

# Medicolegal Aspects of Nasal Bone Fractures

T Q KHAN K K AHMAD A SHAUKAT Y AMIN , S AHMAD, M A J SIDDIQUI

Department of Radiology , Mayo Hospital, Lahore

Correspondence to Dr. Kh. Khurshid Ahmad, Assistant Professor Radiology

**Conducted in the Department of Radiology, Lahore in collaboration with Surgeon Medico Legal and his team, this study contained 50 patients who presented with trauma to the face and the clinical suspicion was of Nasal Bone fracture. All the patients underwent X ray examination of the Nose. The x ray examination showed that all of the patients did not have Fractures 40 patients had fracture of Nasal bone and this changed the management as well as the severity of the injury and hence the punishment**

**Key words. Medico Legal, Nasal Bone Fracture, X rays**

The nasal bone fracture is perhaps the most commonly fractured bone in patients with Trauma. It is an easy bone to be fractured. As the Medico legal aspects of the cases are related to the severity of the injuries, the importance becomes of the fact whether the bone is fractured or not. It is here that the Forensic Radiologist is the most important personality to decide the fate of the case. If a case is labeled to be fracture, then the severity of the injury increases as compared to the case in which there is no fracture. Definitely there is no need to stress the point that because of the finding that no bone is fractured many persons are to get lesser punishment. It is the duty of the concerned Radiologist to carefully look at the X rays and interpret the proper signs visible on the Radiograph. We definitely don't want to discuss the Medical ethics in this article. This is an original work which shows that X ray examination needs to be done in every patient with the Nasal Bone fracture suspicion.

## Patients and method

The cases were all Trauma patients, 50 cases were taken , who came to the Surgeon Medico Legal for MLC purposes and had the clinical suspicion of Nasal Bone Fracture. The X ray examination done on them was Lateral Nasal Bone X ray<sup>1</sup> both Right and left. The Radiographs were viewed by the competent authority and the diagnosis made.

## Results

The study showed that 40 out of 50 patients had fractures. This meant that in case of 10 patients the Medico-legal acts changed and hence the punishment of the accused also lessened. This concludes that the X rays are the only means through which it can be ascertained that whether a person has a nasal bone fracture or not and the clinical examination alone cannot be the criterion to adjudge as if the patient has a fracture or not.

## Discussion

The laws are very strict as it comes to the punishment of a criminal and they clearly state the grievous injuries. If there is injury and fracture with displacement, then it falls under section 337 A(4) of the Qisas and Diyat ordinance<sup>2</sup> and if there is a fracture with out displacement then it falls

under section 337 A(3) of the Qisas and Diyat ordinance . If there is no fracture, then the punishment is obviously less severe than is mentioned in the above sections of the Ordinance. Our study concluded the fact that the X rays are the sole modality available these days to conclude the evidence of fracture or otherwise.

When viewing the radiograph of Nasal bone the findings such as Normal variants should be kept in mind, these things mimic a fracture but the fracture is not present. The common variants include a Groove for Naso ciliary nerve and the other thing that can confuse the Radiologist is the Hypoplasia of the Nasal Bone. Also sometimes Nasomaxillary suture can be difficult to separate from the fracture. All the variants can be dealt with a very famous saying, "no groove or line should cross the bridge of nose"<sup>3</sup>. And if there is anything seen crossing it then it is almost nothing but Fracture.

When classifying the fractures of the nasal bones it is learnt that there are three classes of fractures<sup>4</sup>. Class I in which the Distal half is broken from the proximal thick part. Class II. In which the Fracture of nasal bone also involves frontal process of maxilla and bone and the Class III fracture which Includes Class I, Class II and fractures involving orbital and ethmoid bones.

While concluding it is again stated that due to the seriousness of the Medico Legal cases no weakness should be left in the case and X rays should be done in every case because of the fact that they are the only method currently known to us for ascertaining the extent of the injury.

## References

1. Radiographic Positioning 2<sup>nd</sup> edition by Ronald L. Eisenberg , Cynthia A. Dennis , Chris R. May .
2. Criminal Law 2<sup>nd</sup> Amendment Qisas and Diyat Ordinance 1991.
3. An Atlas of Normal Roentgen Variants 4<sup>th</sup> edition. Scott Brown's Otolaryngology 6<sup>th</sup> edition Vol 4 Rhinology. Ian S. Mackay and T.R..Bull



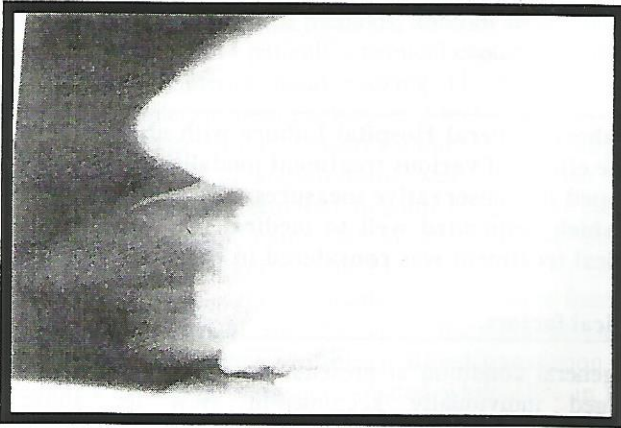


Fig 1 . Normal Nasal Bone.

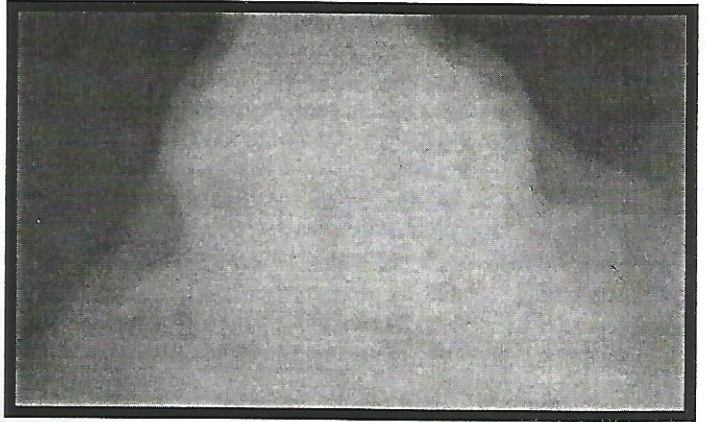


Fig 4 Fracture with Displacement.

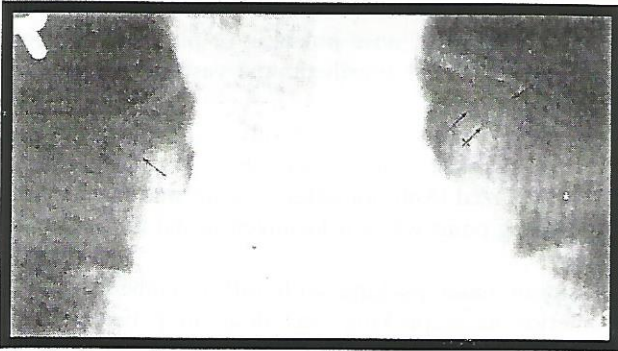


Fig 2 . Groove for the nerves.

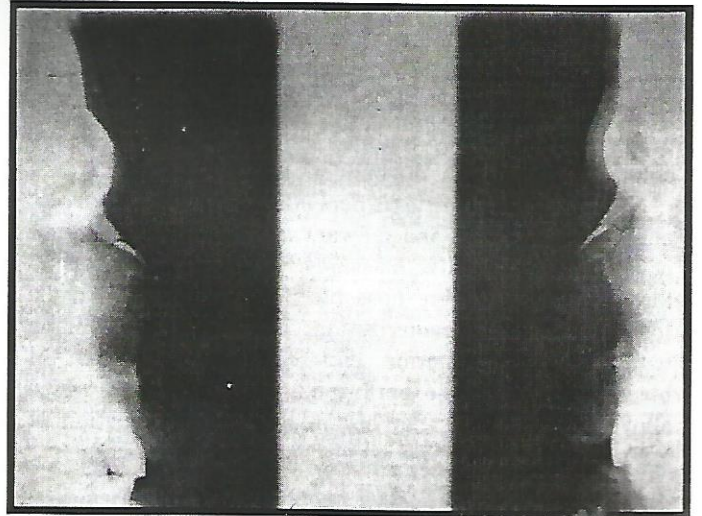


Fig 5. Another fracture.

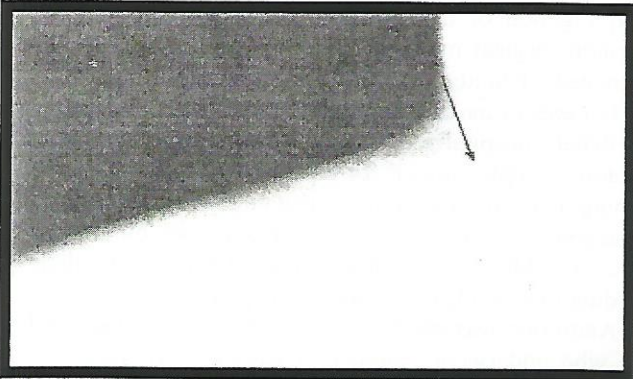


Fig 3. Hypoplasia of the Nasal Bone.

