

## CS#9

### **A comparison of cervical spine movement during laryngoscopy using the Airtraq or Macintosh laryngoscopes\***

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**In 20 patients** requiring general anaesthesia and tracheal intubation, we measured cervical spine movement using radiography in the same patient during consecutive procedures using the two laryngoscopes.

Cervical spinal extension with the Airtraq was **29% less** than that measured during Macintosh laryngoscopy between the occiput and C4, and 44% less at the C3/C4 motion segment ( $p < 0.05$ ).

Anterior deviations of the vertebral bodies from baseline were **32%, 35%, 38% and 40% less** at the atlas, C2, C3, and C4 vertebrae, respectively, during Airtraq laryngoscopy than those measured during Macintosh laryngoscopy ( $p < 0.01$ ).

Our study demonstrated that **laryngoscopy using the Airtraq laryngoscope involves less movement of the cervical spine compared to conventional procedures using a Macintosh laryngoscope**. Thus, intubation with the aid of an Airtraq seems **more suitable than Macintosh laryngoscopy especially for those patients in whom neck extension is to be avoided**.