



# RANZCR/SSA Joint Guidelines for Confirming Vertebral Levels in Spine Imaging

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**Approved by:** RANZCR Council and the Spine Society of Australia  
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In any cross-sectional imaging study of the spine, there must be images unambiguously demonstrating the relationship between each transverse image displayed and the segmental levels of the vertebral column. These may be variously referred to as “scout views”, “pilot images”, or “topograms”.

This should be in a form such that the segmental levels can also be readily correlated with image intensifier images of the spine that may be employed during surgery for confirmation of segmental level. That is, reproducible anatomical reference points must be included, e.g. crania-cervical junction and/or lumbo-sacral junction.

Traditionally, the relationship between transverse CT images and segmental level has been shown with “pilot” or “scout” digital radiographs, upon which the (numbered) transverse section levels have been superimposed.

This remains an appropriate method; however, other techniques such as superimposition on sagittal reformats or 3D projection images may also be appropriate.

In either case, the following requirements must be met:

1. The digital radiograph must be of adequate quality to permit segmental enumeration.
2. Lines representing the superimposed section plane must not obscure the anatomy shown in the reference image.
3. Image numbers must be legible and unambiguously linked to the lines representing section position.
4. Where images are displayed on film, the transverse image set and the relevant reference image must be recorded on the same sheet of film. If more than one sheet of film is required, the reference image must be:
  - a. Printed on each sheet (preferred); or
  - b. Clearly labelled to indicate the transverse images to which it applies.
5. If images are displayed electronically, the preferred option is for the viewer to automatically display the imaging plane on all available orthogonal (or quasi-orthogonal) image sets. The image set and at least one reference image must be visible simultaneously.
6. Where the viewing arrangements do not permit the above, a reference image, clearly labelled to indicate the image set to which it applies, must accompany each image set, and be visible simultaneously with the image set.

Where possible, consultation with referring surgeons on mutually acceptable procedures is strongly encouraged.