

Beam Energy, LET, and Range in Si at Various Air Gaps From Exit Window for 15 MeV/u Beams*

Air Gap Distance from Rear Foil (cm)

Beam	0.0		0.5		1.0		1.5		2.0		2.5		3.0		3.5		4.0		4.5		5.0		5.5		6.0	
	N	204	403	204	400	203	397	202	394	201	391	200	388	199	385	198	382	197	378	196	375	195	372	194	369	193
Ne	289	292	287	289	285	286	283	283	281	280	279	277	278	274	276	271	274	268	272	265	270	262	268	259	266	256
Ar	565	212	560	209	554	206	548	203	543	200	537	197	531	194	525	191	520	188	514	185	508	182	502	179	496	176
Cu	866	155	854	153	841	149	828	146	815	143	802	140	788	137	775	134	761	131	747	128	734	125	720	122	705	119
Kr	1142	149	1123	146	1104	143	1084	140	1065	137	1045	134	1024	131	1004	128	984	125	963	122	942	119	921	115	899	112
Ag	1451	130	1421	126	1391	123	1361	120	1330	117	1298	114	1267	111	1235	108	1202	105	1170	102	1136	98.9	1103	95.9	1069	92.8
Xe	1705	126	1667	123	1629	120	1591	117	1552	114	1513	111	1473	108	1433	105	1393	102	1352	98.9	1310	95.8	1268	92.8	1226	89.7
Pr	1861	135	1820	132	1778	129	1736	126	1693	123	1650	120	1607	117	1563	114	1519	111	1474	108	1430	105	1384	102	1338	98.6
Ho	2172	132	2122	129	2073	126	2023	123	1972	120	1921	117	1870	114	1819	110	1767	107	1714	104	1661	101	1608	98.1	1555	95.1
Ta	2399	140	2348	137	2297	134	2245	131	2193	128	2140	125	2087	122	2034	118	1980	115	1926	112	1872	109	1817	106	1762	103
Au	2604	140	2547	137	2489	134	2432	131	2374	128	2315	124	2256	121	2197	118	2137	115	2077	112	2016	109	1955	106	1894	103

Black=Beam Energy (MeV)

RED=LET in Si (MeV/(mg/cm²))

BLUE=Range in Si (microns)

*Values determined using our SEUSS software (2024 version) with the standard 1 mil thick Aramica window