

## 14 Years Outcome of Intertrochanteric Fracture Fixation with Proximal Femoral Nail

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### PURPOSE:

Proximal femoral nail (PFN) is one of the best methods of fixation for intertrochanteric fractures. PFN offers certain advantages: less operating time, less blood loss, shorter lever arm, load sharing device, and is a more biological method of fixation. This is a cross-sectional study to evaluate the clinical and radiological outcome of intertrochanteric fractures fixed with PFN in Teluk Intan Hospital, Perak.

### MATERIALS & METHODS:

This cross-sectional study was carried out by reviewing the records of patients who sustained closed intertrochanteric fractures in Teluk Intan Hospital for 14 years from January 2010 to Dec 2023. Cases were classified using Evan Classification. A minimum follow-up period of 6 months was required for inclusion. Patients who fulfilled the inclusion criteria were examined clinically using Harris Hip Scoring and radiologically using Tip Apex Distance (TAD) with Neck Shaft Angle (NSA).

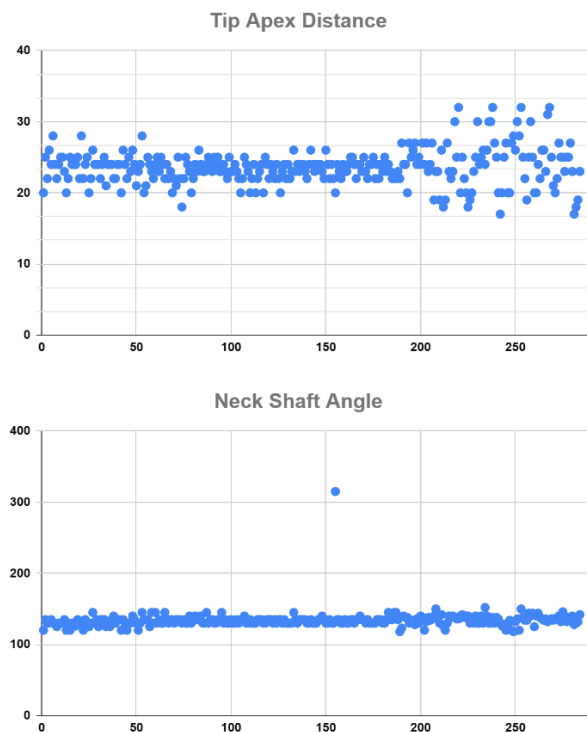
### RESULTS :

Total of 284 patients were treated with PFN fixation. 189 patients were female, with age distribution range from 19 to 91 years old, with median age is 68 years old. Around 83.1% of patients treated with PFN have Harris Hip Scores higher than 70. The mean and median for the TAD is 24 cm, while for the NSA, the mean is 134.7 degree, and the median is 135 degrees. Out of 48 cases, we had about 3 cases of implant failure and 2 cases infected implant as well.

Harris Hip Score	Outcomes	Number of Patients	Percentages
<70	Poor	48	16.90%
70-80	Fair	99	34.90%
80-90	Good	75	26.40%
90-100	Excellent	62	21.80%

### DISCUSSIONS:

More women undergo PFN fixation for IT fractures likely due to greater risk of osteoporosis than men of the same age. In this study, 65.6% of patients managed to achieve TAD of 25 and below. Meanwhile for the Neck Shaft Angle, the mean and median result is 135 degree which is within acceptable range.



### CONCLUSION:

PFN is an excellent choice for intertrochanteric fracture fixation.

### REFERENCES:

1. Baumgaertner, M.,(1995). The value of tip apex distance in predicting failure of fixation.1995 Jul;77(7):1058-64.doi
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