

CHAPTER V

CONCLUSIONS

1. Celecoxib, 200 mg twice daily, and naproxen, 500 mg twice daily, had shown similar decrease in creatinine clearance in elderly patients (hypertensive patients, normal renal patients and renal insufficiency patients). Hypertensive patients (either normal or renal insufficiency) had a tendency to decline renal function from naproxen and celecoxib. In hypertensive patients (normal renal), celecoxib caused greater decrease in CrCl than naproxen. However, creatinine clearance was not significantly decreased after treatment with naproxen and celecoxib in normal blood pressure patients (either normal or renal insufficiency) and patients with diabetic mellitus (DM), coronary artery diseases (CAD). Since this study composed of small number of these patients, further studies in large number of patients are required to confirm this conclusion. Concerning serum creatinine, the increment of serum creatinine in this study was not meaningful clinical implications.
2. Other factors (e.g., male gender, high uric acid level) did not relate to decline in renal functions of hypertensive patients (normal renal) in either naproxen or celecoxib group.
3. Naproxen had a tendency to increase in systolic blood pressure particularly in high blood pressure patients (either treated or untreated hypertension) while celecoxib did not significantly affect blood pressure in both normal and high blood pressure patients. Although the effect of celecoxib on blood pressure was less than those of naproxen, patients whose risk of hypertension should be monitored closely during administration of non-selective NSAIDs or highly selective COX-2 inhibitors. Physicians should

concern to prevent cardiovascular risk in elderly because an increase in SBP was recognized as the important predictor of cerebrovascular and cardiovascular disease.

4. Naproxen and celecoxib did not significantly alter sodium, potassium in serum and urine. It was noted that there was not regulation of electrolyte intakes in this study, which might be the weak point of this study.
5. The occurrence of edema from naproxen was higher than that of celecoxib but not statistical significance. Among patients developed edema from naproxen, there was significantly increased in serum sodium and destabilized of systolic blood pressure.
6. Other adverse drug reactions more occurred in naproxen than celecoxib but there was no significant difference between naproxen and celecoxib in the occurrences of other adverse drug reactions. However, celecoxib caused less symptomatic gastrointestinal complications than naproxen. For long term treatment, physicians should observe more serious gastrointestinal complications such as perforation, obstruction and bleeding.
7. Although renal functions (creatinine clearance, serum creatinine, blood pressure) and electrolyte values could return to baseline after the drug had been withdrawn and there was no vital sign and other laboratory abnormalities along the study. Nonetheless, non-selective NSAIDs or highly selective COX-2 inhibitors should be used with caution especially when use in long term period.