Vertical angulation

- refers to the **positioning of the PID in a** vertical, or **up-and-down plane**
- **correct** vertical angulation results in an image that is the **same length** as the tooth
- **incorrect** vertical angulation results in **ELONGATION** or **FORESHORTENING**
- an elongated image appears **long** & results from **too flat** vertical angulation
- a foreshortened image appears **short** & results from **too steep** vertical angulation
- **0 degree** vertical angulation = PID parallel with floor
- **positive** vertical angulation = PID pointing **DOWN to floor**/PID above occlusal plane
- **negative** vertical angulation = PID pointing **UP to ceiling**/PID below occlusal plane

**Horizontal angulation**

- refers to the **positioning of the PID in a** horizontal or **side-to-side plane**
- when the central ray is directed through the **interproximal contacts** of the teeth, **correct** horizontal angulation results and open contacts on seen the dental image
- **incorrect** horizontal angulation results in **overlapped contacts** (contacts are superimposed over each other)