

```
<< Statistics`ContinuousDistributions`
(* We need some probability distributions *)
```

```
MainRadius := 8

Torus[u_, z_, phi_] := {
  (MainRadius + u) Cos[phi],
  (MainRadius + u) Sin[phi],
  z
}

Coords[n_] := SetPrecision[Flatten[Table[
  Torus[#1, #2, #3] &[
    Random[NormalDistribution[0, 0.8]],
    Random[NormalDistribution[0, 1/5]],
    Random[Real, {0, 2 Pi}]
  ], {n}], 0], 9]

Joints[n_] := Table[x, {x, 0, n - 1}]

MeshHeader[n_] := StringForm[StringJoin[
  "mesh\r vertexdesc position f3 end_vertexdesc\r\rvertices ", ToString[n], "\r"
]]

LinesHeader[n_] := StringForm[StringJoin["\rpoints 1 ", ToString[n]]]

EndMesh := StringForm["\rend_mesh\r\r"]

AllData[n_] := Join[Prepend[Coords[n], MeshHeader[n]],
  Append[Prepend[Joints[n], LinesHeader[n]], EndMesh]]

DataFile[n_] := Export[StringJoin["AllData_", ToString[n], ".txt"], AllData[n], "Table"]
```

```
DataFile[10000] (* This will export all the data into a single CMOD file *)
```

```
In[11]:= Plot[PDF[NormalDistribution[0, 2], x], {x, 0, 6}, PlotRange -> All]
```

