

CHAPTER VI

Conclusion

The overall results of this investigation could be concluded that :

1. The chronic diabetes is related to cardiovascular changes including decreasing of coronary flow rate, left ventricular contraction and developing of vascular hypertrophy.
2. The effects of angiotensin II is not only as a direct vasoconstrictor but also as a mitogenic agent for the vasculature. From our study, we believed that the calcium ion is a key mediating agent for this mitogenic effect and it could be involved in the development of cardiovascular complications. However, by which calcium ion has an effect on gene activation remain to be elucidated.
3. In addition, the progression of cardiovascular complications in diabetic rat can inhibited by using only calcium channel blocker. But the result of using calcium channel blocker combined with angiotensin converting enzyme inhibitor in diabetic rats did not synergistic effect.
4. Moreover, it is believed that the early treatment with calcium channel blocker might be used as therapeutic agents in preventing from cardiovascular complications in diabetic patients. However, I would like to make a further study especially on defining the optimal doses of these agents.