

CHAPTER 5

CONCLUSIONS

1) When using NiTi closed coil spring (continuous force 6 ounces), the IL-1 β and IL-8 levels were elevated and reached a peak at 24 hours after force application. The levels of both cytokines were decreased but still higher than the baseline level after one month of force application.

2) For elastic c-chain (intermittent force 6 ounces), the IL-1 β and IL-8 levels were increased and highest at 24 hours after force application. However the levels of both cytokines were decreased to the baseline level within one month of force application.

3) The IL-1 β and IL-8 levels measuring from NiTi closed coil spring group were significantly higher than those from elastic c-chain at any time.

4) The rate of maxillary canine retraction from NiTi closed coil spring was significantly higher than from elastic c-chain.