

Travel

STAR TREK RPG

Warp speed was recalibrated to a 1-10 scale (with 10 being infinite speed) between TOS and TNG. This document uses the older TOS scale which has no upper limit. Note that speeds above Warp 10 on this scale are known as “transwarp speeds”; during the TOS era, only the *USS Excelsior* possesses an experimental transwarp drive. These become much more common later.

1 parsec = 3.26 light years = 1 hex

This turns out to make Warp 7 very close to 1 day per light year, making it standard travel speed for long-range journeys. With local variations and other factors taken into account, it's safe to say that Warp 7 is 1 day per light year.

Warp	C	1 parsec in	DAYS	HOURS	1 ly in	DAYS	HOURS
1	1	3.26	1189.90	28557.60	1	365.00	8760
2	8	0.4075	148.74	3569.70	0.125	45.63	1095.00
3	27	0.1207407407	44.07	1057.69	0.037037037	13.52	324.44
4	64	0.0509375	18.59	446.21	0.015625	5.70	136.88
5	125	0.02608	9.52	228.46	0.008	2.92	70.08
6	216	0.0150925926	5.51	132.21	0.0046296296	1.69	40.56
7	343	0.0095043732	3.47	83.26	0.0029154519	1.06	25.54
8	512	0.0063671875	2.32	55.78	0.001953125	0.71	17.11
9	729	0.0044718793	1.63	39.17	0.0013717421	0.50	12.02
10	1000	0.00326	1.19	28.56	0.001	0.37	8.76
11	1331	0.0024492863	0.89	21.46	0.0007513148	0.27	6.58
12	1728	0.0018865741	0.69	16.53	0.0005787037	0.21	5.07
13	2197	0.0014838416	0.54	13.00	0.0004551661	0.17	3.99
14	2744	0.0011880466	0.43	10.41	0.0003644315	0.13	3.19
15	3375	0.0009659259	0.35	8.46	0.0002962963	0.11	2.60
16	4096	0.0007958984	0.29	6.97	0.0002441406	0.09	2.14
17	4913	0.0006635457	0.24	5.81	0.0002035416	0.07	1.78
18	5832	0.0005589849	0.20	4.90	0.0001714678	0.06	1.50
19	6859	0.0004752879	0.17	4.16	0.0001457938	0.05	1.28
20	8000	0.0004075	0.15	3.57	0.000125	0.05	1.10

On the main galactic map, 1 hex is one parsec. Therefore travel from Earth to Vulcan (4 hexes) takes 3.47 days at Warp 7.