```
In[•]:= ClearAll["Global`*"]
       $VersionNumber
```
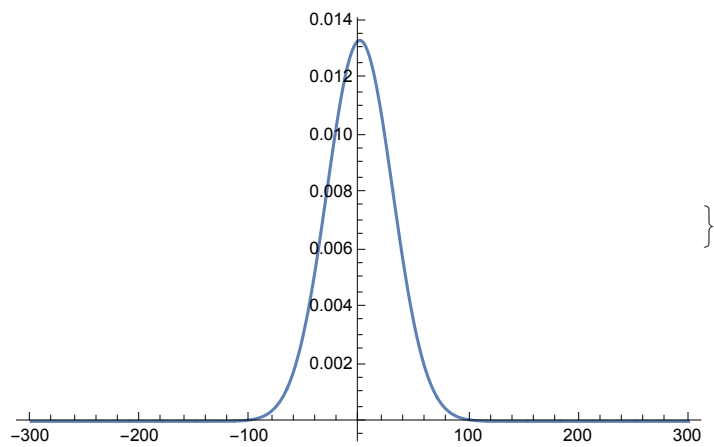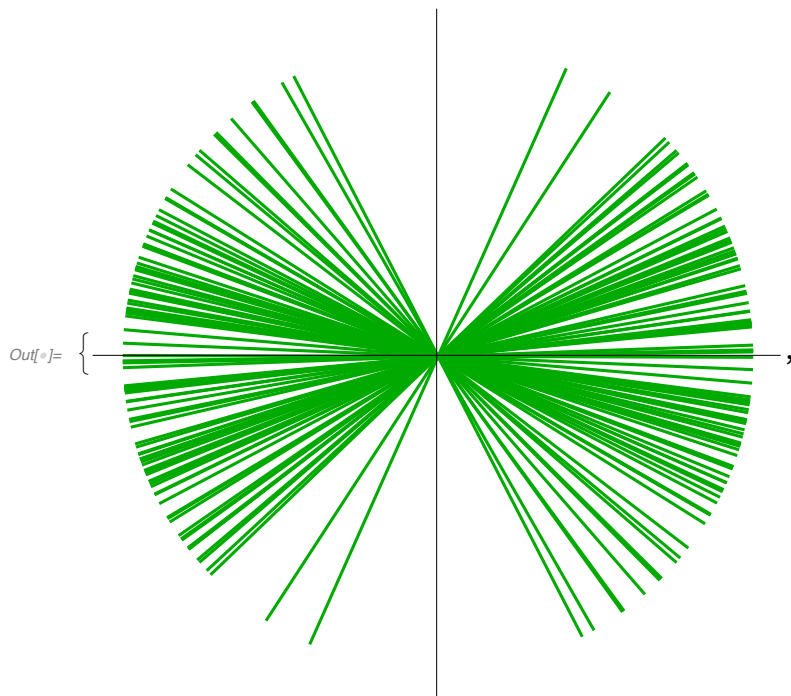
```
Out[•]= 12.3
```
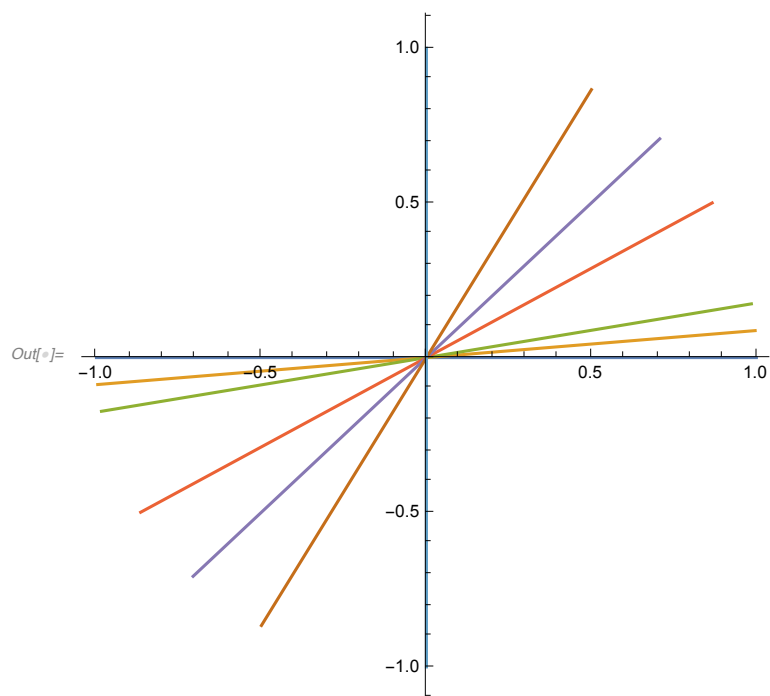
CMF distribution

```
In[•]:= ClearAll["Global`*"]
```

```
In[•]:= AngleLine[a_] := {{Re[Exp[I a Degree]], Im[Exp[I a Degree]]},
         {Re[Exp[I (a + 180) Degree]], Im[Exp[I (a + 180) Degree]]}};
     dist[x_, sig_, n_] := Module[{x0 = x, sig0 = sig, n0 = n},
       AngleLine[a_] := {{Re[Exp[I a Degree]], Im[Exp[I a Degree]]},
           {Re[Exp[I (a + 180) Degree]], Im[Exp[I (a + 180) Degree]]}};
       p1 = ListLinePlot[AngleLine /@ RandomVariate[NormalDistribution[x0, sig0], n0],
         PlotRange → {{-1.1, 1.1}, {-1.1, 1.1}}, AspectRatio → 1,
         ImageSize → Medium, PlotStyle → Darker[Green],
         Ticks → None, TicksStyle → Directive["Label", 14]];
       p2 = Plot[PDF[NormalDistribution[x0, sig0], y], {y, -300, 300},
         PlotRange → All, ImageSize → Medium];
       {p1, p2}
      ]
```

In[ ]:= `dist[0, 30, 100](*fiber direction, standard deviation, number of fibers*)`

Out[ ]= {

,

}

In[ ]:= `ListLinePlot[AngleLine /@ {0, 5, 10, 30, 45, 60, 90},`
   `AspectRatio → 1, ImageSize → Medium]`

Out[ ]=

In[ ]:= `Table[dist[0, x, 100], {x, 5, 25, 10}]`

Out[ ]= `{{`

`,`

},

,

},

,

}}