiment, blood samples of all the subjects were collected to determine the selected variables, triglycerides, total cholesterol, high density lipoprotein, low density lipoprotein, very low density lipoprotein and testosterone, which forms the initial scores of the subjects. After the completion of experimental period of twelve weeks, blood samples were collected from the subjects and determined the scores of the final scores. The difference between the initial and final scores was considered as the effect of respective experimental treatments. To test the significance of the difference were subjected to statistical treatment using ANCOVA.

The results of the study proved that the isolated protein supplementation group recorded small increase of triglycerides, low density lipoprotein, very low density lipoprotein, total cholesterol and reduction in high density lipoprotein and testosterone.

The results of the study proved that Spinning Cycling Group decreased triglycerides, low density lipoprotein, very low density lipoprotein, total cholesterol and increased high density lipoprotein and testosterone.

The results of the study proved that combined group decreased triglycerides, low density lipoprotein, very low density lipoprotein, total cholesterol and increased high density lipoprotein and testosterone. Further the statistical analysis proved that combined group was better than isolated groups spinning cycling and protein supplementation in altering the lipid profiles and testosterone variables for obese software professionals.

5.2 CONCLUSIONS

Within the limitations and delimitations of the study, the following conclusions were drawn.

- It was concluded that combined group, experimented with spinning cycling exercises and protein supplementation, was significantly better than protein supplementation group in reducing lipid profile, triglycerides of the obese software professionals. The other isolated treatments, spinning cycling exercises and protein supplementations were failed to significantly alter triglycerides.
- 2. It was concluded that combined group, experimented with spinning cycling exercises and protein supplementation, was significantly better than protein supplementation group and control group in reducing lipid profile, low density lipoprotein of the obese software professionals.
- 3. It was concluded that isolated group, spinning cycling significantly reduced low density lipoprotein than protein supplementation group and control group And it was concluded that spinning cycling group and combined group were equal in reducing low density lipoprotein of the obese software professionals.

- 4. It was concluded that combined group, experimented with spinning cycling exercises and protein supplementation, was significantly better than protein supplementation group in reducing lipid profile, very low density lipoprotein of the obese software professionals. The other isolated treatments, spinning cycling exercises and protein supplementations were failed to significantly alter very low density lipoprotein.
- 5. It was concluded that combined group, experimented with spinning cycling exercises and protein supplementation, was significantly better than protein supplementation group and control group in improving high density lipoprotein of the obese software professionals.
- 6. It was concluded that isolated group, spinning cycling significantly improved high density lipoprotein than protein supplementation group and control group. And it was concluded that spinning cycling group and combined group were equal in improving high density lipoprotein than protein supplementation group of the obese software professionals.
- 7. It was concluded that combined group, experimented with spinning cycling exercises and protein supplementation, was significantly better than protein supplementation group and control group in reducing total cholesterol of the obese software professionals.

- 8. It was concluded that isolated group, spinning cycling significantly reduced total cholesterol than protein supplementation group and control group. And it was concluded that spinning cycling group and combined group were equal in reducing total cholesterol of the obese software professionals.
- 9. It was concluded that combined group, experimented with spinning cycling exercises and protein supplementation, was significantly better than protein supplementation group and control group in improving testosterone of the obese software professionals. The other isolated treatments, spinning cycling exercises and protein supplementations were failed to significantly alter testosterone.

5.3 RECOMMENDATIONS

The findings of this study proved that combination of spinning cycling and protein supplementation significantly altered lipid profiles and testosterone favourably among obese software professionals. In view of the limited physical activities these professionals are involved, to maintain and improve healthful living, it was recommended that spinning cycling exercises combined with protein supplementation may be provided to them as part of their work routine, as this would increase the output of the company. It was strongly recommended to the obese software professionals to follow the experimental protocols suggested in this study, as part of their life style, so that they would be benefited much more.

Fitness experts and dieticians can prescribe the experimental protocols suggested in this study for clients for optimum level of maintenance of lipid profiles and testosterone.

5.4 SUGGESTIONS FOR FURTHER RESEARCH

Based on the experience gained, the following recommendations are made by the researcher for future studies.

- Similar researches among Physicians, Chartered Accountants etc may be undertaken to propagate the usefulness of spinning cycling exercise and protein supplementation.
- Researches with larger samples may be conducted among obese subjects to support the findings of this study.
- 3. In this study, it was found isolated protein supplementation has not contributed much for the alteration of lipid profiles and testosterone of the obese subjects. Hence, it was recommended that researches may be undertaken with other nutritional diets that would favourably alter lipid profiles and testosterone.

- 4. The influence of similar other aerobic exercises, like, jogging, running, walking may be compared with Spinning cycling exercises in altering lipid profiles and testosterone among obese subjects.
- 5. A separate research comparing different diet prescriptions on lipid profiles and testosterone would throw more light for the management obesity and maintaining healthful living for sedentary groups.