INTRODUCTION
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Juvenile chronic arthritis is a term widely used in England and European societies to define arthritis in individuals under sixteen years of age, lasting for three months or more and classified according to the mode of onset to systemic, pauciarticular and polyarticular **(Watson, 1981).**

The early radiological changes in juvenile rheumatoid arthritis are **(Watson, 1981).**

1- Soft tissue shadow.
2- Periarticular oesteoprosis.
3- Periosteitis, periosteal reaction in the phalanges adjacent to actively inflamed joints.
4- Erosions which may be surface erosions, usually at the articular margins, or subarticular cysts.
5- Narrowed joint spaces due to cartilage destruction.

While the late radiological changes are **(Watson, 1981).**

1- Marked irregularity of the articular surface.
2- Severe erosions.
3- Joint subluxation not only in small joints but also in large joints
4- Generalized oesteoprosis
5- Secondary degenerative changes

6- Bony ankylosis of the involved joint.

7- Fusion of the carpal bones, most commonly (the capitate and the hamate) or (the triquetrum and the lunate).

8- Spondylitis, which primarily affects the cervical region where Atlanto axial subluxation is common.

Atlanto axial subluxation in juvenile rheumatoid arthritis (J.R.A.) depends on the severity and duration of the disease normally the odontoid process of the axis locks into a tight space in the atlas with a strong transverse ligament which holds the adontoid process in its place against the anterior ring of the atlas during head motion **(Martel, 1976)**.

Diagnosis of Atlanto axial subluxation is made radiologically by demonstrating the movement of the odontoid process away from the anterior ring of the atlas during head flexion (atlanto-axial interval). The normal upper limit of the Atlanto odontoid interval may be as much as 4.5 m.m and there may be one millimeter difference between extension and flexion **(Martel, 1976)**.

Severe subluxation is indicated by a space greater than 6 mm **(Hollingthworth, 1968)**.

The aim of this study is to detect early cases of atlanto-axial subluxation in chronic rheumatoid arthritis and try to find out its relation to the severity of the disease.