

TABLE -2 Comparison of patient, tumour & health care factors with Time to Treatment initiation

Factors	Numbers of patients	Median TTI, days (IQR)	P value
Total number of patients	537	34 (5–345)	
Year of diagnosis			
2014	104	32, (26, 55)	
2015	115	30, (19.25, 55.25)	
2016	121	31.25, (19, 60.25)	
2017	123	40.5, (27, 55.4)	
2018	130	35.5, (22,68)	
Age Group (in years)- Primary Bone Sarcoma			0.011
0-10	33	28, (17, 31.25)	
11-20	162	33, (22, 53)	
>20	144	40, (27, 55.4)	
Age Group (in years)-Primary Soft tissue Sarcoma			0.014
<40	66	42, (26, 55)	
41-50	47	28, (19.25, 55.25)	
51-60	51	43, (28, 58)	
>60	34	25, (23, 42.5)	
Gender			0.045
Male	307	39, (24-54)	
Female	229	29.5, (23,48.75)	
Class			0.079
General Ward (Government/Institute Funded)	429	35, (25, 63)	
Private Patient (Self-sponsored)	106	30, (16,43.25)	
Location- Primary Bone tumour			0.001
Femur	135	31, (25,53)	
Tibia	77	38, (24,53)	
Fibula	15	35, (19,89)	
Pelvis	38	36, (22,68)	
Humerus	31	46, (28,76)	
Radius	14	46, (28,76)	
Ulna	3	41, (25,41)	
Location- Primary Soft Tissue tumour			0.001
Thigh	105	28, (23,35)	
Leg	32	40, (36,60)	
Forearm	23	28, (28,48)	
Arm	14	45, (28,153)	
Gluteal	10	56, (56,56)	
Shoulder	14	56, (56,56)	
Others	28	28, (15,15.75)	

Factors	Numbers of patients	Median TTI, days (IQR)	P value
Size (in cm)- Primary Bone tumour			0.136
≤8	37		
>8	302		
Size (in cm)- Primary Soft Tissue tumour			0.185
0-5	34	30, (27,42)	
6-10	45	40, (28,52)	
11-15	35	30, (23,55)	
>15	84	35, (23,56)	
Histology- Primary Bone tumour			0.05
Osteosarcoma	185	32, (22, 50)	
Ewing's Sarcoma	76	31.5, (19, 60.25)	
Chondroblastoma	16	44.5, (34, 85)	
Aneurysmal Bone Cyst	06	58, (30, 108.05)	
Giant cell tumour	48	45, (30, 65)	
Other bone tumours	08	36, (28, 64)	
Histology- Primary Soft Tissue tumour			0.05
Liposarcoma	14	56, (13, 56)	
Leiomyosarcoma	04	19, (19, 19)	
Synovial sarcoma	65	28, (25, 38.67)	
Spindle cell Neoplasm	60	39, (28, 57)	
PNET	10	38, (28, 48)	
MFH	10	29, (28, 30)	
Chordoma	05	45, (45, 45)	
Others STS	28	14, (14, 45)	
Grade			0.001
I	41	30, (13.5, 42.5)	
II	177	43, (28, 59)	
III	319	40.5, (23, 49)	
Stage			0.058
I	18	22, (13, 30.75)	
II	149	38, (23, 48.5)	
III	346	33, (25, 55.25)	
IV	23	38, (28, 57)	
Initial Treatment modality			0.124
Surgery	245	26, (20,50)	
Chemotherapy	276	32.5, (22,51)	
Radiation	16	56, (19.25,56)	

TABLE -3 Multivariant Analysis

Factors	IRR on TTI	95% CI	P value
Age (≥ 60 years)	0.99	0.71, 1.38	0.964
Gender (Female)	0.87	0.85, 0.90	0.045
Class (General Ward)	1.16	1.12, 1.2	0.079
Size (≥ 15 cm)	1.06	1.04, 1.07	0.185
Primary Site			
Upper Extremity	1.33	0.78, 1.67	0.015
Lower Extremity	1.09	0.69, 1.48	0.005
Gluteal	1.48	1.31, 1.67	0.001
Thigh	0.74	0.68, 0.80	0.001
Histology			
Leiomyosarcoma	0.34	0.27, 0.42	0.001
Liposarcoma	3.5	3.13, 3.92	0.001
Osteosarcoma	2.165	1.96, 2.39	0.002
Grade (\geq II)	1.1	1.07, 1.15	0.001
Stage (\geq II)	1.46	1.37, 1.56	0.389
Initial Treatment Modality			
Surgery	0.814	0.75, 0.88	0.001
Chemotherapy	0.910	0.88, 0.94	0.001
Radiation	1.118	1.04, 1.21	0.004

*IRR-Incidence rate ratio, CI-Confidence interval, TTI-Time to treatment initiation.

Types	Median SD (Median TTB +Median TTHD)	Median TD	Median TTI
PES	18 (6+12)	16 22	34
PBS	22 (8+14)	13 24	35
PSTS	10 (3+7)	20 23	30

Table-1- Median SD,TD, & TTI. (**SD**-Secondary delay, **TTB**- Time to biopsy, **TTHD**- Time to histological diagnosis, **TD**-Tertiary delay, **TTI**- Time to treatment initiation, **PBS**- Primary Bone Sarcoma, **PSTS**- Primary Soft Tissue Sarcoma, **PES**- Primary Extremity Sarcoma).

STUDY	Median TTI (in Days)	Mean TTI (in Days)	Median TD (in Days)
<i>Curtis et al., (PBS)*</i>	22	32	Same as Median TTI
<i>Curtis et al., (PSTS)*</i>	22	29.7	Same as Median TTI
<i>Featherall et al., (PSTS) *</i>	22	29.7	Same as Median TTI
Our study – PBS	35	35.6	13 24
PSTS	30	31.6	20 23
Overall PES	34	41.5	16 22

Table-4- Comparison of Mean & Median TTI & Median TTLC. (**TD**-Tertiary delay, **TTI**- Time to treatment initiation, **PBS**- Primary Bone Sarcoma, **PSTS**- Primary Soft Tissue Sarcoma, **PES**- Primary Extremity Sarcoma)

* indicate median TTI & Median TD same in study as per definition.

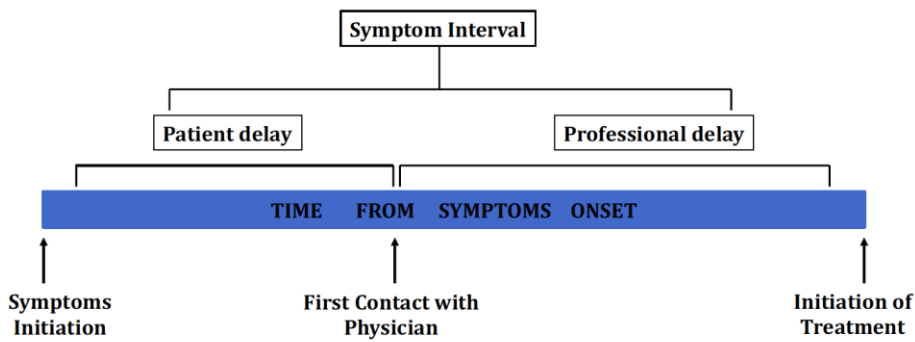


Figure-1 - Symptom interval, Patient delay, and Professional delay.

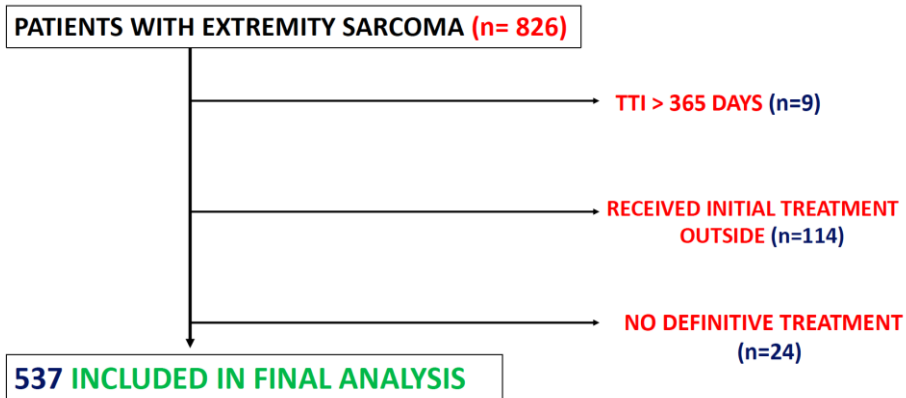


Figure-02- Inclusion & exclusion criteria of the study

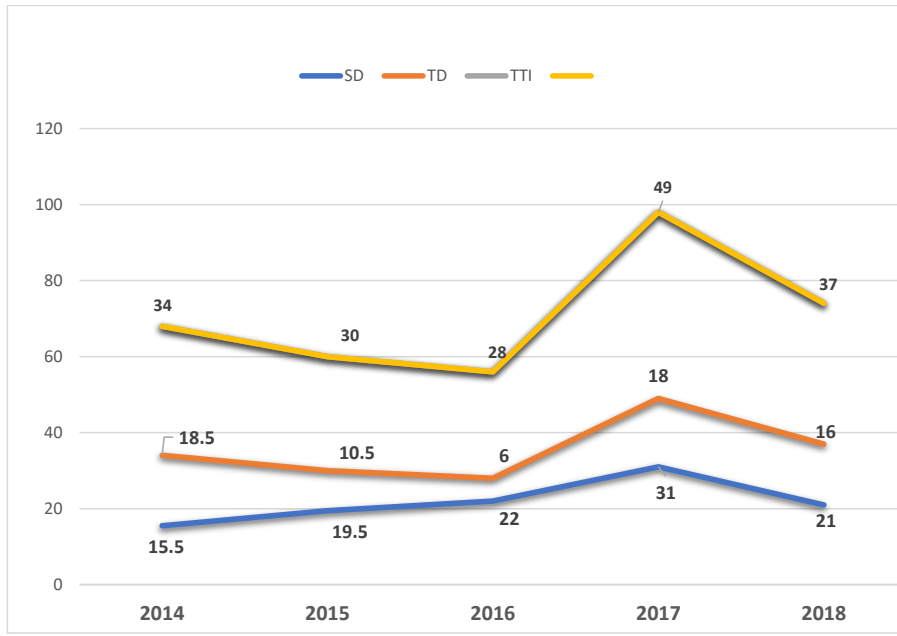


Figure-03 – Year wise Median SD, TD & TTI in Primary Bone Sarcoma from 2014 to 2018.
 (SD- Secondary delay, TD-Tertiary delay, TTI- Time to treatment initiation).

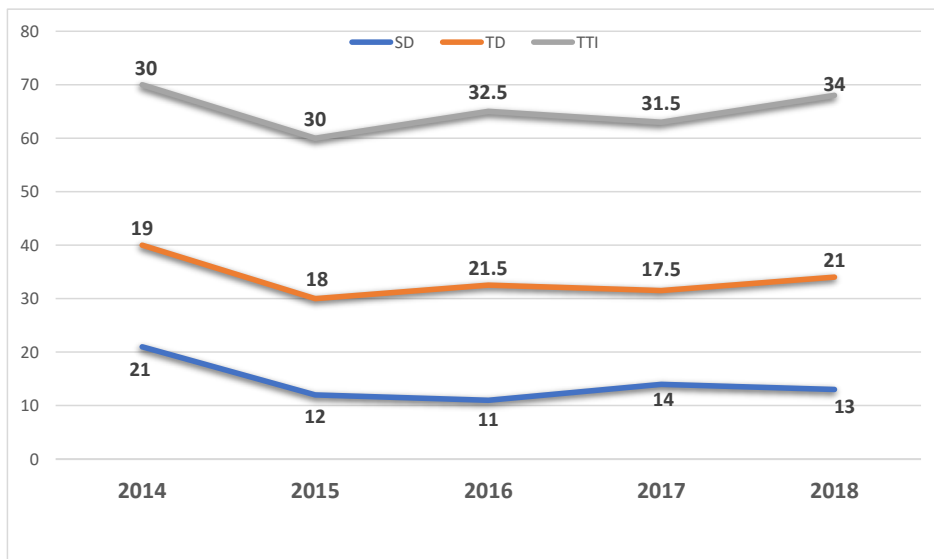


Figure-04 – Year wise Median SD, TD & TTI in Primary Soft tissue Sarcoma from 2014 to 2018.
(SD- Secondary delay, TD-Tertiary delay, TTI- Time to treatment initiation).

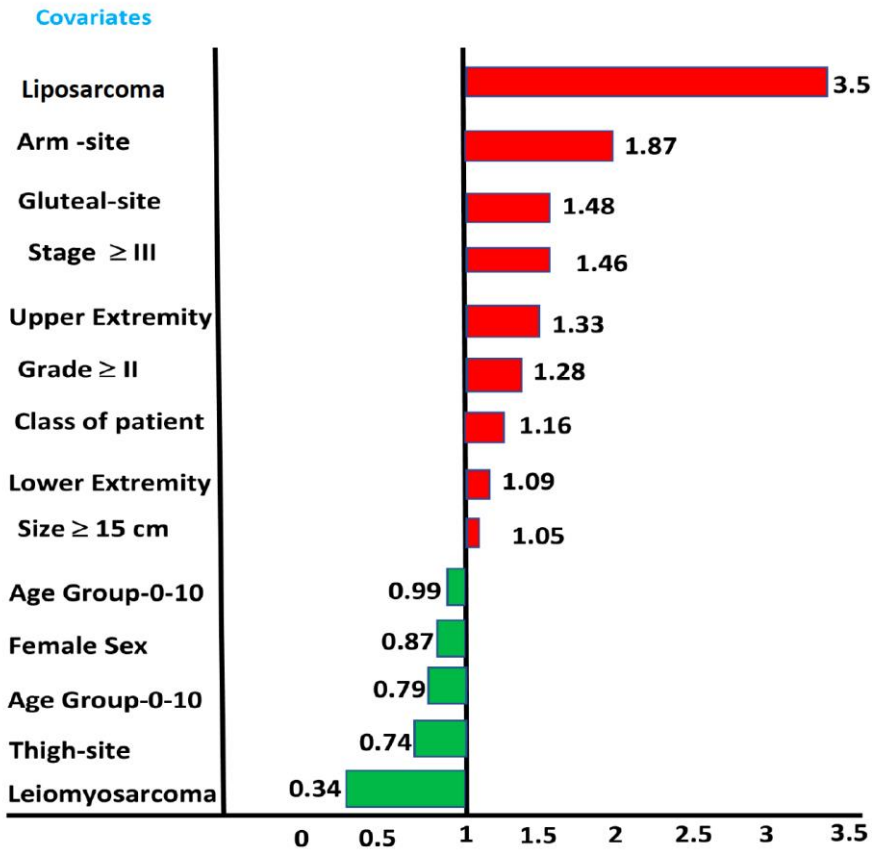


Figure 05- Comparison of Relative Incidence between covariates & Time to treatment initiation (TTI).

