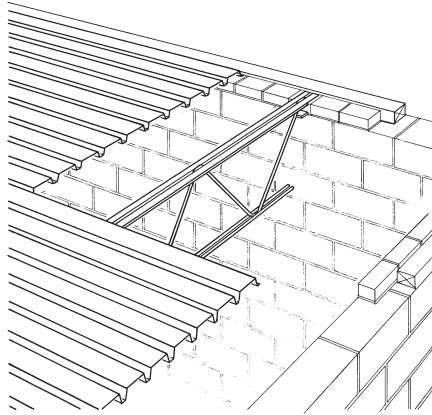


B10 Superstructure

B1020 Roof Construction



Description: Table below lists cost per S.F. for a roof system using open web steel joists and 1-1/2" galvanized metal deck. The system is assumed supported on bearing walls or other suitable support. Costs for the supports are not included.

Design and Pricing Assumptions:

Joists are 5'-0" O.C.

Roof deck is 1-1/2", 22 gauge galvanized.

System Components	QUANTITY	UNIT	COST PER S.F.		
			MAT.	INST.	TOTAL
SYSTEM B1020 116 1100					
METAL DECK AND JOISTS, 20' SPAN, 20 PSF S. LOAD					
Open web joists, horiz. bridging T.L. lot, to 30' span	1.114	Lb.	.87	.36	1.23
Metal decking, open type, galv 1-1/2" deep	1.050	S.F.	1.28	.52	1.80
TOTAL			2.15	.88	3.03

B1020 116		Steel Joists & Deck on Bearing Walls						
	BAY SIZE (FT.)	SUPERIMPOSED LOAD (P.S.F.)	DEPTH (IN.)	TOTAL LOAD (P.S.F.)		COST PER S.F.		
						MAT.	INST.	TOTAL
1100	20	20	13-1/2	40		2.15	.88	3.03
1200		30	15-1/2	50		2.20	.91	3.11
1300		40	15-1/2	60		2.37	.97	3.34
1400	25	20	17-1/2	40		2.37	.97	3.34
1500		30	17-1/2	50		2.57	1.05	3.62
1600		40	19-1/2	60		2.61	1.07	3.68
1700	30	20	19-1/2	40		2.60	1.07	3.67
1800		30	21-1/2	50		2.66	1.09	3.75
1900		40	23-1/2	60		2.87	1.17	4.04
2000	35	20	23-1/2	40		2.85	.99	3.84
2100		30	25-1/2	50		2.94	1.02	3.96
2200		40	25-1/2	60		3.14	1.08	4.22
2300	40	20	25-1/2	41		3.18	1.09	4.27
2400		30	25-1/2	51		3.39	1.16	4.55
2500		40	25-1/2	61		3.51	1.20	4.71
2600	45	20	27-1/2	41		3.58	1.62	5.20
2700		30	31-1/2	51		3.78	1.72	5.50
2800		40	31-1/2	61		4	1.81	5.81
2900	50	20	29-1/2	42		4	1.82	5.82
3000		30	31-1/2	52		4.38	2	6.38
3100		40	31-1/2	62		4.65	2.13	6.78
3200	60	20	37-1/2	42		5.15	1.87	7.02
3300		30	37-1/2	52		5.75	2.06	7.81
3400		40	37-1/2	62		5.75	2.06	7.81
3500	70	20	41-1/2	42		5.75	2.06	7.81
3600		30	41-1/2	52		6.15	2.20	8.35
3700		40	41-1/2	64		7.50	2.66	10.16