	ω	${ m B2PLYP'/def2-SV}$	/P	
Iolecule	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{S}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_1\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$f_{12}(S_0-S_1)$
S1169	3.2730	3.0440	0.2290	0.0320
S1170	3.4610	2.9470	0.5140	0.2786
S1171	3.1360	2.9710	0.1650	0.0357
S1172	2.9800	2.7200	0.2600	0.0554
S1173	3.2150	2.9590	0.2560	0.0631
S1174	3.2070	2.8480	0.3590	0.2981
S1175	2.3250	2.1930	0.1320	0.0313
S1176	3.0600	2.7600	0.3000	0.0856
S1177	3.0670	2.6160	0.4510	0.3470
S1178	3.2830	2.8970	0.3860	0.5791
S1179	2.5040	2.3690	0.1350	0.0355
S1180	2.3410	2.2500	0.0910	0.0200
S1181	3.1400	2.6860	0.4540	0.4872
S1181	2.5120	2.4130	0.0990	0.0222
S1183	3.2950	2.8430	0.4520	0.0242
S1184	3.2050	2.9930	0.2120	0.0242 0.0251
S1184 S1185	3.0990	2.7340	0.3650	0.0231 0.0526
S1186	3.1750	2.9530	0.2220	0.0368
S1187	3.1270	2.7190	0.4080	0.0514
S1188	3.4750	2.9190	0.5560	0.2927
S1189	3.4120	2.8170	0.5950	0.2321
S1190	3.3660	3.0400	0.3260	0.0825
S1190 S1191	3.2680	2.9410	0.3270	0.0325 0.0465
S1191 S1192	3.2150	2.9080	0.3070	0.0403
S1192 S1193	3.5110	2.5000 2.5110	1.0000	1.2392
S1193 S1194	3.3290	2.5860	0.7430	0.3713
S1194 S1195	3.3580	2.5390	0.8190	0.6153
S1195 S1196	3.2860	3.0010	0.2850	0.0133 0.0233
S1190 S1197	3.1590	3.0230	0.1360	0.0233
			0.1150	
S1198	3.1210	3.0060		0.0070
S1199	3.0810	3.0150	0.0660	0.0039
S1200	3.0430	2.9780	$0.0650 \\ 0.1700$	0.0023
S1201	3.1950	3.0250		0.0126
S1202	3.2190	$2.9660 \\ 2.8610$	$0.2530 \\ 0.3880$	0.0182
S1203	3.2490			0.0010
S1204	3.0870	3.0040	0.0830	0.0050
S1205	3.1990	3.0260	0.1730	0.0130
S1206	3.1580	3.0170	0.1410	0.0096
S1207	3.1030	2.8010	0.3020	0.0055
S1208	3.1970	3.0160	0.1810	0.0129
S1209	3.3680	3.0000	0.3680	0.0340
S1210	3.3270	2.9990	0.3280	0.0243
S1211	3.1220	2.9930	0.1290	0.0068
S1212	3.1730	2.9930	0.1800	0.0108
S1213	3.1500	3.0150	0.1350	0.0089
S1214	3.1870	2.8050	0.3820	1.2665

Dabiyb;/data Syb					
Molecule	$\Delta \mathrm{E}(\mathrm{S}_0 ext{-}\mathrm{S}_1) \; [\mathrm{eV}]$	$ m egin{aligned} B2PLYP'/def2-SV \ \Delta E(S_0-T_1) \ [eV] \end{aligned}$	$oldsymbol{\Delta} ext{E}(ext{S}_1 ext{-T}_1) ext{ [eV]}$	$f_{12}(S_0-S_1)$	
-					
S1215	3.1720	2.7760	0.3960	1.4075	
S1216	3.1270	2.7650	0.3620	0.9495	
S1217	3.1400	2.8400	0.3000	1.2265	
S1218	3.1280	2.7680	0.3600	1.5079	
S1219	2.9760	2.6920	0.2840	1.5312	
S1220	2.9190	2.6500	0.2690	1.3874	
S1221	3.1430	2.9690	0.1740	0.1648	
S1222	3.0370	2.7430	0.2940	1.4362	
S1223	3.1770	2.8560	0.3210	0.4103	
S1224	3.1330	2.8300	0.3030	1.3457	
S1225	3.0900	2.8150	0.2750	0.9693	
S1226	3.1500	2.8240	0.3260	0.5469	
S1227	3.1520	2.8510	0.3010	1.1018	
S1228	3.1180	2.8220	0.2960	1.1136	
S1229	3.1120	2.8100	0.3020	1.2109	
S1230	3.1090	2.8390	0.2700	0.9135	
S1231	2.8930	2.6430	0.2500	1.4317	
S1232	3.1710	2.8490	0.3220	1.2450	
S1233	3.1880	2.8600	0.3280	0.3579	
S1234	3.0320	2.4880	0.5440	0.1642	
S1235	3.0970	2.7060	0.3910	1.2825	
S1236	3.0440	2.7760	0.2680	1.0305	
S1237	3.2730	2.9160	0.3570	0.4918	
S1238	3.2880	2.9170	0.3710	0.4596	
S1239	3.2440	2.6930	0.5510	1.8293	
S1240	3.1890	2.9430	0.2460	0.0622	
S1241	3.2290	2.6770	0.5520	1.8381	
S1242	3.2620	2.8190	0.4430	0.2058	
S1243	3.3050	2.8530	0.4520	0.4735	
S1244	3.3260	2.8160	0.5100	0.7148	
S1245	3.3410	2.9120	0.4290	0.5639	
S1246	3.1890	2.6380	0.5510	1.9792	
S1247	3.1360	3.0060	0.1300	0.0317	
S1248	3.0720	2.9140	0.1580	0.0563	
S1249	3.2000	2.9980	0.2020	0.0813	
S1250	3.0670	2.8880	0.1790	0.0407	
S1251	3.1300	2.9290	0.2010	0.1354	
S1252	3.0750	2.7900	0.2850	0.6765	
S1253	3.1320	2.8550	0.2770	0.3867	
S1254	3.0980	2.8030	0.2950	0.6137	
S1255	3.0870	2.7730	0.3140	0.7890	
S1256	3.0970	2.8950	0.2020	0.0863	
S1257	3.0200	2.7260	0.2940	0.6366	
S1258	2.9980	2.7390	0.2590	0.5214	
S1259	3.0220	2.7270	0.2950	0.6422	
S1260	3.0100	2.7490	0.2610	0.5128	
		·			

Molecule $\Delta E(S_0-S_1)$ [eV] $\Delta E(S_0-T_1)$ [eV] $\Delta E(S_1-T_1)$ [eV] $f_{12}(S_0-S_1)$ S1261 3.1450 2.8440 0.3010 0.9037 S1262 2.9980 2.6190 0.3790 0.7865 S1263 3.0840 2.9150 0.1690 0.0377 S1264 3.0470 2.7660 0.2810 0.7134 S1265 3.0630 2.7640 0.2990 0.6247 S1266 3.0320 2.7690 0.2630 0.5390 S1267 3.0360 2.7620 0.2740 0.5576 S1268 2.9510 2.5130 0.4380 0.7721 S1269 3.0930 2.8110 0.2820 0.5800 S1270 3.0570 2.7820 0.2750 0.5912 S1271 3.0410 2.7950 0.2460 0.4638 S1272 3.0130 2.7670 0.2460 0.4970 S1273 3.0340 2.6910 0.3430 0.6911 S1274 3.1190 2.9260 0.1930 0.0775 S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497		$_{\omega ext{B2PLYP'/def2-SVP}}$					
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	Molecule		•		$f_{12}(S_0-S_1)$		
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	S1261	3.1450	2.8440	0.3010	0.9037		
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	S1262	2.9980	2.6190	0.3790	0.7865		
S1265 3.0630 2.7640 0.2990 0.6247 S1266 3.0320 2.7690 0.2630 0.5390 S1267 3.0360 2.7620 0.2740 0.5576 S1268 2.9510 2.5130 0.4380 0.7721 S1269 3.0930 2.8110 0.2820 0.5800 S1270 3.0570 2.7820 0.2750 0.5912 S1271 3.0410 2.7950 0.2460 0.4638 S1272 3.0130 2.7670 0.2460 0.4970 S1273 3.0340 2.6910 0.3430 0.6911 S1274 3.1190 2.9260 0.1930 0.0775 S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1263	3.0840	2.9150	0.1690	0.0377		
S1266 3.0320 2.7690 0.2630 0.5390 S1267 3.0360 2.7620 0.2740 0.5576 S1268 2.9510 2.5130 0.4380 0.7721 S1269 3.0930 2.8110 0.2820 0.5800 S1270 3.0570 2.7820 0.2750 0.5912 S1271 3.0410 2.7950 0.2460 0.4638 S1272 3.0130 2.7670 0.2460 0.4970 S1273 3.0340 2.6910 0.3430 0.6911 S1274 3.1190 2.9260 0.1930 0.0775 S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1264	3.0470	2.7660	0.2810	0.7134		
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	S1265	3.0630	2.7640	0.2990	0.6247		
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	S1266	3.0320	2.7690	0.2630	0.5390		
S1269 3.0930 2.8110 0.2820 0.5800 S1270 3.0570 2.7820 0.2750 0.5912 S1271 3.0410 2.7950 0.2460 0.4638 S1272 3.0130 2.7670 0.2460 0.4970 S1273 3.0340 2.6910 0.3430 0.6911 S1274 3.1190 2.9260 0.1930 0.0775 S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1267	3.0360	2.7620	0.2740	0.5576		
S1270 3.0570 2.7820 0.2750 0.5912 S1271 3.0410 2.7950 0.2460 0.4638 S1272 3.0130 2.7670 0.2460 0.4970 S1273 3.0340 2.6910 0.3430 0.6911 S1274 3.1190 2.9260 0.1930 0.0775 S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1268	2.9510	2.5130	0.4380	0.7721		
S1271 3.0410 2.7950 0.2460 0.4638 S1272 3.0130 2.7670 0.2460 0.4970 S1273 3.0340 2.6910 0.3430 0.6911 S1274 3.1190 2.9260 0.1930 0.0775 S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1269	3.0930	2.8110	0.2820	0.5800		
S1272 3.0130 2.7670 0.2460 0.4970 S1273 3.0340 2.6910 0.3430 0.6911 S1274 3.1190 2.9260 0.1930 0.0775 S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1270	3.0570	2.7820	0.2750	0.5912		
S1273 3.0340 2.6910 0.3430 0.6911 S1274 3.1190 2.9260 0.1930 0.0775 S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1271	3.0410	2.7950	0.2460	0.4638		
S1274 3.1190 2.9260 0.1930 0.0775 S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1272	3.0130	2.7670	0.2460	0.4970		
S1275 2.9740 2.7020 0.2720 0.6887 S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1273	3.0340	2.6910	0.3430	0.6911		
S1276 2.9170 2.6880 0.2290 0.4849 S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1274	3.1190	2.9260	0.1930	0.0775		
S1277 2.9480 2.6820 0.2660 0.6938 S1278 2.8570 2.5890 0.2680 0.4497	S1275	2.9740	2.7020	0.2720	0.6887		
S1278 2.8570 2.5890 0.2680 0.4497	S1276	2.9170	2.6880	0.2290	0.4849		
	S1277	2.9480	2.6820	0.2660	0.6938		
01000 01000 00000 00100 10000	S1278	2.8570	2.5890	0.2680	0.4497		
\$1279 3.1270 2.8080 0.3190 1.3786	S1279	3.1270	2.8080	0.3190	1.3786		
S1280 3.1170 2.8230 0.2940 1.1951	S1280	3.1170	2.8230	0.2940	1.1951		
S1281 2.9920 2.7210 0.2710 0.6644	S1281	2.9920	2.7210	0.2710	0.6644		
S1282 2.9220 2.6870 0.2350 0.5197	S1282	2.9220	2.6870	0.2350	0.5197		
S1283 3.2830 3.0090 0.2740 0.0310	S1283	3.2830	3.0090	0.2740	0.0310		
S1284 3.4610 2.9480 0.5130 0.2780	S1284	3.4610	2.9480	0.5130	0.2780		
S1285 3.3660 3.0400 0.3260 0.0825	S1285	3.3660	3.0400	0.3260	0.0825		
S1286 3.3630 3.0270 0.3360 0.1524	S1286	3.3630	3.0270	0.3360	0.1524		
S1287 3.3820 3.0380 0.3440 0.1137	S1287	3.3820	3.0380	0.3440	0.1137		
S1288 3.4260 2.9810 0.4450 0.2539	S1288	3.4260	2.9810	0.4450	0.2539		
S1289 3.3750 3.0170 0.3580 0.2329	S1289	3.3750	3.0170	0.3580	0.2329		
S1290 3.3250 2.9860 0.3390 0.2075	S1290	3.3250	2.9860	0.3390	0.2075		
S1291 3.2910 3.0120 0.2790 0.4017	S1291	3.2910	3.0120	0.2790	0.4017		
S1292 3.1990 2.9650 0.2340 0.7353	S1292	3.1990	2.9650	0.2340	0.7353		
S1293 3.2290 2.9650 0.2640 0.5677	S1293	3.2290	2.9650	0.2640	0.5677		
S1294 3.1900 2.9460 0.2440 0.5825	S1294	3.1900	2.9460	0.2440	0.5825		
S1295 3.1650 3.0010 0.1640 0.6973	S1295	3.1650	3.0010	0.1640	0.6973		
S1296 3.1320 2.9390 0.1930 0.4186	S1296	3.1320	2.9390	0.1930	0.4186		
S1297 2.9650 2.9180 0.0470 0.7236	S1297	2.9650	2.9180	0.0470	0.7236		
S1298 3.1420 2.9560 0.1860 0.5367	S1298	3.1420	2.9560	0.1860	0.5367		
S1299 3.1160 2.9430 0.1730 0.6139	S1299	3.1160	2.9430	0.1730	0.6139		
S1300 3.0570 2.9380 0.1190 0.6813	S1300	3.0570	2.9380	0.1190	0.6813		
S1301 3.1960 2.9590 0.2370 0.3625	S1301	3.1960	2.9590	0.2370	0.3625		
S1302 3.1750 2.9550 0.2200 0.4404	S1302	3.1750	2.9550	0.2200	0.4404		
S1303 3.1640 2.9650 0.1990 0.5006	S1303	3.1640	2.9650	0.1990	0.5006		
S1304 3.1560 2.9100 0.2460 0.4543	S1304	3.1560	2.9100	0.2460	0.4543		
S1305 3.1550 2.9390 0.2160 0.4525	S1305	3.1550	2.9390	0.2160	0.4525		
S1306 3.1970 2.9670 0.2300 0.4463	S1306	3.1970	2.9670	0.2300	0.4463		

	ά	B2PLYP'/def2-SV	/P	
Molecule	$\Delta E(S_0\text{-}S_1)~[eV]$	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{T}_1^{'}) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_1\text{-}\mathrm{T}_1)~[\mathrm{eV}]$	$f_{12}(S_0-S_1)$
S1307	3.1860	2.9650	0.2210	0.3843
S1308	3.1770	2.9620	0.2150	0.4268
S1309	2.6020	1.8730	0.7290	0.0104
S1310	3.1520	2.9530	0.1990	0.3629
S1311	3.1630	2.9680	0.1950	0.4132
S1312	3.1580	2.9240	0.2340	0.3060
S1313	3.2230	2.9810	0.2420	0.2135
S1314	3.1970	2.9640	0.2330	0.3766
S1315	3.2210	2.9490	0.2720	0.2961
S1316	3.1470	2.9620	0.1850	0.5257
S1317	3.1740	2.9670	0.2070	0.4586
S1318	3.1220	2.9330	0.1890	0.3892
S1319	3.1080	2.7710	0.3370	0.3711
S1320	3.1570	2.9620	0.1950	0.5039
S1321	3.1760	2.9690	0.2070	0.4403
S1322	3.1400	2.9440	0.1960	0.4387
S1323	3.0720	2.9070	0.1650	0.5123
S1324	2.9970	2.6040	0.3930	0.5738
S1325	2.7960	2.8390	-0.0430	0.7560
S1326	3.2040	2.9720	0.2320	0.3618
S1327	3.1470	2.9530	0.1940	0.0803
S1328	3.0830	2.9170	0.1660	0.5551
S1329	3.1320	2.9820	0.1500	0.6160
S1330	3.1400	2.9680	0.1720	0.7439
S1331	3.0310	2.9640	0.0670	0.6326
S1332	3.2270	2.8930	0.3340	0.1587
S1333	3.2560	3.0020	0.2540	0.0372
S1334	3.1870	2.9970	0.1900	0.3292
S1335	3.1190	2.9860	0.1330	0.4232
S1336	3.1920	2.9840	0.2080	0.4253
S1337	3.2250	3.0110	0.2140	0.2063
S1338	3.1050	2.8790	0.2260	0.2064
S1339	3.0410	2.9330	0.1080	0.8803
S1340	3.1350	2.9270	0.2080	1.0158
S1341	3.1470	2.9350	0.2120	1.0476
S1342	3.1890	2.9260	0.2630	1.0291
S1343	3.1720	2.9330	0.2390	1.0445
S1344	2.8810	2.8510	0.0300	0.3476
S1345	3.2670	3.0310	0.2360	0.0835
S1346	3.1750	2.9310	0.2440	1.0107
S1347	3.1790	2.9390	0.2400	1.0310
S1348	3.0440	2.8990	0.1450	0.9345
S1349	3.0320	2.9000	0.1320	0.9649
S1350	3.1880	2.9260	0.2620	1.0204
01000			U.=U=U	
S1350 S1351	3.1740	2.9320	0.2420	1.0373

Molecule	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{S}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_0 ext{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_1 ext{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$f_{12}(S_0-S_1)$		
S1353	3.0820	2.9340	0.1480	0.8213		
S1354	2.9110	2.9050	0.0060	0.7164		
S1355	3.1870	3.0300	0.1570	0.0328		
S1356	2.9690	2.8620	0.1070	0.3652		
S1357	3.0190	2.8970	0.1220	0.8764		
S1358	3.0440	2.9090	0.1350	0.9068		
S1359	3.1880	2.9950	0.1930	0.5857		
S1360	3.2630	2.9760	0.2870	0.8119		
S1361	3.1600	2.9930	0.1670	0.6417		
S1362	3.1910	2.9790	0.2120	0.7217		
S1363	3.1650	2.9770	0.1880	0.7758		
S1364	3.0480	2.9460	0.1020	0.7505		
S1365	3.2000	2.9900	0.2100	0.8117		
S1366	3.1500	2.9520	0.1980	0.9824		
S1367	3.0560	2.9150	0.1410	0.9510		
S1368	3.0960	2.9620	0.1340	0.7772		
S1369	3.0480	2.9270	0.1210	0.8112		
S1370	2.9520	2.8860	0.0660	0.8009		
S1371	3.0970	2.9850	0.1120	0.6281		
S1372	3.1310	2.9700	0.1610	0.7718		
S1373	3.1800	2.9810	0.1990	0.7536		
S1374	3.2330	2.9950	0.2380	0.4849		
S1375	3.3100	2.9730	0.3370	0.7988		
S1376	3.3230	2.9840	0.3390	0.8131		
S1377	3.1980	2.9840	0.2140	0.8075		
S1378	3.1490	2.9710	0.1780	0.7578		
S1379	3.0290	2.9640	0.0650	0.4880		
S1380	3.0890	2.9840	0.1050	0.6373		
S1381	3.1460	2.9770	0.1690	0.7639		
S1382	3.1920	2.9880	0.2040	0.7484		
S1383	3.2790	3.0040	0.2750	0.4037		
S1384	3.0500	2.9330	0.1170	0.6426		
S1385	3.0810	2.9420	0.1390	0.6045		
S1386	3.0590	2.9290	0.1300	0.6212		
S1387	2.9850	2.9240	0.0610	0.5462		
S1388	2.9880	2.9200	0.0680	0.6417		
S1389	2.9970	2.9180	0.0790	0.6096		
S1390	3.2980	2.9810	0.3170	0.9861		
S1391	3.1990	2.9780	0.2210	0.6716		
S1392	3.3400	2.9780	0.3620	0.8978		
S1393	2.9440	2.9430	0.0010	0.6836		
S1394	3.0420	2.9470	0.0950	0.5919		
S1395	3.0610	2.9450	0.1160	0.5313 0.7827		
S1396	2.9200	2.9020	0.0180	0.8216		
S1397	3.4980	3.2980	0.2000	0.0182		
S1398	3.5340	3.1430	0.3910	0.0102 0.0094		
22000	0.0010	3.1100	0.0010	0.0001		

		B2PLYP'/def2-SV		
Molecule	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{S}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_1\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$f_{12}(S_0-S_1)$
S1399	3.5100	2.9260	0.5840	0.0269
S1400	3.5100	2.9260	0.5840	0.0269
S1401	3.3510	2.8620	0.4890	0.1488
S1402	3.3380	2.8950	0.4430	0.3356
S1403	3.2630	2.8920	0.3710	0.3959
S1404	3.1700	2.8430	0.3270	0.4608
S1405	3.0420	2.7800	0.2620	0.5382
S1406	2.9630	2.7190	0.2440	0.5313
S1407	2.9490	2.7150	0.2340	0.5559
S1408	2.8490	2.6470	0.2020	0.5068
S1409	3.0750	2.7910	0.2840	0.5899
S1410	2.9880	2.7310	0.2570	0.5368
S1411	3.0990	2.8100	0.2890	0.5856
S1412	3.0900	2.7940	0.2960	0.5285
S1413	3.1060	2.8150	0.2910	0.5829
S1414	3.0970	2.7990	0.2980	0.5255
S1415	3.3420	3.1060	0.2360	0.0399
S1416	3.4540	3.2750	0.1790	0.0129
S1417	3.5170	3.2990	0.2180	0.0176
S1418	3.4390	3.2640	0.1750	0.0196
S1419	3.5290	3.1490	0.3800	0.0331
S1420	3.5040	3.1690	0.3350	0.0141
S1420 S1421	3.5920	2.9010	0.6910	0.0141
S1421 S1422	3.4890	3.2830	0.2060	0.0130 0.0170
S1423	3.3490	3.1790	0.1700	0.0170 0.0279
S1423	3.4710	3.2750	0.1960	0.0213 0.0204
S1424 S1425	3.4020	3.1490	0.2530	0.0204 0.0281
S1426	3.3780	2.9960	0.3820	0.0201 0.0221
S1420 S1427	3.3980	3.0910	0.3070	0.0221 0.0385
S1427 S1428	3.3190	3.0730	0.2460	0.0363 0.0421
S1428 S1429	3.4010	2.8220	0.5790	0.0421 0.0246
S1429 S1430	3.1860	2.8750	0.3110	0.0240 0.0286
S1430 S1431	3.4150	3.2350	0.1800	0.0230 0.0241
S1431 S1432	3.5490	2.8700	0.6790	0.0241 0.0250
S1432 S1433	3.4470	$\frac{2.5700}{3.2580}$	0.1890	0.0230 0.0214
S1433 S1434	3.4470 3.2220	3.0570	0.1650	0.0214 0.0279
S1434 S1435				
	3.5250	3.2170	0.3080	0.0465
S1436	3.4800	3.2860	0.1940	0.0406
S1437	3.3320	1.9560	1.3760	0.0018
S1438	3.4060	3.1410	0.2650	0.0902
S1439	3.3960	3.1960	0.2000	0.0456
S1440	3.3490	3.1690	0.1800	0.0165
S1441	3.4750	3.0320	0.4430	0.0237
S1442	3.5790	3.2580	0.3210	0.0768
S1443	3.5040	3.0860	0.4180	0.0257
S1444	3.5260	3.2620	0.2640	0.0983

	c c	${ m bB2PLYP'/def2-SV}$	/P	
Molecule	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{S}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_1\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$f_{12}(S_0-S_1)$
S1445	3.5680	3.1220	0.4460	0.0529
S1446	3.4730	3.0190	0.4540	0.0218
S1447	3.4080	3.2160	0.1920	0.0208
S1448	3.5610	3.0290	0.5320	0.0522
S1449	3.4760	3.0380	0.4380	0.0338
S1450	3.3940	3.2010	0.1930	0.0212
S1451	3.4690	3.2810	0.1880	0.0319
S1452	3.4790	3.2800	0.1990	0.0364
S1453	3.4650	3.2800	0.1850	0.0386
S1454	3.3380	3.1270	0.2110	0.0390
S1455	3.4970	3.2880	0.2090	0.0496
S1456	3.4830	3.2860	0.1970	0.0420
S1450 S1457	3.4820	3.2870	0.1950	0.0420 0.0457
S1457 S1458	3.3900	3.2340	0.1560	0.0437 0.0318
S1459	3.4980	3.2690	0.1300 0.2290	0.0318 0.0824
S1459 S1460	3.4980	3.2530	0.2250 0.2450	0.0624 0.0443
S1460 S1461	3.4980 3.4780	3.2670	0.2450 0.2110	0.0445 0.0685
S1461 S1462	3.4380	3.2130	0.2110 0.2250	0.0035 0.2925
S1462 S1463	3.5200	3.2130 3.2910	0.2290	0.2925 0.0626
S1464	3.4960	3.2850	0.2110	0.0427
S1465	3.4710	3.2770	0.1940	0.0493
S1466	3.5260	3.2380	0.2880	0.3895
S1467	3.5080	3.2920	0.2160	0.0466
S1468	3.4700	3.2860	0.1840	0.0363
S1469	3.4630	3.2730	0.1900	0.0419
S1470	3.2630	3.1200	0.1430	0.0327
S1471	3.2870	3.1860	0.1010	0.6774
S1472	3.4400	2.8450	0.5950	0.0449
S1473	3.4390	2.8380	0.6010	0.0391
S1474	3.4390	2.7730	0.6660	0.0429
S1475	3.2390	2.8390	0.4000	0.0285
S1476	3.4550	3.2700	0.1850	0.0393
S1477	3.4550	3.2750	0.1800	0.0388
S1478	3.4540	3.2640	0.1900	0.0396
S1479	3.3180	3.1990	0.1190	0.0220
S1480	2.6440	2.9920	-0.3480	0.4862
S1481	2.7230	3.0310	-0.3080	0.3478
S1482	2.7270	3.0340	-0.3070	0.3394
S1483	2.8890	3.1260	-0.2370	0.6037
S1484	2.8710	3.1070	-0.2360	0.4574
S1485	2.8740	3.1090	-0.2350	0.4664
S1486	3.1180	3.1860	-0.0680	0.6613
S1487	3.5050	3.0620	0.4430	0.1188
S1488	3.4200	3.1630	0.2570	0.0593
S1489	3.4730	3.1830	0.2900	0.0876
S1490	3.4970	2.8080	0.6890	0.0941

Molecule	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{S}_1) \; [\mathrm{eV}]$	$\Delta ext{B2PLYP'/def2-SV} \ \Delta ext{E(S}_0 ext{-T}_1) ext{ [eV]}$	$\Delta \mathrm{E}(\mathrm{S}_1\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$f_{12}(S_0-S_1)$
				· , ,
S1491	3.3870	3.1400	0.2470	0.0481
S1492	3.3570	3.1480	0.2090	0.0408
S1493	3.4850	2.7340	0.7510	0.0958
S1494	3.3790	3.1190	0.2600	0.0735
S1495	3.3810	3.1470	0.2340	0.0702
S1496	3.3840	3.1400	0.2440	0.0693
S1497	3.4030	3.1390	0.2640	0.0757
S1498	3.3820	3.1240	0.2580	0.0870
S1499	3.3200	3.1370	0.1830	0.0390
S1500	3.4090	3.1400	0.2690	0.1028
S1501	3.4090	3.1430	0.2660	0.0943
S1502	3.4020	3.1320	0.2700	0.1004
S1503	3.3540	3.1180	0.2360	0.0768
S1504	3.4190	3.1190	0.3000	0.1382
S1505	3.4280	3.1400	0.2880	0.0991
S1506	3.4580	3.1120	0.3460	0.1122
S1507	3.4140	2.9780	0.4360	0.4954
S1508	3.4130	3.1260	0.2870	0.1121
S1509	3.4160	3.1500	0.2660	0.0860
S1510	3.4000	3.1310	0.2690	0.1056
S1511	3.4770	3.0380	0.4390	0.4797
S1512	3.4000	3.1280	0.2720	0.0930
S1513	3.3980	3.1470	0.2510	0.0790
S1514	3.3890	3.1270	0.2620	0.0922
S1515	3.3150	3.1250	0.1900	0.0559
S1516	3.3390	2.9390	0.4000	0.8943
S1517	3.3610	2.8530	0.5080	0.0988
S1518	3.3580	2.7900	0.5680	0.0971
S1519	3.3680	2.7860	0.5820	0.1012
S1513 S1520	3.2590	2.8330	0.4260	0.0466
S1520 S1521	3.3780	3.1260	0.4200 0.2520	0.0460 0.0869
S1521 S1522	3.3760	3.1250	0.2510	0.0889
S1522 S1523	3.3810	3.1140	0.2670	0.0839 0.0878
S1523 S1524	3.2760	3.1140 3.1120	0.1640	0.0678 0.0453
S1524 S1525	$\frac{3.2700}{2.9280}$	2.8480	0.0800	0.0453 0.7498
S1525 S1526	3.0090	2.8690	0.1400	0.7498 0.6951
S1520 S1527	3.0110	2.8710	0.1400 0.1400	0.6931 0.6037
S1527 S1528	3.1920	2.9020	0.1400 0.2900	0.0037 0.8776
S1528 S1529				
	3.2020	2.8960	0.3060	0.7943
S1530	3.2030	2.8970	0.3060	0.7951
S1531	3.3530	2.9530	0.4000	0.6765
S1532	3.3160	3.1670	0.1490	0.8091
S1533	3.1170	3.1090	0.0080	0.9386
S1534	3.1920	3.1660	0.0260	0.7452
S1535	3.2060	3.1400	0.0660	1.0358
S1536	3.4770	3.2090	0.2680	0.2168

		B2PLYP'/def2-SV	/P	
Molecule	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{S}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_0 ext{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_1\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$f_{12}(S_0-S_1)$
S1537	3.0120	3.0670	-0.0550	1.0384
S1538	3.2160	3.1730	0.0430	0.6982
S1539	3.1480	3.1130	0.0350	1.1109
S1540	3.4180	3.2050	0.2130	0.4859
S1541	2.9420	3.1110	-0.1690	0.6581
S1542	2.7480	3.0200	-0.2720	0.5690
S1543	3.0520	3.1770	-0.1250	0.6314
S1544	3.1840	2.9250	0.2590	0.8537
S1545	2.7470	3.0090	-0.2620	0.5896
S1546	3.0980	3.1080	-0.0100	0.6577
S1547	3.3310	2.9140	0.4170	0.7510
S1548	3.0460	3.1570	-0.1110	0.6910
S1549	3.3220	2.9540	0.3680	0.8102
S1550	3.0220	3.1600	-0.1380	0.6673
S1551	3.3150	2.9410	0.3740	0.7952
S1552	2.9730	3.0350	-0.0620	1.0814
S1553	3.2550	3.1740	0.0810	0.9459
S1554	3.2250	3.1710	0.0540	0.7582
S1555	2.6520	2.9000	-0.2480	0.6661
S1556	3.2160	3.1450	0.0710	1.0440
S1557	3.3680	3.1910	0.1770	0.6902
S1558	3.4280	3.2070	0.2210	0.2953
S1559	3.1800	3.1820	-0.0020	0.6827
S1560	3.1310	3.1670	-0.0360	0.7196
S1561	3.0350	3.0810	-0.0460	1.0731
S1562	3.1730	3.1490	0.0240	0.9857
S1563	3.0540	3.1780	-0.1240	0.6449
S1564	3.0970	3.1830	-0.0860	0.6481
S1565	3.1480	3.1750	-0.0270	0.7153
S1566	2.6950	3.1660	-0.4710	0.1098
S1567	3.0690	3.1790	-0.1100	0.3520
S1568	3.0580	3.1280	-0.0700	0.8334
S1569	2.9770	3.1110	-0.1340	0.7348
S1570	3.1300	3.1820	-0.0520	0.6820
S1571	3.2250	3.1930	0.0320	0.6459
S1572	3.3170	3.1960	0.1210	0.6111
S1573	2.5910	2.8330	-0.2420	0.7648
S1574	2.9810	3.0890	-0.1080	0.9379
S1575	2.6680	3.0330	-0.3650	0.4554
S1576	2.6340	2.3610	0.2730	0.3496
S1577	2.5810	2.8100	-0.2290	0.8168
S1578	2.6850	3.0050	-0.3200	0.6632
S1579	2.9560	3.0720	-0.1160	0.9755
S1575	2.6140	2.8580	-0.2440	0.7960
S1580 S1581	2.6820	2.9640	-0.2820	0.7993
S1582	3.3580	3.2130	0.1450	0.4672
51002	3.3300	5.2100	0.1100	0.1012

Molecule	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{S}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_0 ext{-}\mathrm{T}_1)~[\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S_1}\text{-}\mathrm{T_1}) \; [\mathrm{eV}]$	$f_{12}(S_0\text{-}S_1)$		
S1583	3.1420	3.1780	-0.0360	0.8999		
S1584	2.9960	3.1050	-0.1090	0.9525		
S1585	3.0900	3.1570	-0.0670	0.8914		
S1586	3.4230	3.2100	0.2130	0.4501		
S1587	3.2710	3.1830	0.0880	0.9404		
S1588	2.6450	3.0020	-0.3570	0.6615		
S1589	3.1060	3.1760	-0.0700	0.9132		
S1590	3.2230	3.0890	0.1340	0.2218		
S1591	3.0800	3.1050	-0.0250	0.9034		
S1592	3.4350	3.2090	0.2260	0.3243		
S1593	3.4190	3.2080	0.2110	0.4937		
S1594	3.0960	3.1610	-0.0650	0.7198		
S1595	3.2960	3.1720	0.1240	0.7030		
S1596	3.2170	3.1710	0.0460	0.7461		
S1597	3.2730	3.1100	0.1630	0.1049		
S1598	3.2770	3.1160	0.1610	0.1350		
S1599	2.9840	3.0670	-0.0830	1.0002		
S1600	2.9440	3.0360	-0.0920	1.0426		
S1601	3.2120	3.1660	0.0460	0.9069		
S1602	3.2770	3.1750	0.1020	0.7453		
S1603	3.1890	3.1660	0.0230	0.9301		
S1604	3.3890	3.1950	0.1940	0.2975		
S1605	3.0920	3.1420	-0.0500	0.9839		
S1606	3.1460	3.1580	-0.0120	0.9027		
S1607	3.0360	3.1310	-0.0950	0.9045		
S1608	3.2530	3.1610	0.0920	1.0079		
S1609	3.3290	3.1700	0.1590	0.8024		
S1610	3.2460	3.1650	0.0810	0.9873		
S1611	3.2100	3.1620	0.0480	1.0130		
S1612	3.2870	3.1710	0.1160	0.8481		
S1613	3.1760	3.1630	0.0130	0.9815		
S1614	3.2670	2.9970	0.2700	0.0333		
S1615	3.2430	3.0890	0.1540	0.3861		
S1616	3.2980	3.1730	0.1250	0.9272		
S1617	3.0620	3.1430	-0.0810	0.9505		
S1618	3.2270	3.0680	0.1590	0.0469		
S1619	3.4190	3.2060	0.2130	0.4933		
S1620	3.3700	3.1640	0.2060	0.1218		
S1621	2.9800	3.1130	-0.1330	0.8956		
S1622	3.2420	3.1620	0.0800	1.0078		
S1623	3.2180	3.1720	0.0460	0.9291		
S1624	3.1980	3.1700	0.0280	0.9996		
S1625	3.2620	3.1760	0.0860	0.8518		
S1626	3.3500	2.8880	0.4620	0.5803		
S1627	3.3180	3.1800	0.1380	0.6843		
S1628	3.3890	3.1630	0.2260	0.9281		

	$\omega ext{B2PLYP'/def2-SVP}$					
Molecule	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{S}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_0 ext{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_1\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$f_{12}(S_0-S_1)$		
S1629	3.4790	3.2250	0.2540	0.0908		
S1630	3.4690	3.1780	0.2910	0.2892		
S1631	3.4650	3.2520	0.2130	0.0356		
S1632	3.5760	3.2790	0.2970	0.1891		
S1633	3.4640	3.2340	0.2300	0.0878		
S1634	3.4570	3.2490	0.2080	0.0360		
S1635	3.4670	3.1800	0.2870	0.2349		
S1636	3.4570	3.2690	0.1880	0.0605		
S1637	3.4560	3.2720	0.1840	0.0547		
S1638	3.4520	3.2710	0.1810	0.0589		
S1639	3.4510	3.2690	0.1820	0.0495		
S1640	3.4470	3.2650	0.1820	0.0518		
S1641	3.4550	3.2720	0.1830	0.0567		
S1642	3.2560	3.1650	0.0910	0.7578		
S1643	3.3330	3.1920	0.1410	0.7327		
S1644	3.4500	3.1670	0.2830	0.9310		
S1645	3.1890	3.1450	0.0440	0.7540		
S1646	3.0590	3.1020	-0.0430	0.8192		
S1647	2.9590	3.0730	-0.1140	0.7154		
S1648	3.4670	3.2550	0.2120	0.0405		
S1649	2.7360	2.4960	0.2400	0.6051		
S1650	3.4560	3.2710	0.1850	0.0574		
S1651	3.1870	3.1590	0.0280	0.9780		
S1652	3.2500	3.1700	0.0800	0.8479		
S1653	3.1660	3.1600	0.0060	0.9806		
S1654	3.3290	3.1870	0.1420	0.6448		
S1655	2.9260	3.0770	-0.1510	0.7125		
S1656	3.1800	3.1550	0.0250	1.0142		
S1657	3.1700	3.1640	0.0060	0.7550		
S1658	3.2440	3.1760	0.0680	0.9948		
S1659	3.3390	3.1530	0.1860	1.1480		
S1660	3.1880	3.1310	0.0570	1.0984		
S1661	3.0740	3.0950	-0.0210	1.0926		
S1662	2.9950	3.0630	-0.0680	0.9397		
S1663	3.4230	3.2020	0.2210	0.3827		
S1664	3.4470	3.2640	0.1830	0.0594		
S1665	3.2280	3.1870	0.0410	0.7676		
S1666	3.1950	3.1610	0.0340	0.9719		
S1667	3.1260	3.1510	-0.0250	0.7713		
S1668	2.8840	2.4890	0.3950	0.9676		
S1669	3.0090	3.0790	-0.0700	1.0027		
S1670	3.1800	3.1560	0.0240	0.9556		
S1670 S1671	3.1920	3.1710	0.0240	0.7880		
S1671 S1672	3.1920 3.2870	3.1620	0.0210 0.1250	0.7983		
S1672 S1673	3.1690	3.1620 3.1570	0.1250 0.0120	0.7985 0.9757		
S1673 S1674	3.3150		0.0120	0.9757 0.6529		
51074	0.0100	3.1850	0.1300	0.0529		

	ω	B2PLYP'/def2-SV	/P	
Molecule	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{S}_1)~[\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_0\text{-}\mathrm{T}_1) \; [\mathrm{eV}]$	$\Delta \mathrm{E}(\mathrm{S}_1\text{-}\mathrm{T}_1)~[\mathrm{eV}]$	$f_{12}(S_0-S_1)$
S1675	3.4500	3.2650	0.1850	0.0558
S1676	3.2840	3.1990	0.0850	0.5156
S1677	3.2450	3.2110	0.0340	0.6365
S1678	3.2960	3.2240	0.0720	0.5096
S1679	3.4660	3.2610	0.2050	0.0489
S1680	3.2640	3.1810	0.0830	0.9589
S1681	3.3980	3.1480	0.2500	1.1146
S1682	3.2810	3.1870	0.0940	0.9309
S1683	3.2770	3.1840	0.0930	0.9298
S1684	3.4020	3.1450	0.2570	1.1164
S1685	3.2280	3.1330	0.0950	1.0528
S1686	3.1580	3.1120	0.0460	1.0621
S1687	3.1320	3.1250	0.0070	0.9642
S1688	3.2670	3.1810	0.0860	0.9381
S1689	3.4120	3.1470	0.2650	1.0939
S1690	3.4430	3.2240	0.2190	0.2448
S1691	3.2040	3.1990	0.0050	0.4935
S1692	3.2410	3.2120	0.0290	0.5820
S1693	3.2590	3.2030	0.0560	0.5665
S1694	3.1700	3.2090	-0.0390	0.5962
S1695	3.3380	3.1860	0.1520	0.6070
S1696	3.3470	3.2090	0.1380	0.4178
S1697	3.4390	3.2220	0.2170	0.2587
S1698	3.2500	3.1250	0.1250	0.9972
S1699	3.4420	3.2230	0.2190	0.2555
S1700	3.3040	3.2100	0.0940	0.4736
S1701	3.4560	3.2360	0.2200	0.2418
S1702	3.3260	3.1710	0.1550	0.0688