

Bond-Dissociation Energies DH° for A—B Bond, kcal mole⁻¹

A	(52.1) B: H	(18.9) F	(28.9) Cl	(26.7) Br	(25.5) I	(9.4) OH	(44) NH ₂	(35) Me	(29) Et	(21) <i>i</i> -Pr	(12) <i>t</i> -Bu	(79) Ph	(104) CN
(35) methyl	105	110	85	71	57	93	85	90	86	86	84	102	122
(29) ethyl	101	111	83	71	56	95	85	89	88	87	85	101	121
(24) propyl	101	110	84	71	56	95	85	89	88	86	85	101	120
(21) isopropyl	98	109	84	72	56.5	96	85	89	87	85	82	99	119
(12) <i>t</i> -butyl	96	113	84	70	55	96	85	87	95	82	77	99	
(79) phenyl	111	126	96	80.5	65	111	102	102	100	99	96	115	131
(48) benzyl	88		72	58	48	81	71	76	75	74	73	90	
(39) allyl	86		68	54	41	78		74	70	70	67		
(-6) acetyl	86	119	81	66	49	107		81	79	77	75	93.5	
(-4) ethoxy	104					44		83	85			101	
(72) vinyl	112		92	80				102	101	100	95	105	132
(52.1) H	104.2	135.8	103.2	87.5	71.3	119	107	105	101	98	96	111	125

Numbers in parentheses are the heats of formation, ΔH_f° , for the corresponding atom or radical.

"Introduction to Organic Chemistry"

Streitwieser, Heathcock, and Kosower