

Files generated by R.E.D. Server/R.E.D. IV

Charge derivation & force field library building for ten “independent” molecules.

Programs interfaced: Gaussian 2003 & RESP

Parent_directory

Mol_m1

File4REDDB_m1.pdb
JOB2-gau_m1-1-1.com
JOB2-gau_m1-1-1.out
JOB2-gau_m1-1-2.com
JOB2-gau_m1-1-2.out
Mol_m1-o1-qmra.pdb
Mol_m1-o1-rbra1.pdb
Mol_m1-o1-rbra2.pdb
Mol_m1-o1.mol2
esout_m1
espot_m1
espot_m1-1-1
espot_m1-1-2
input1_m1
input2_m1
output1_m1
output2_m1
punch1_m1
punch2_m1
qout1_m1
qout2_m1

Single molecule charge derivation

m1 = molecule 1
Gaussian input: m1-1-1: molecule 1; conformation 1; orientation 1
Gaussian output

Orientation of opt. geometry based on the Gaussian program
Rigid-body re-orientation algorithm: orientation 1

Force field library

RESP output
Two espot of molecule 1 concatenated in a single file
m1-1-1: molecule 1; conformation 1; orientation 1

RESP input - single molecule (stage 1)
RESP input - single molecule (stage 2)
RESP output - single molecule (stage 1)
RESP output - single molecule (stage 2)
RESP output - single molecule (stage 1)
RESP output - single molecule (stage 2)
RESP output (charge values - stage 1)
RESP output (charge values - stage 2)

Mol_m2

Similar listing of files as that found in Mol_m1
Except that “m2” replaces “m1” in the file names.

[...]

Mol_m10

Similar listing of files as that found in Mol_m1
Except that “m10” replaces “m1” in the file names.

Mol_MM

esout_mm
espot_mm
input1_mm
input2_mm
mm1-o1.mol2
mm2-o1.mol2
mm3-o1.mol2
mm4-o1.mol2
mm5-o1.mol2
mm6-o1.mol2
mm7-o1.mol2
mm8-o1.mol2
mm9-o1.mol2
mm10-o1.mol2
output1_mm
output2_mm
punch1_mm
punch2_mm
qout1_mm
qout2_mm

Multiple molecules charge derivation

Contains the “espot” of the 10 molecules concatenated one after the others
RESP input - multiple molecules (stage 1)
RESP input - multiple molecules (stage 2)

Force field library mm1-o1: multiple molecules 1; o1 = conformation 1

RESP output - multiple molecules (stage 1)
RESP output - multiple molecules (stage 2)
RESP output - multiple molecules (stage 1)
RESP output - multiple molecules (stage 2)