Network Data File Structure

All network data properties are written in four different data files. The format of these files is that used by Statoil.

Throat Data

The data for the throats are read from the link files. The structure of the link files is as follows:

*_link1.dat

1. Total number of throats
2. Throat index
3. Pore 1 index
4. Pore 2 index
5. Throat radius
6. Throat shape factor
7. Throat total length (pore centre to pore centre)

Example of *_link1.dat file

```
26146
    1    -1     8     0.349563E-04      0.297308E-01      0.160000E-03
    2    -1    53     0.171065E-04      0.442550E-01      0.211076E-04
    3    -1    60      0.198366E-04     0.354972E-01      0.300000E-04
    4    -1    68      0.938142E-05     0.323517E-01      0.100000E-04
```

*_link2.dat

1. Throat index
2. Pore 1 index
3. Pore 2 index
4. Length pore 1
5. Length pore 2
6. Throat length
7. Throat volume
8. Throat clay volume

Example of *_link2.dat file

```
5056  2184  2384  0.10E-04   0.4350E-04  0.1720E-04  0.480E-13  0.20E-13
5057  2184  2188  0.947E-04  0.2764E-04  0.1935E-04  0.112E-12  0.291E-13
5058  2185  2386  0.192E-04  0.221E-04   0.2004E-04  0.329E-13  0.711E-14
```

Pore Data

The data for the throats are read from the node files. The structure of the node files is as follows:

*_node1.dat

1. Total number of pores, length, width and height of the network.
2. Pore index
3. Pore X position
4. Pore Y position
5. Pore Z position
6. Pore connection number
7. Connecting links index (0: outlet; -1: inlet)

Example of *_node1.dat file

```
12349        0.300000E-02      0.300000E-02      0.300000E-02
1      0.350E-03   0.000E+00   0.700E-04   3   796   674    2    0    0   522   523   524
2      0.450E-03   0.500E-04   0.000E+00   3   359   31     1    0   -1   525   526   524
3      0.880E-03   0.100E-04   0.000E+00   1   392    0     0   527
```

*_node2.dat

1. Pore index
2. Pore volume
3. Pore radius
4. Pore shape factor
5. Pore clay volume

Example of *_node2.dat file

```
15     0.497823E-13      0.568035E-05      0.481100E-01      0.709574E-14
16     0.326695E-13      0.810909E-05      0.332994E-01      0.773890E-15
17     0.186684E-13      0.747299E-05      0.335212E-01      0.212502E-15
```