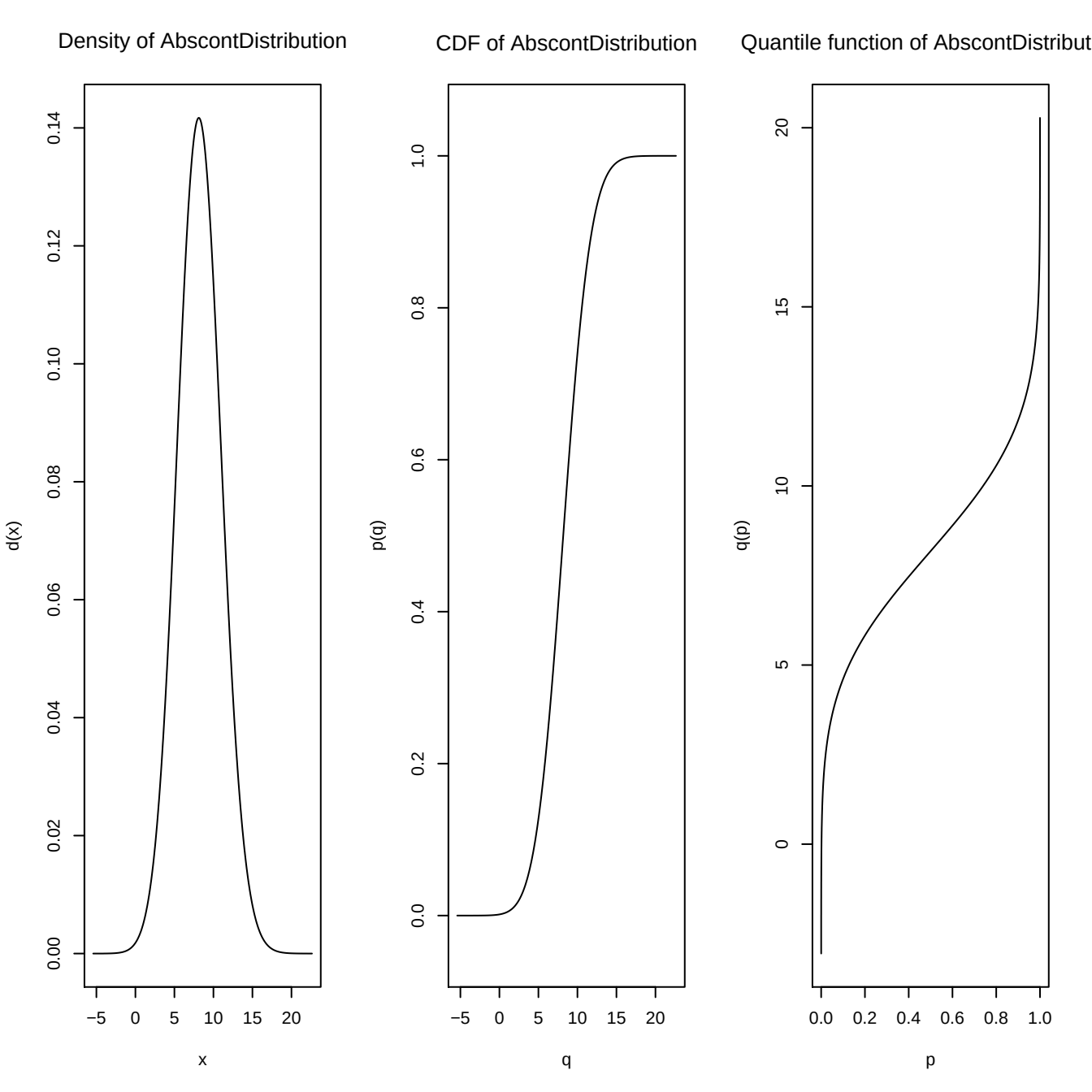
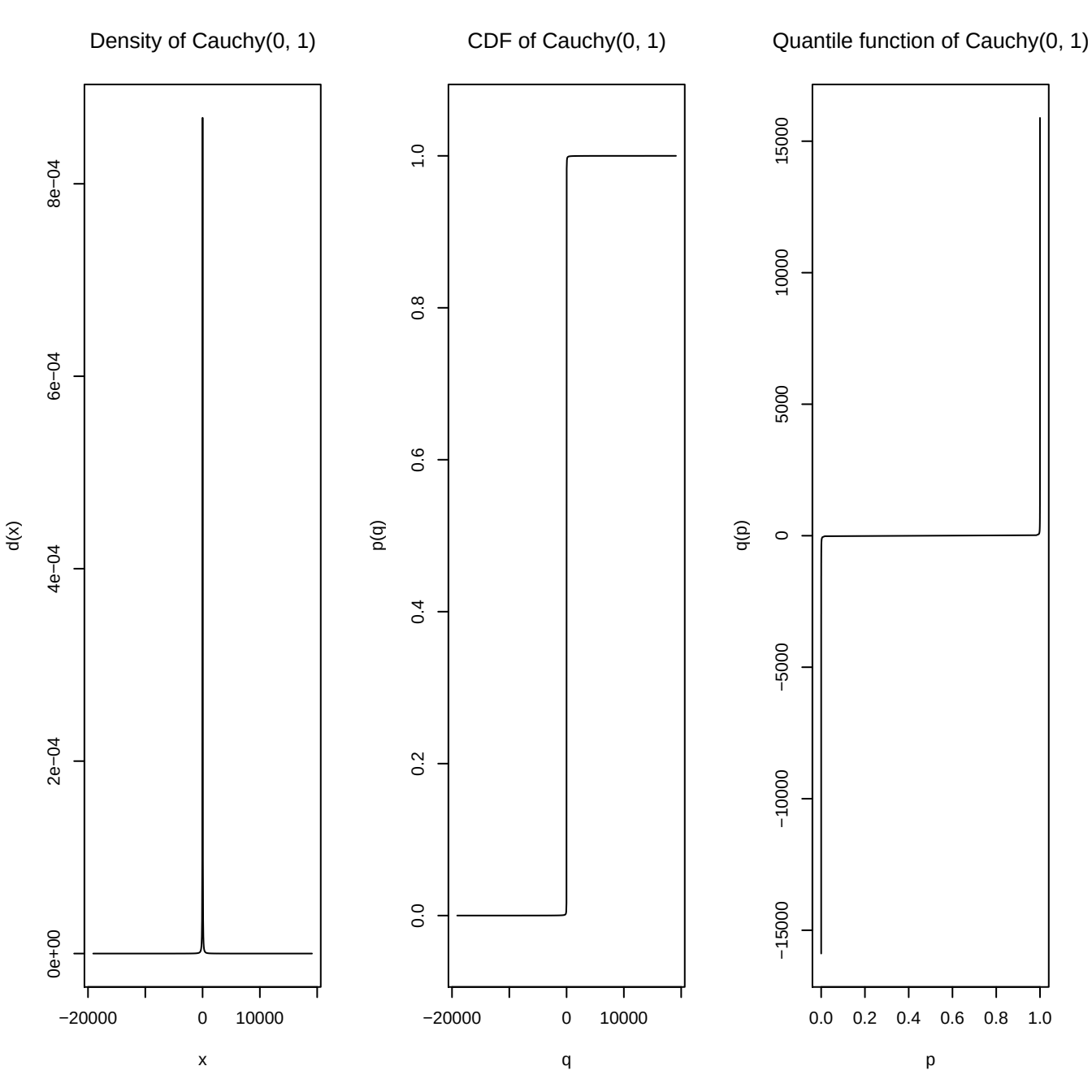
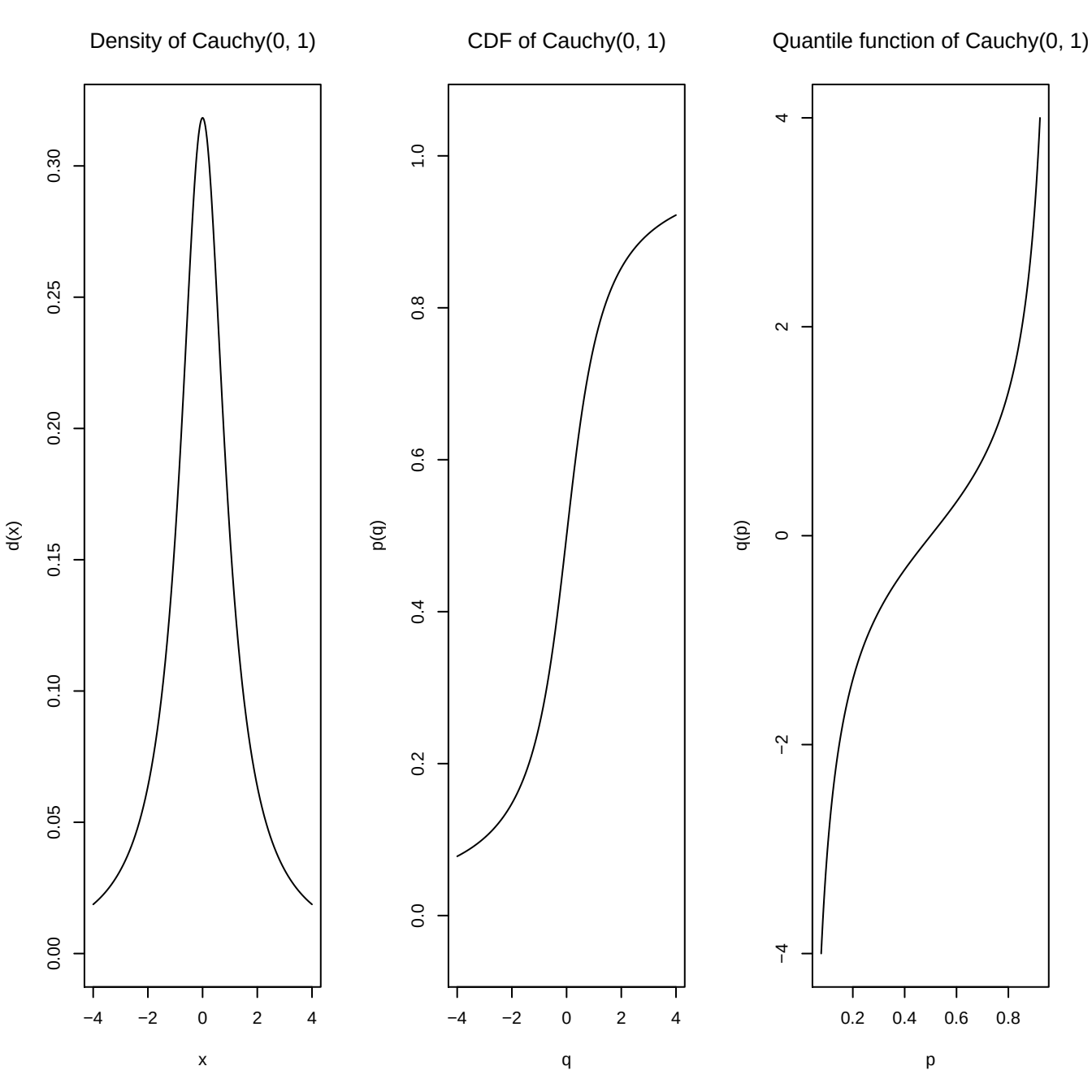
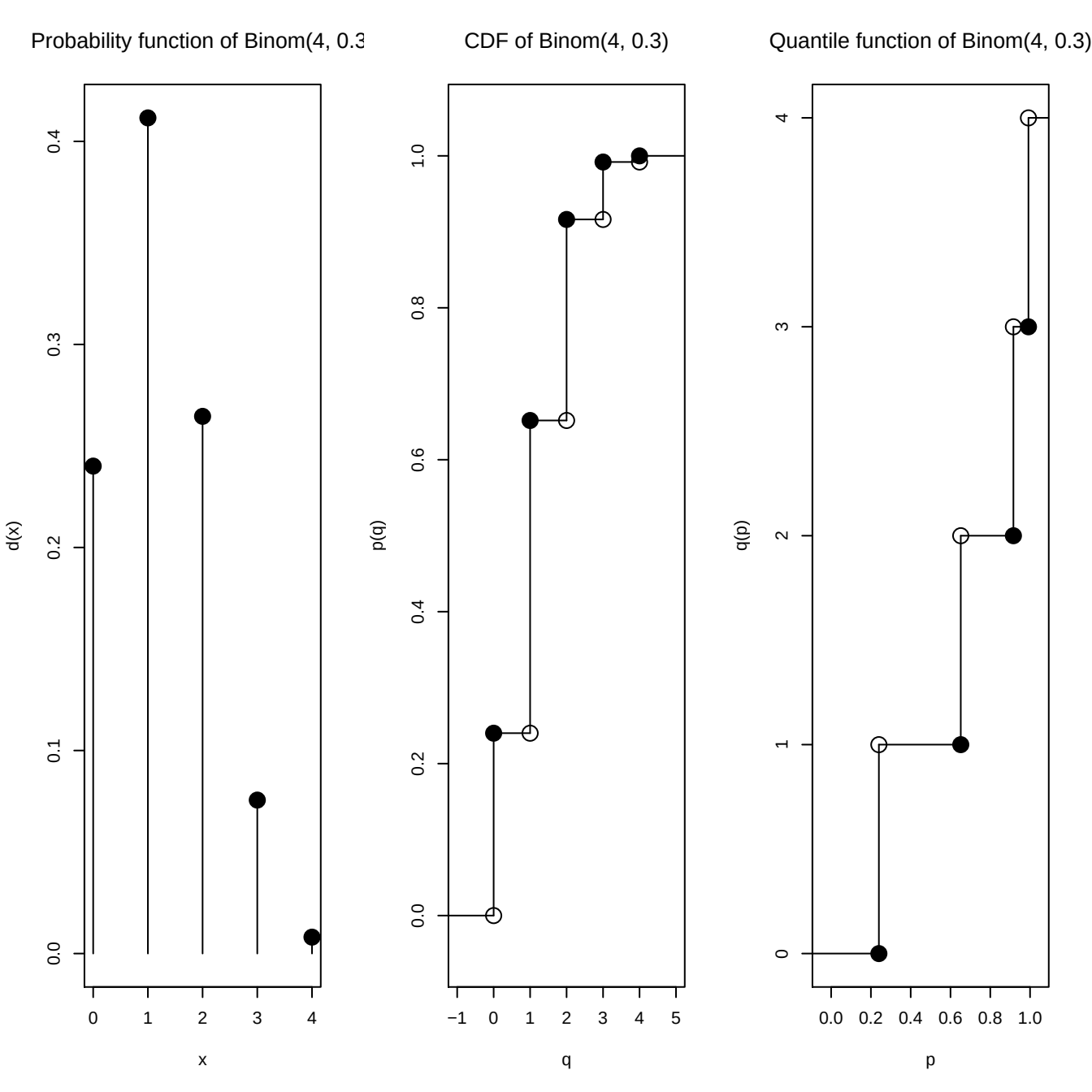
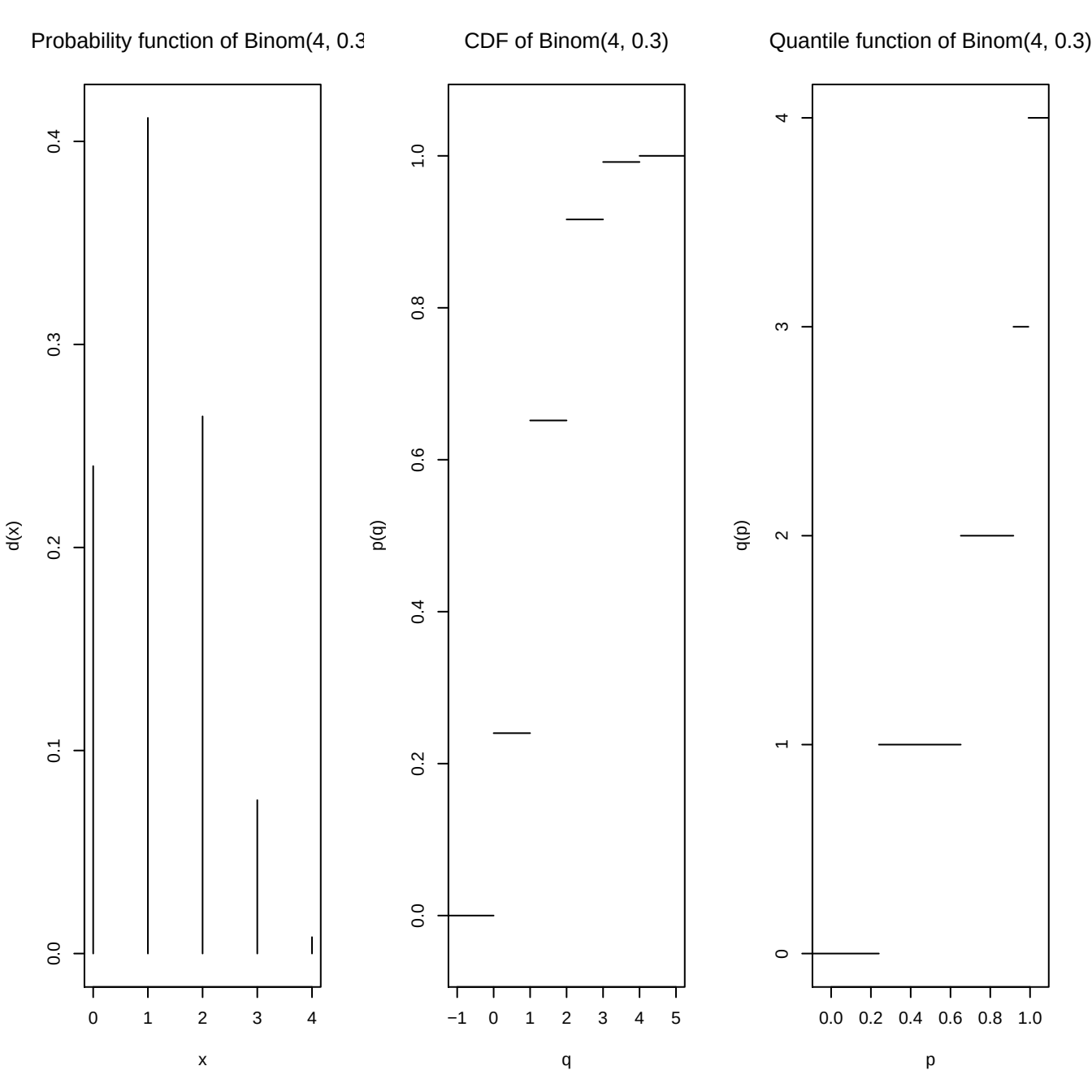
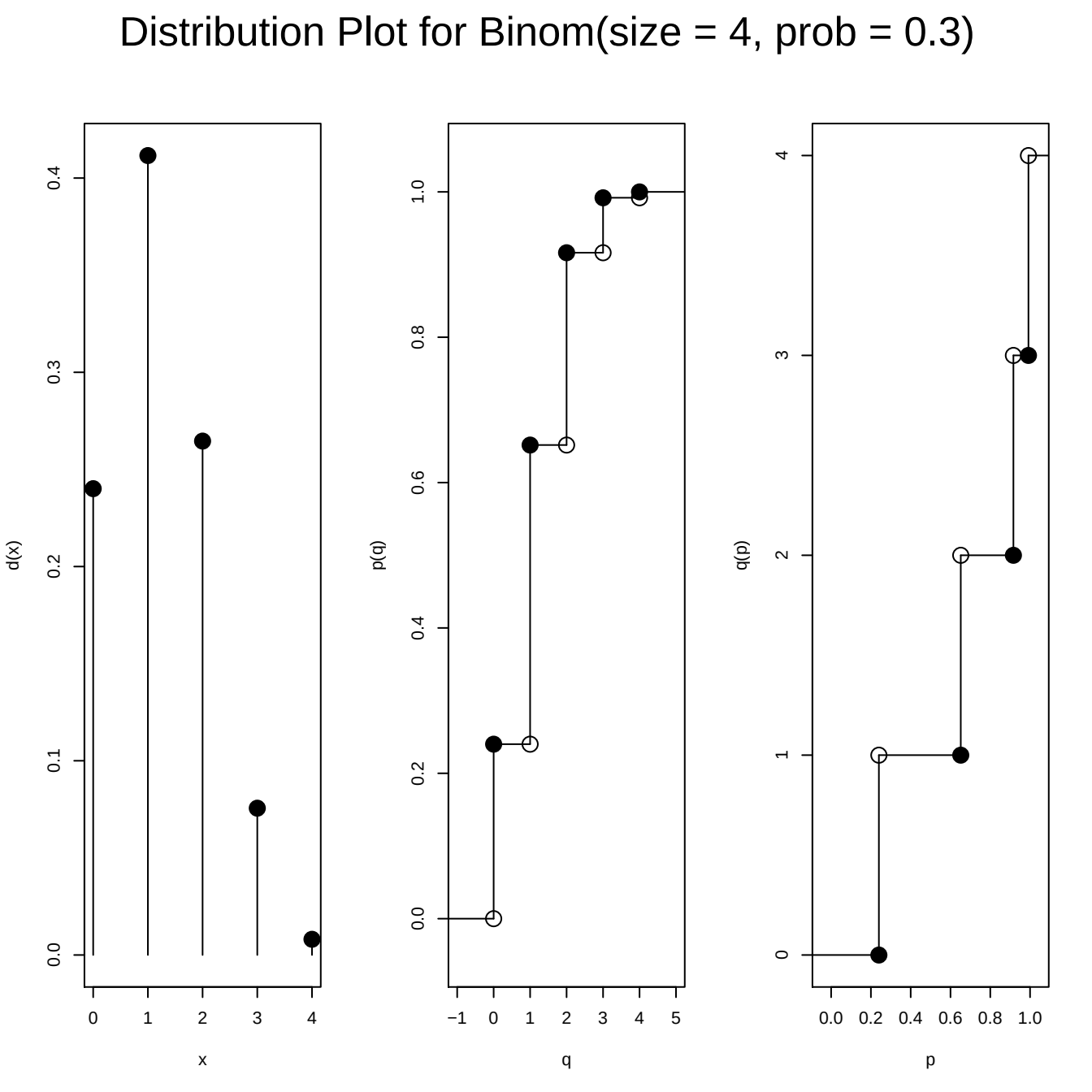

Density of AbscontDistribution
d(x)
0.00
0.02
0.04
0.06
0.08
0.10
0.12
0.14
−5
0
5
10
15
20
x
CDF of AbscontDistribution
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−5
0
5
10
15
20
q
Quantile function of AbscontDistribut
q(p)
0
5
10
15
20
0.0
0.2
0.4
0.6
0.8
1.0
p

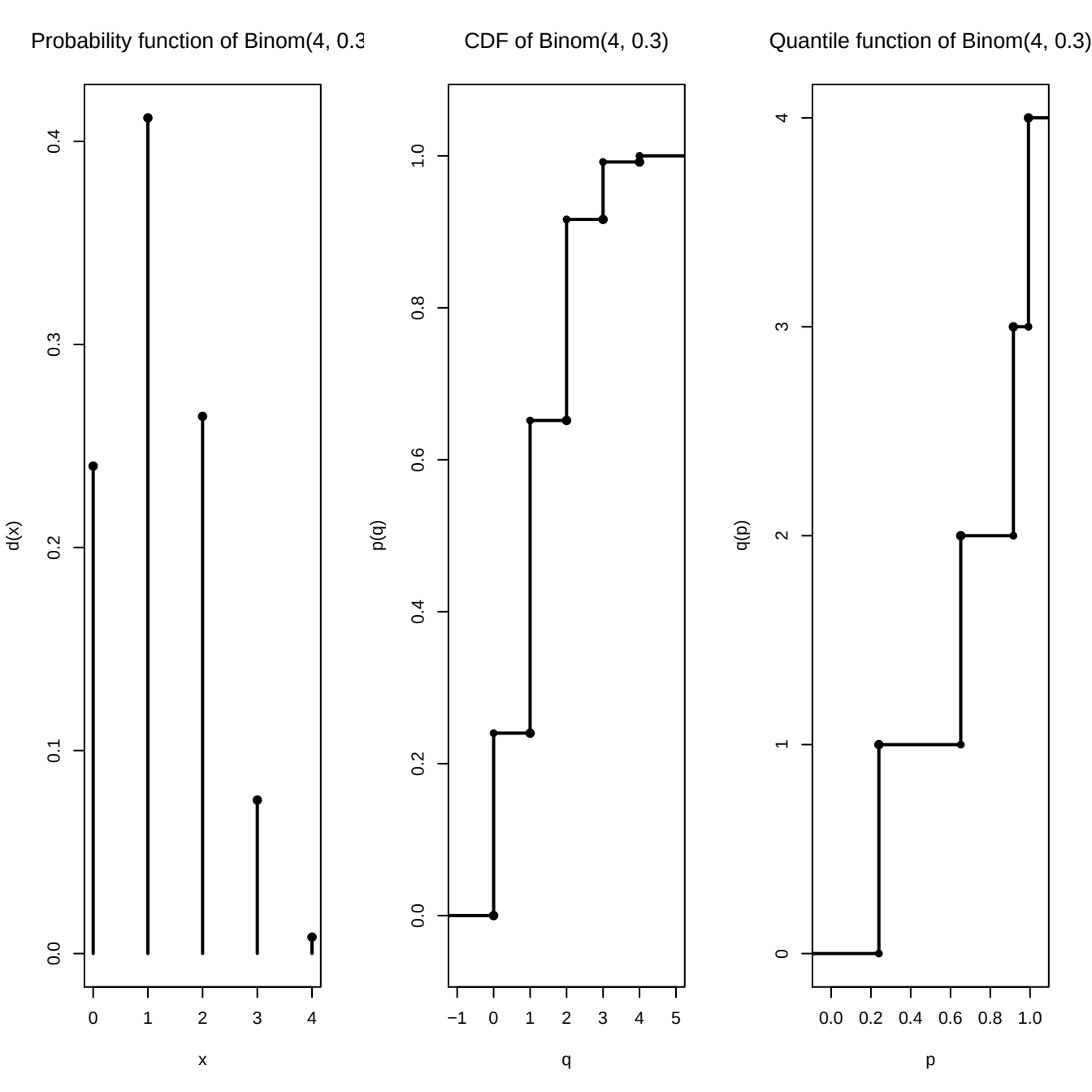

Density of Cauchy(0, 1)
d(x)
0e+00
2e−04
4e−04
6e−04
8e−04
−20000
0
10000
x
CDF of Cauchy(0, 1)
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−20000
0
10000
q
Quantile function of Cauchy(0, 1)
q(p)
15000
10000
5000
0
−5000
−10000
−15000
0.0
0.2
0.4
0.6
0.8
1.0
p


Density of Cauchy(0, 1)
d(x)
0.00
0.05
0.10
0.15
0.20
0.25
0.30
−4
−2
0
2
4
x
CDF of Cauchy(0, 1)
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−4
−2
0
2
4
q
Quantile function of Cauchy(0, 1)
q(p)
−4
−2
0
2
4
0.2
0.4
0.6
0.8
p

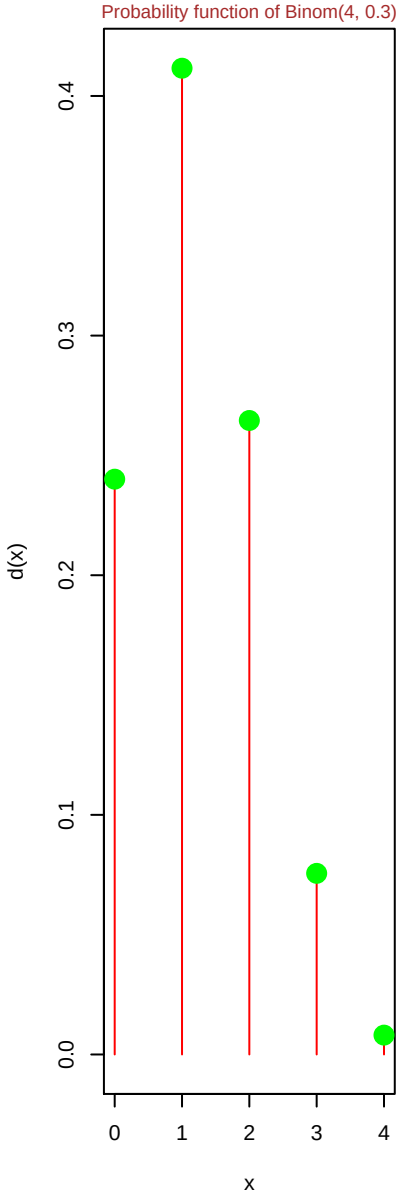

Probability function of Binom(4, 0.3
d(x)
0.0
0.1
0.2
0.3
0.4
0
1
2
3
4
x
CDF of Binom(4, 0.3)
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−1
0
1
2
3
4
5
q
Quantile function of Binom(4, 0.3)
q(p)
0
1
2
3
4
0.0
0.2
0.4
0.6
0.8
1.0
p

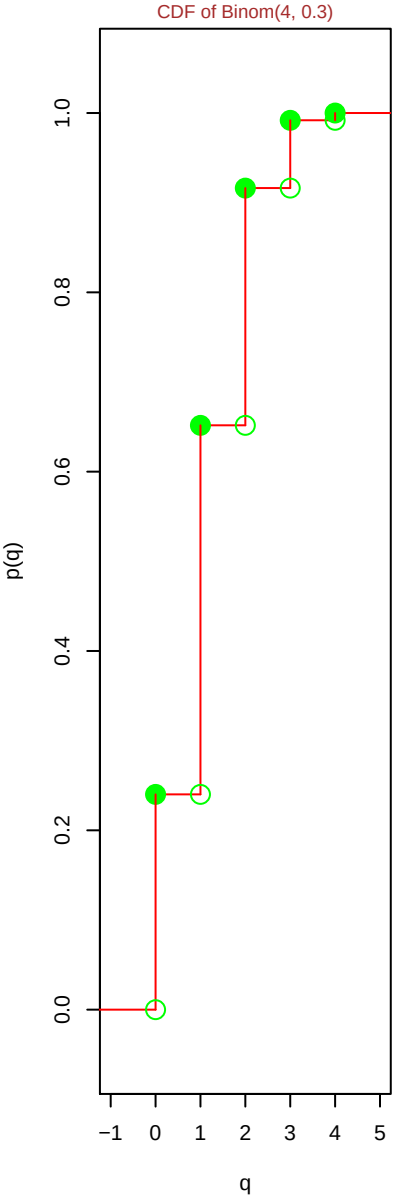

Probability function of Binom(4, 0.3
d(x)
0.0
0.1
0.2
0.3
0.4
0
1
2
3
4
x
CDF of Binom(4, 0.3)
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−1
0
1
2
3
4
5
q
Quantile function of Binom(4, 0.3)
q(p)
0
1
2
3
4
0.0
0.2
0.4
0.6
0.8
1.0
p

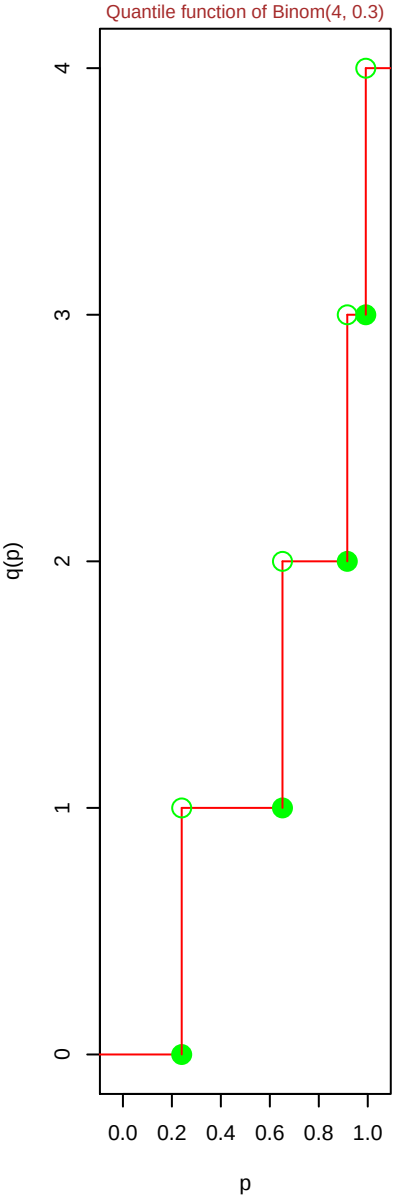

Distribution Plot for Binom(size = 4, prob = 0.3)
d(x)
0.0
0.1
0.2
0.3
0.4
0
1
2
3
4
x
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−1
0
1
2
3
4
5
q
q(p)
0
1
2
3
4
0.0
0.2
0.4
0.6
0.8
1.0
p


Probability function of Binom(4, 0.3
d(x)
0.0
0.1
0.2
0.3
0.4
0
1
2
3
4
x
CDF of Binom(4, 0.3)
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−1
0
1
2
3
4
5
q
Quantile function of Binom(4, 0.3)
q(p)
0
1
2
3
4
0.0
0.2
0.4
0.6
0.8
1.0
p

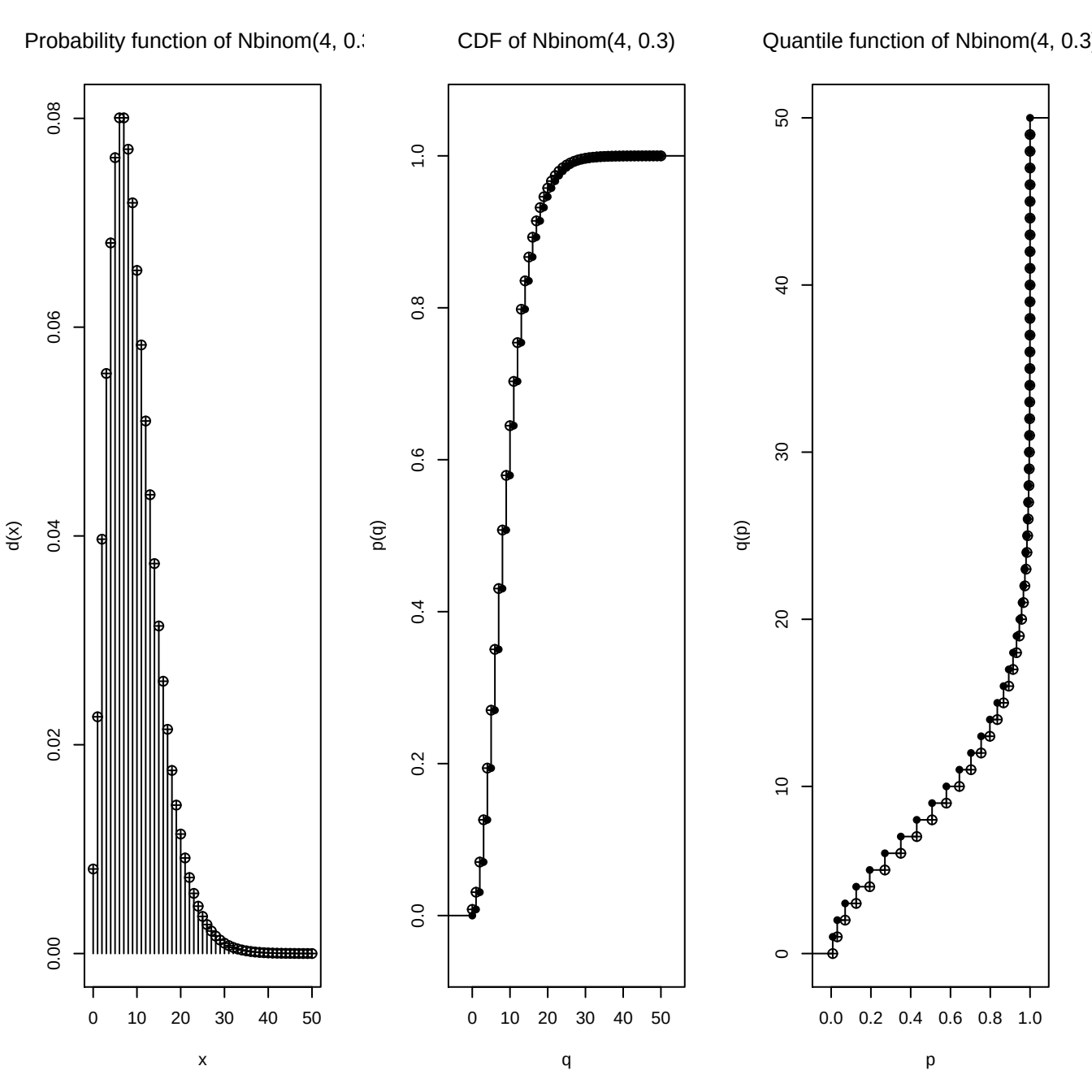
Distribution Plot for B

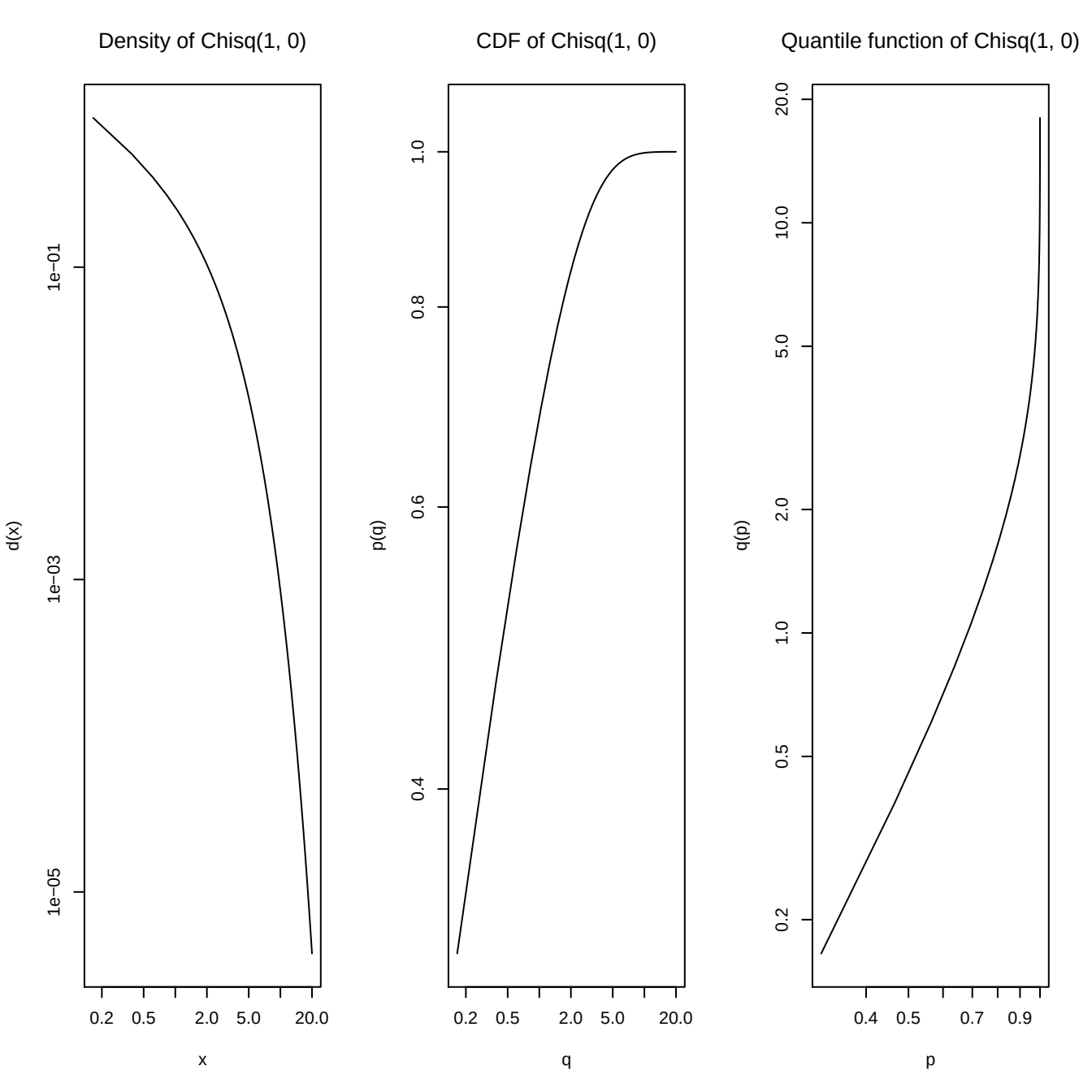


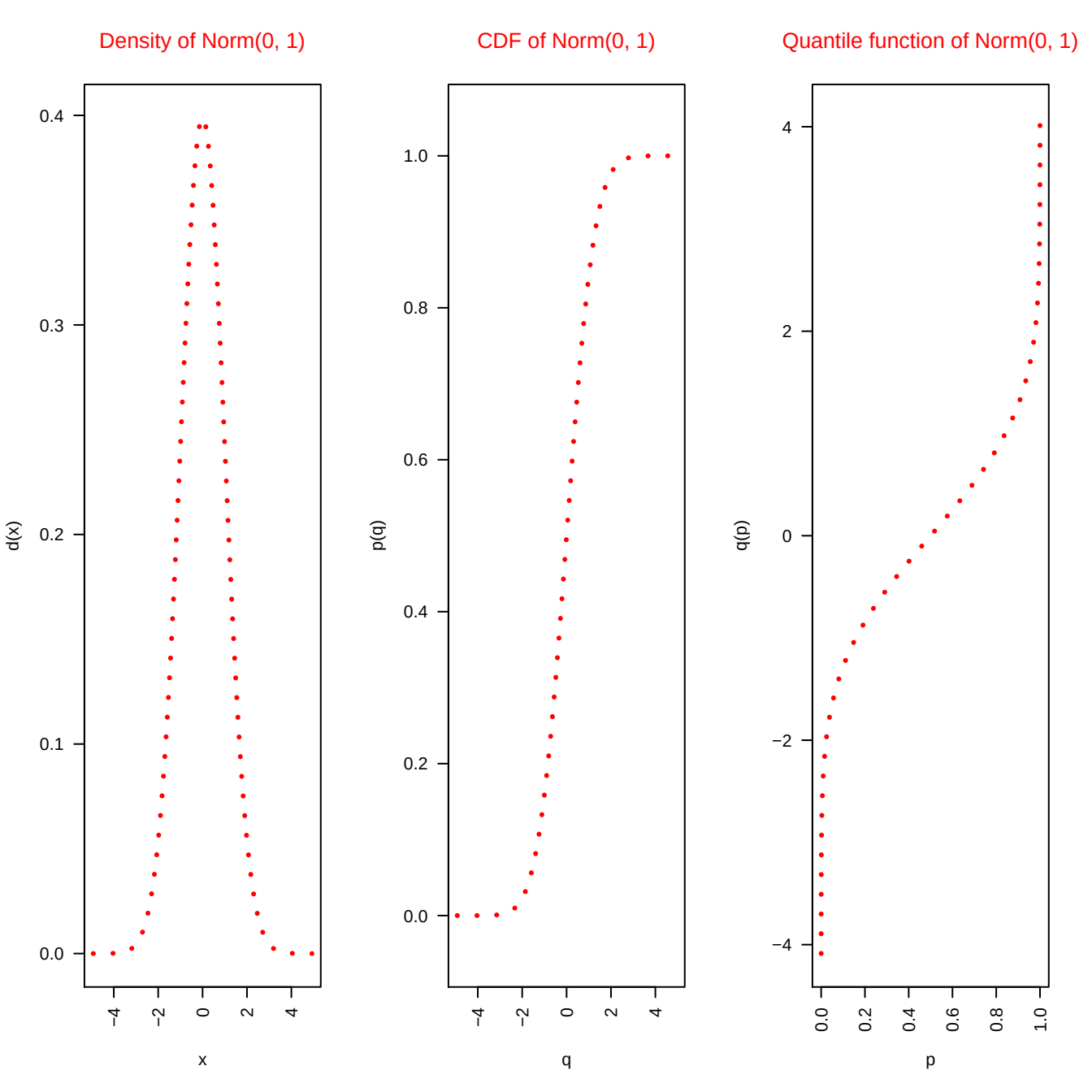




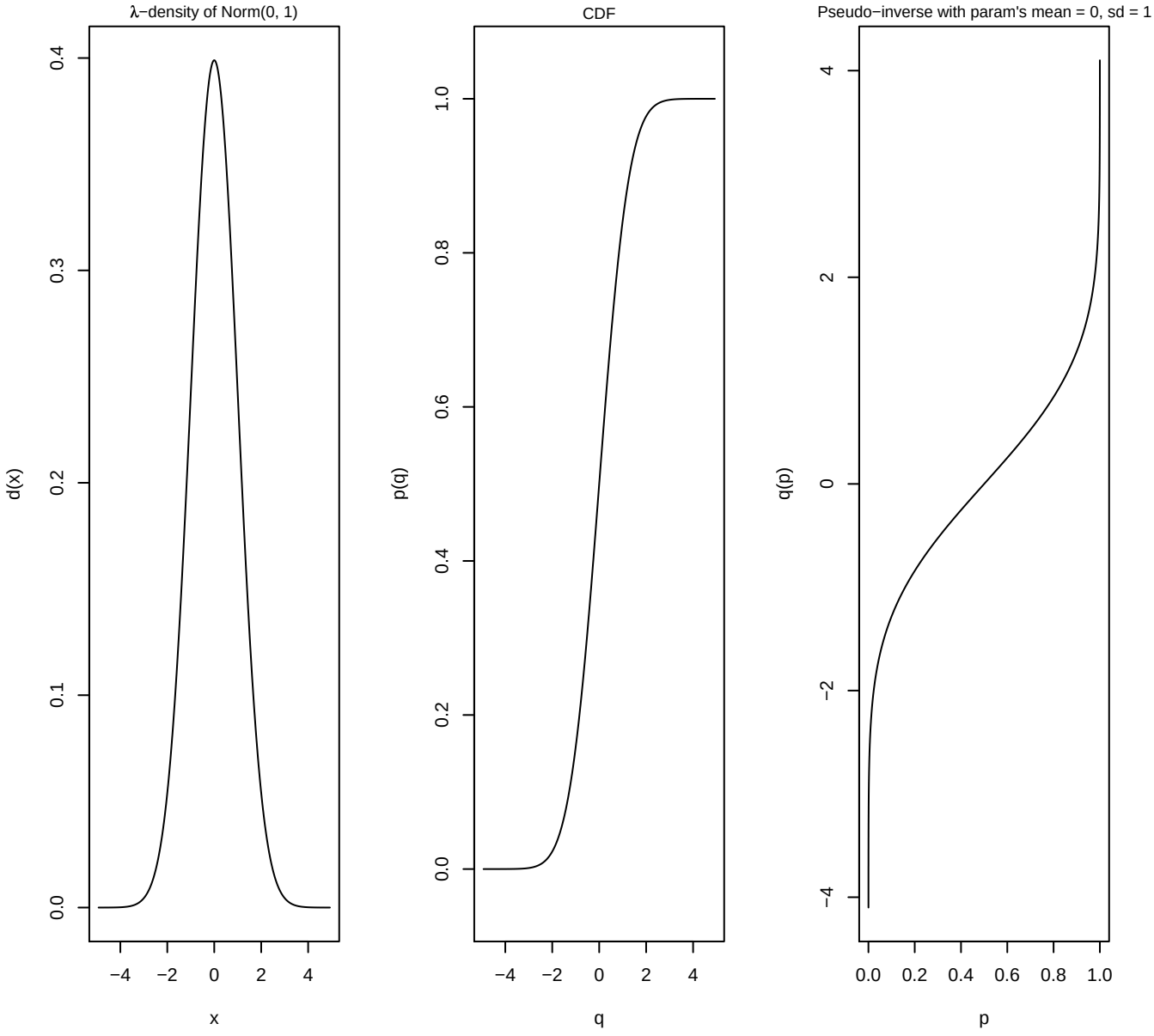
generated Wed Feb 27 18:58:26 2008


Probability function of Nbinom(4, 0.3
d(x)
0.00
0.02
0.04
0.06
0.08
0
10
20
30
40
50
x
CDF of Nbinom(4, 0.3)
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
0
10
20
30
40
50
q
Quantile function of Nbinom(4, 0.3
q(p)
0
10
20
30
40
50
0.0
0.2
0.4
0.6
0.8
1.0
p

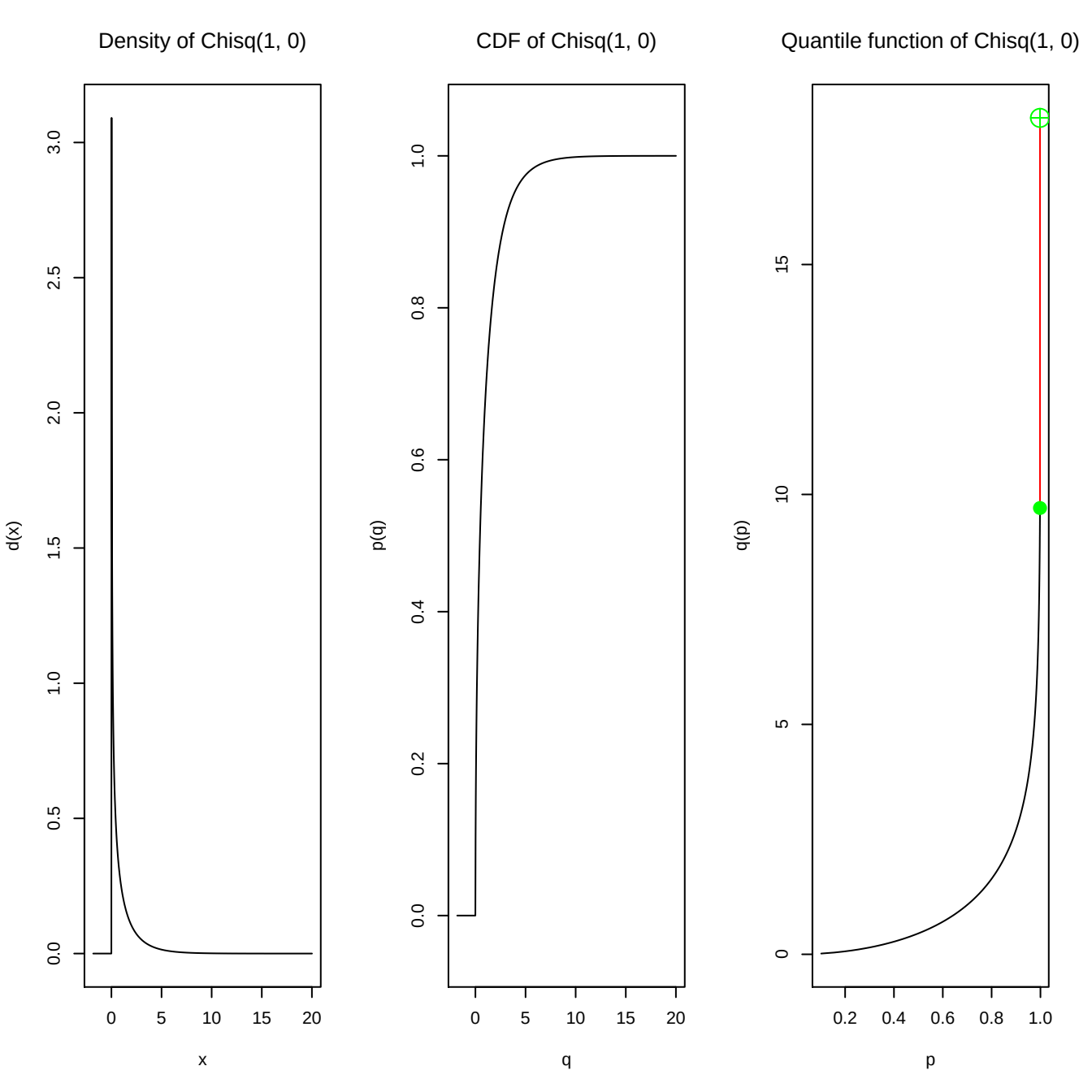

Density of Chisq(1, 0)
d(x)
1e−01
1e−03
1e−05
0.2
0.5
2.0
5.0
20.0
x
CDF of Chisq(1, 0)
p(q)
0.4
0.6
0.8
1.0
0.2
0.5
2.0
5.0
20.0
q
Quantile function of Chisq(1, 0)
q(p)
0.2
0.5
1.0
2.0
5.0
10.0
20.0
0.4
0.5
0.7
0.9
p

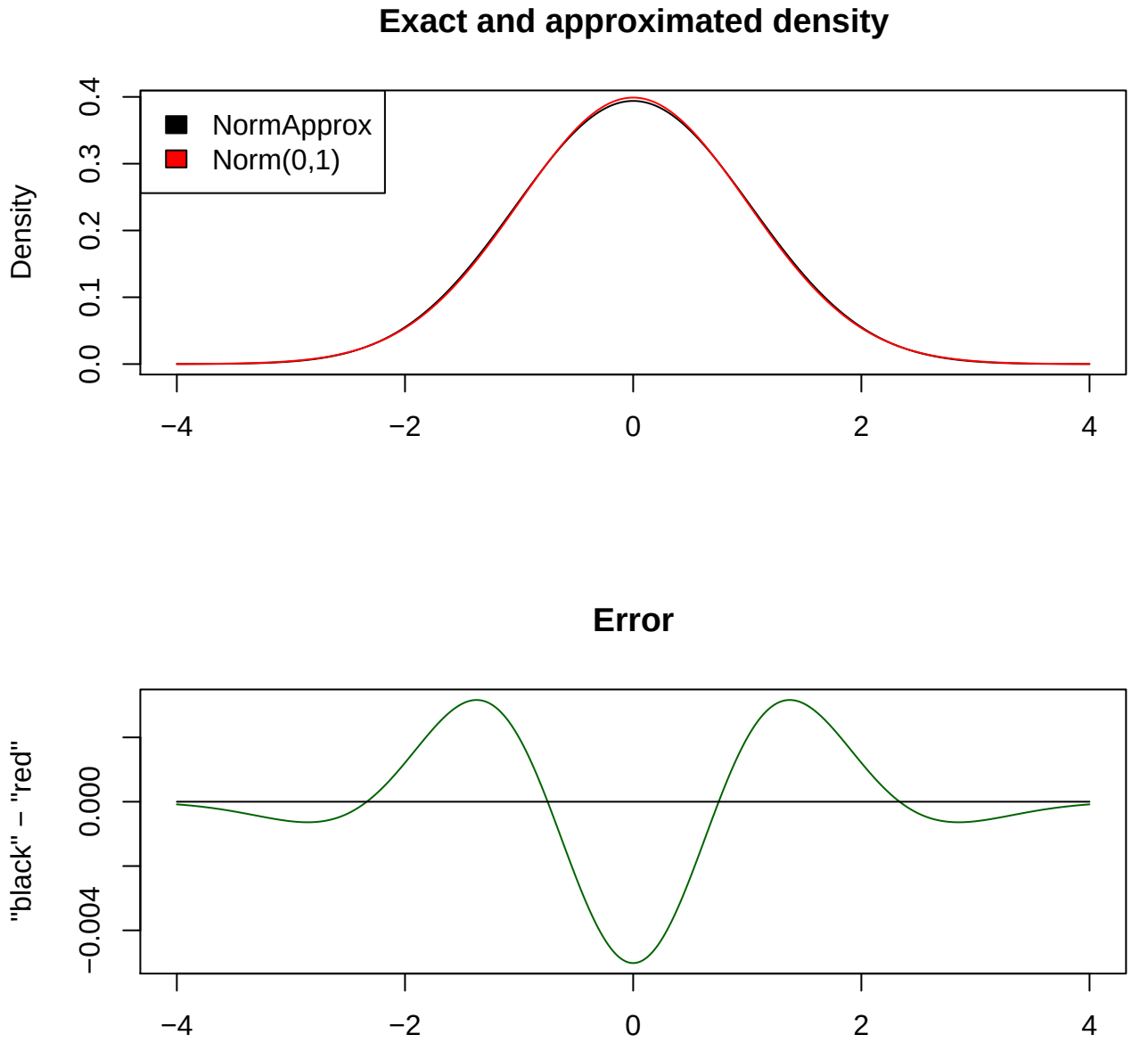

Density of Norm(0, 1)
d(x)
0.0
0.1
0.2
0.3
0.4
−4
−2
0
2
4
x
CDF of Norm(0, 1)
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−4
−2
0
2
4
q
Quantile function of Norm(0, 1)
q(p)
−4
−2
0
2
4
0.0
0.2
0.4
0.6
0.8
1.0
p

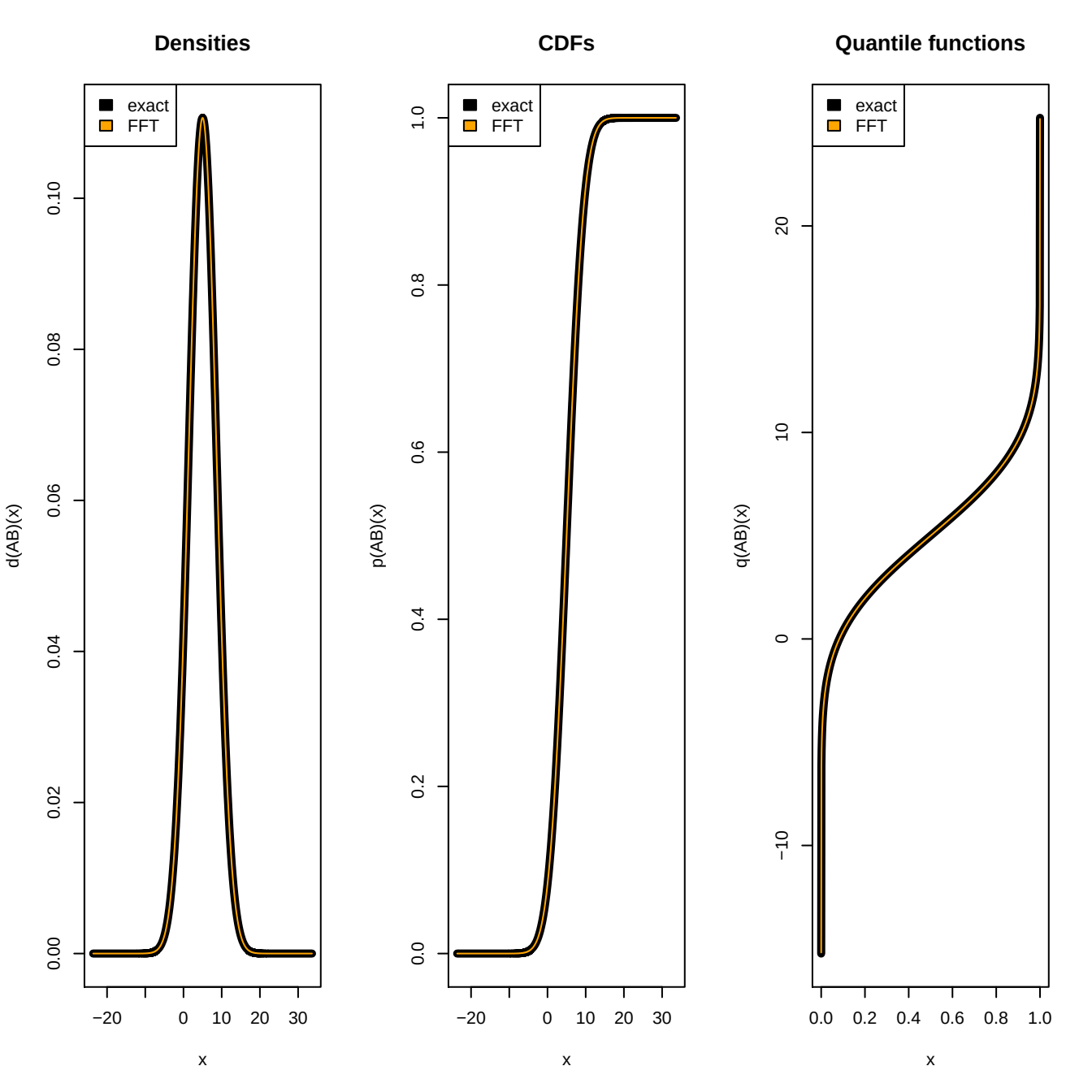
my Distribution: Norm()

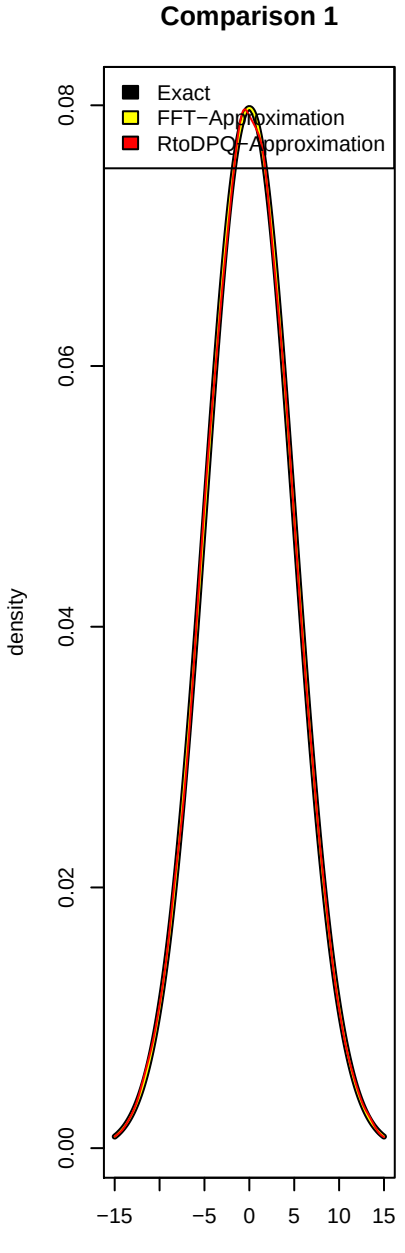


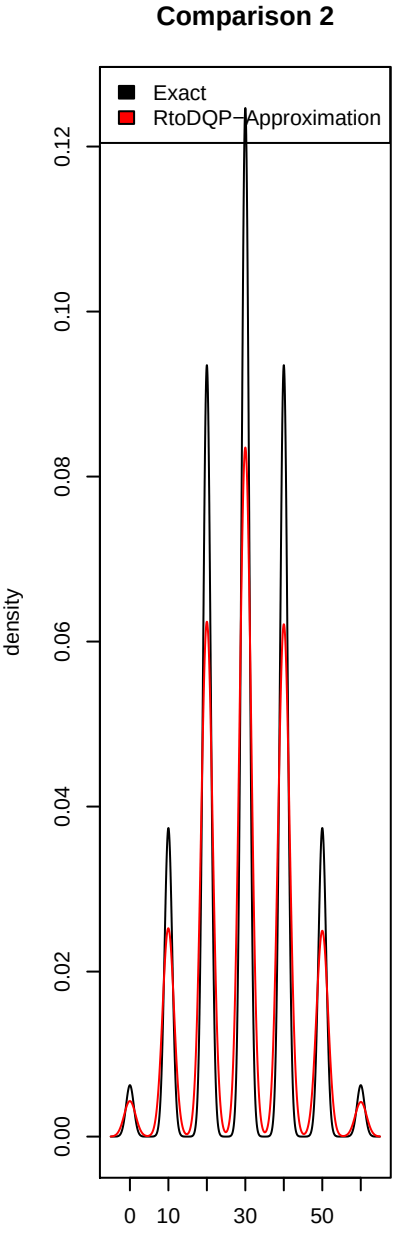
this plot was correctly generated on Wed Feb 27 18:58:27 2008

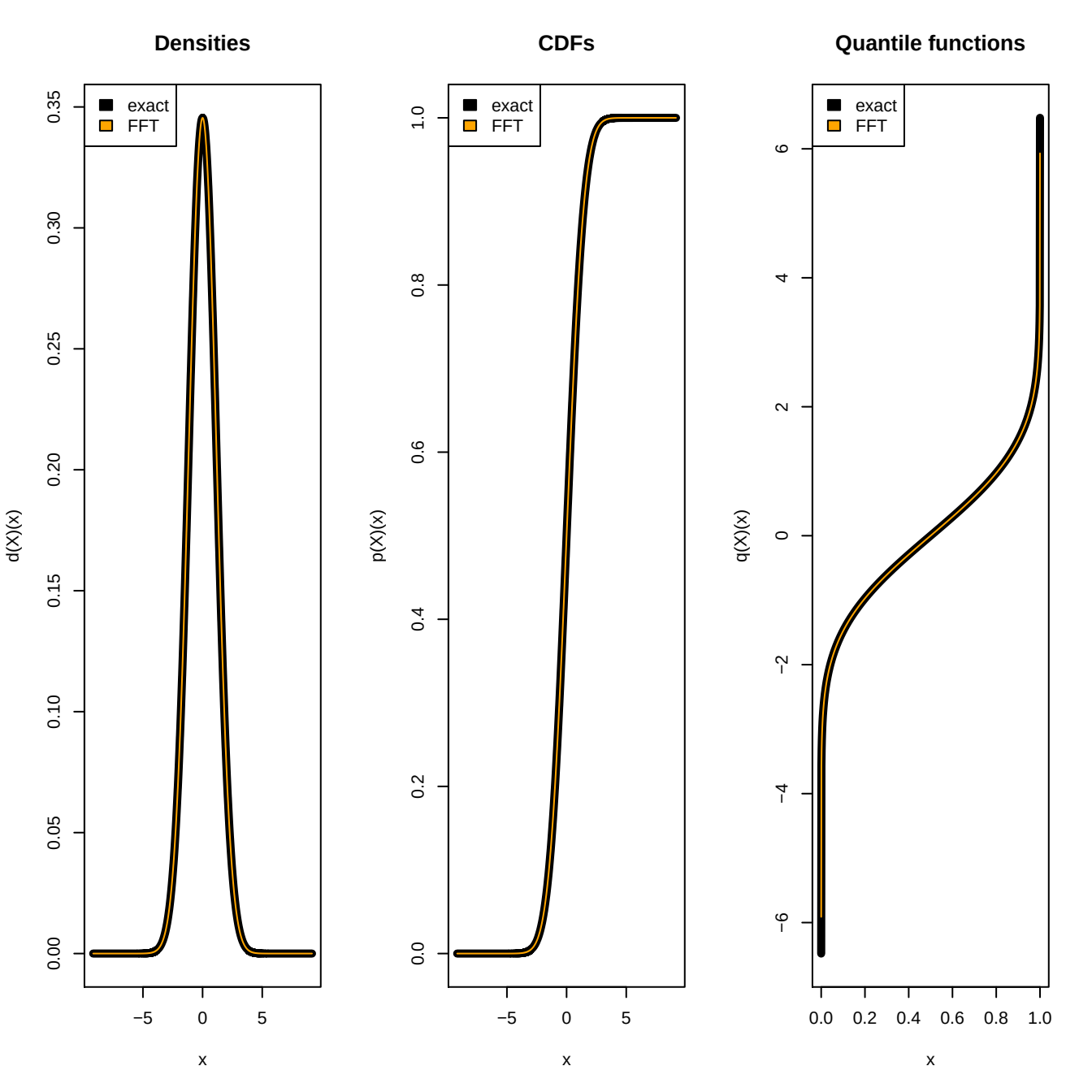

Density of Chisq(1, 0)
d(x)
0.0
0.5
1.0
1.5
2.0
2.5
3.0
0
5
10
15
20
x
CDF of Chisq(1, 0)
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
0
5
10
15
20
q
Quantile function of Chisq(1, 0)
q(p)
0
5
10
15
0.2
0.4
0.6
0.8
1.0
p

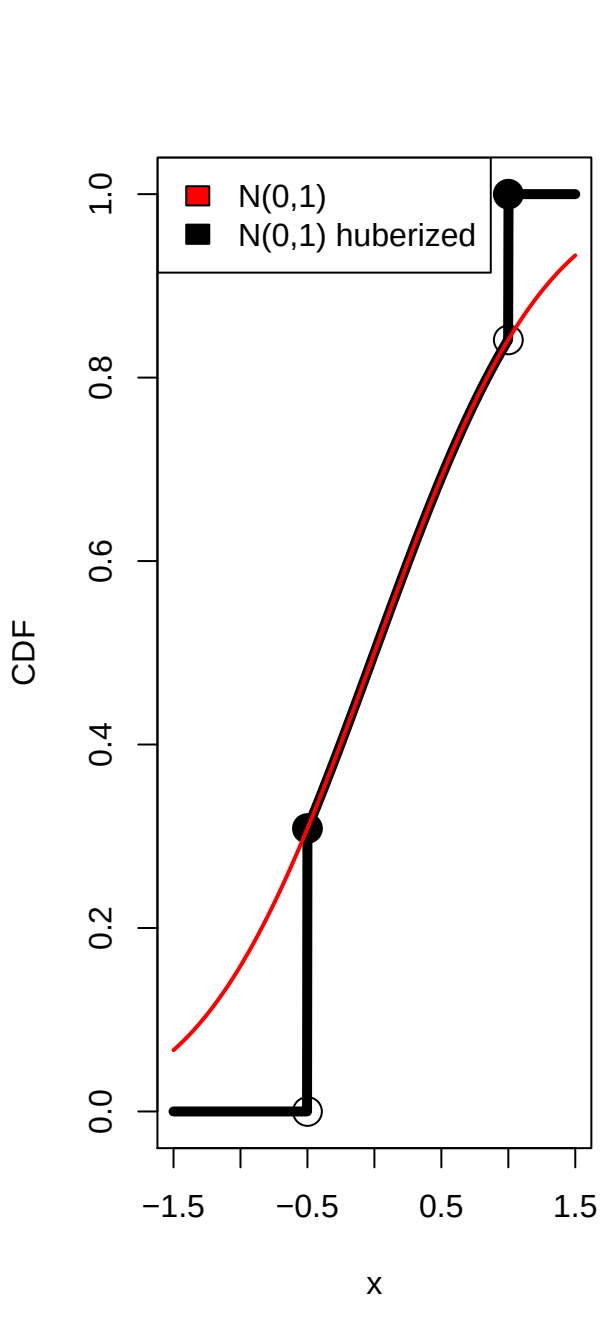

Exact and approximated density
NormApprox
Norm(0,1)
Density
0.0
0.1
0.2
0.3
0.4
−4
−2
0
2
4
Error
"black" − "red"
−0.004
0.000
−4
−2
0
2
4

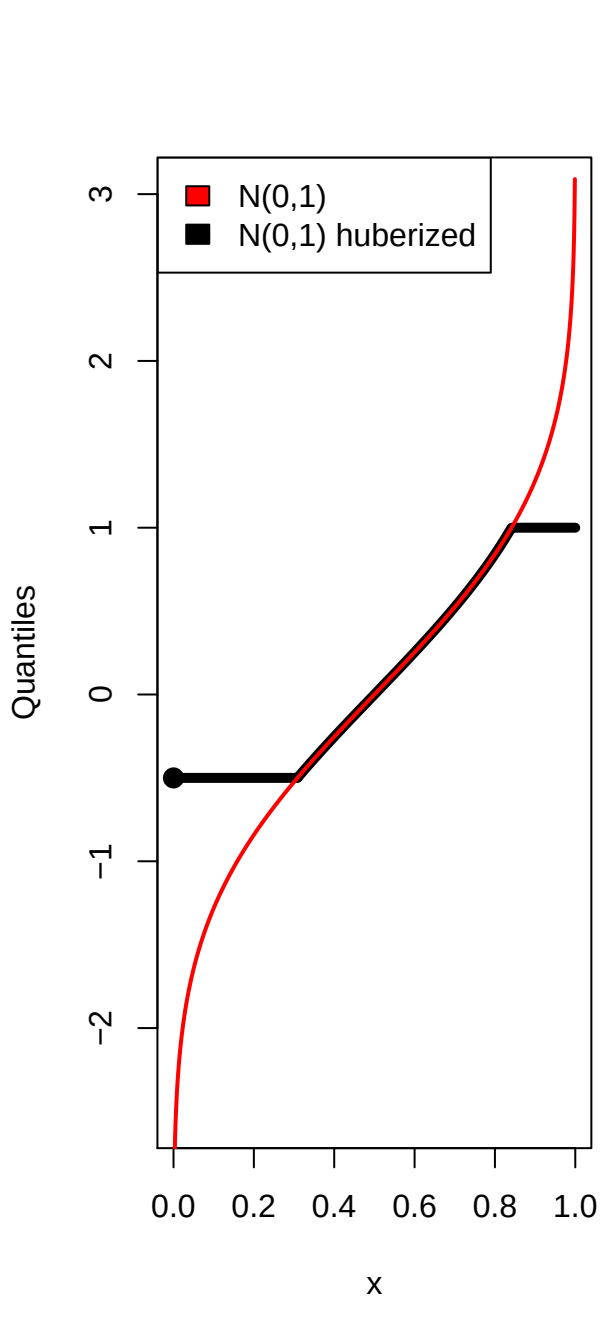

Densities
exact
FFT
d(AB)(x)
0.00
0.02
0.04
0.06
0.08
0.10
−20
0
10
20
30
x
CDFs
exact
FFT
p(AB)(x)
0.0
0.2
0.4
0.6
0.8
1.0
−20
0
10
20
30
x
Quantile functions
exact
FFT
q(AB)(x)
−10
0
10
20
0.0
0.2
0.4
0.6
0.8
1.0
x

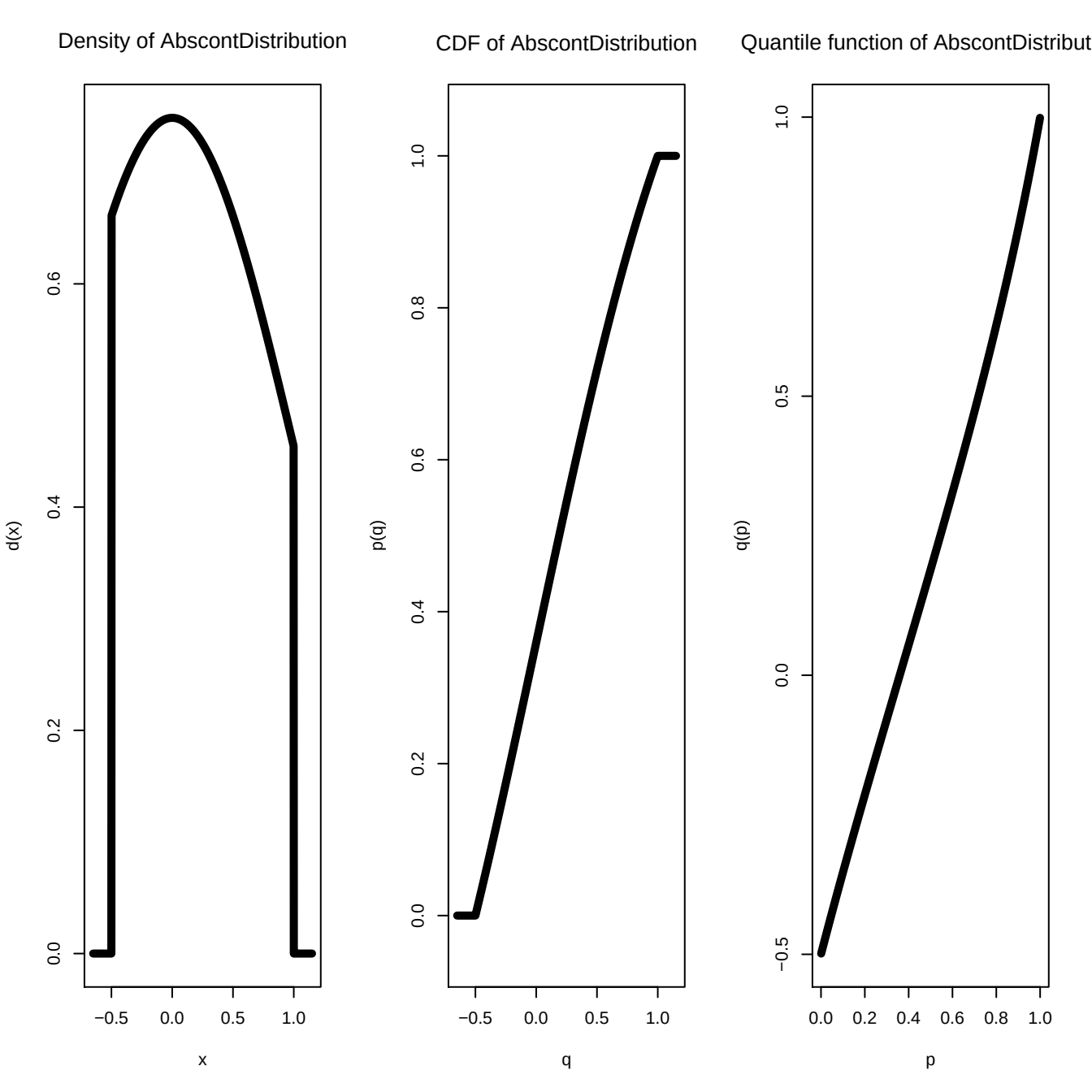

Comparison 1
Exact
FFT−Approximation
RtoDPQ−Approximation
density
0.00
0.02
0.04
0.06
0.08
−15
−5
0
5
10
15

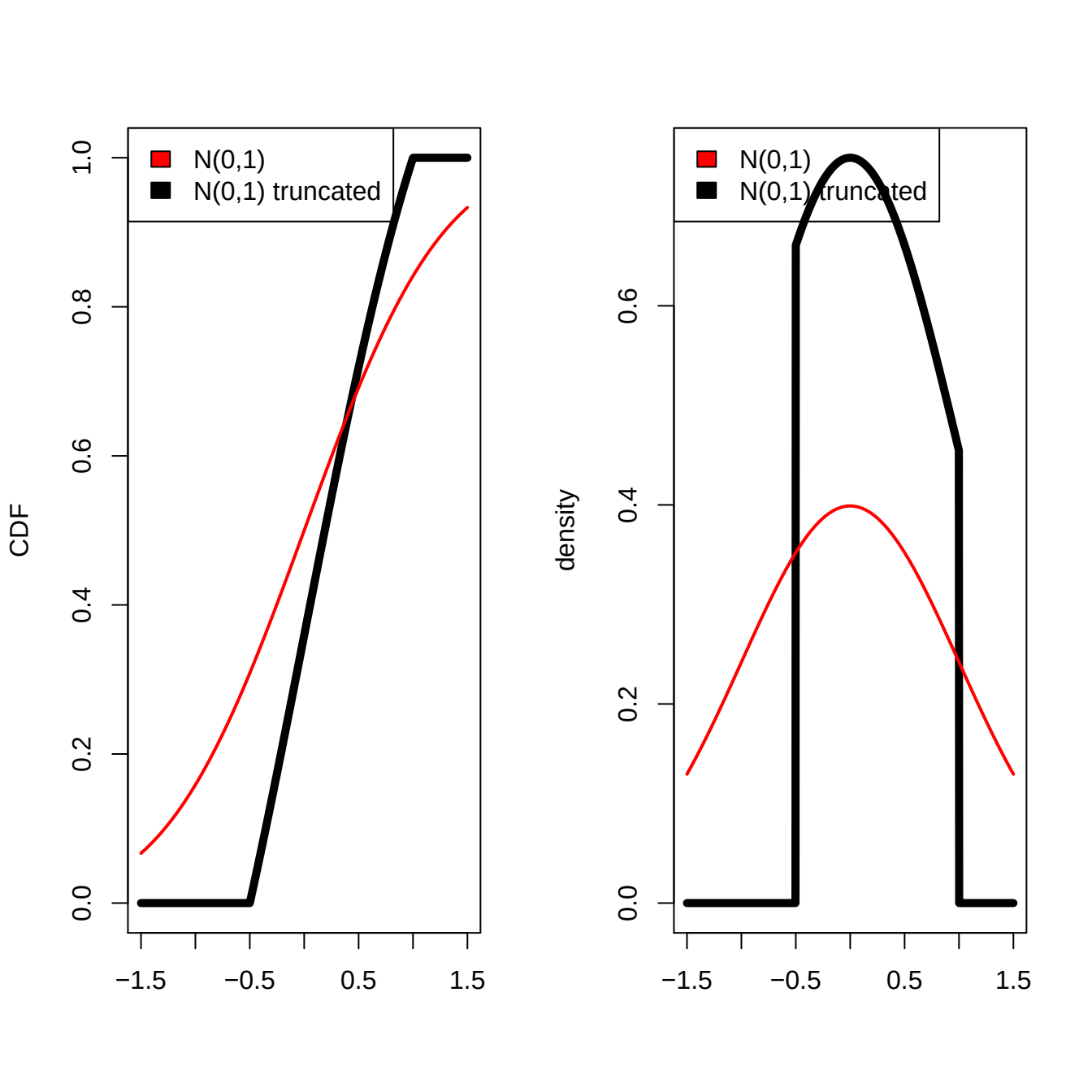

Comparison 2
Exact
RtoDQP−Approximation
density
0.00
0.02
0.04
0.06
0.08
0.10
0.12
0
10
30
50

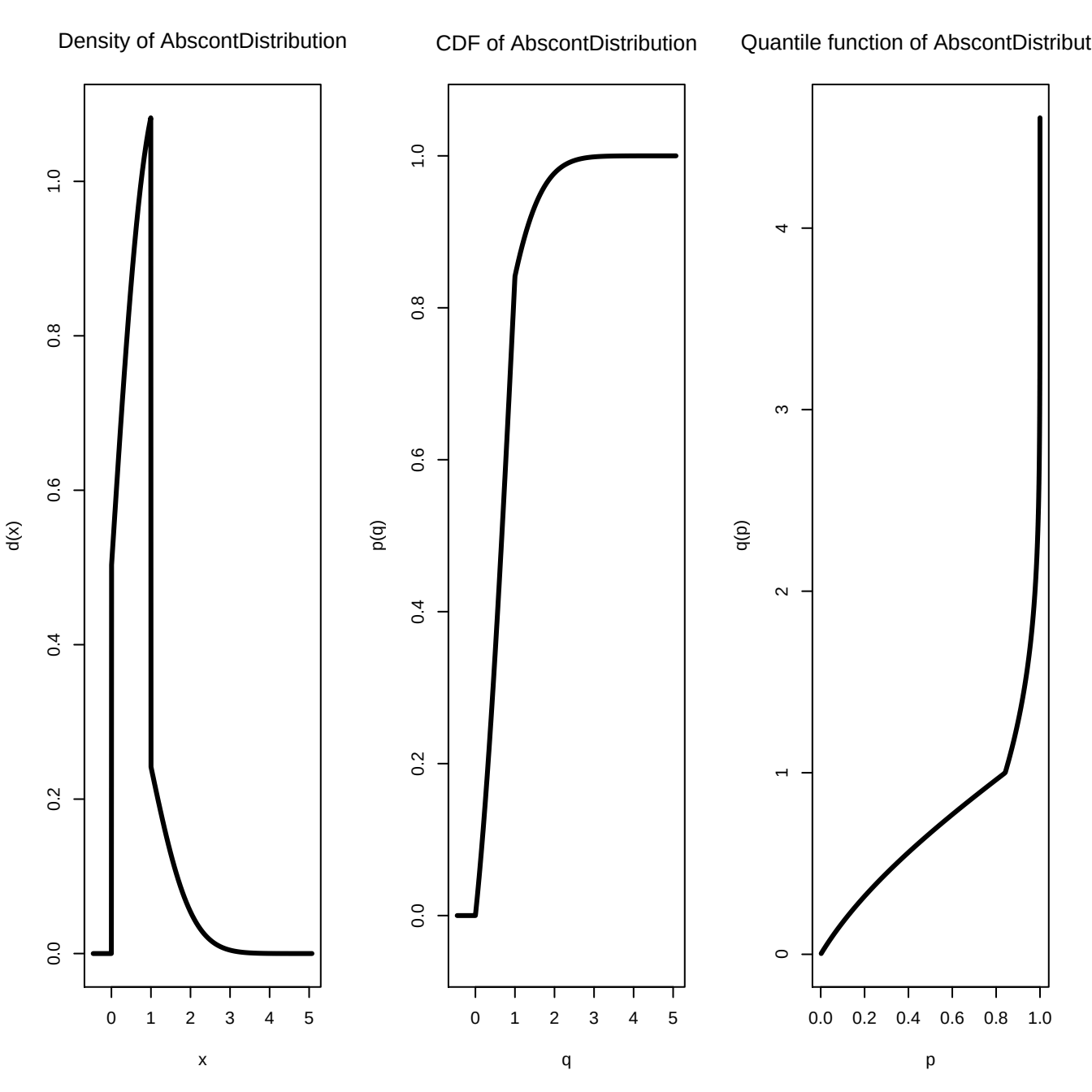

Densities
exact
FFT
d(X)(x)
0.00
0.05
0.10
0.15
0.20
0.25
0.30
0.35
−5
0
5
x
CDFs
exact
FFT
p(X)(x)
0.0
0.2
0.4
0.6
0.8
1.0
−5
0
5
x
Quantile functions
exact
FFT
q(X)(x)
−6
−4
−2
0
2
4
6
0.0
0.2
0.4
0.6
0.8
1.0
x

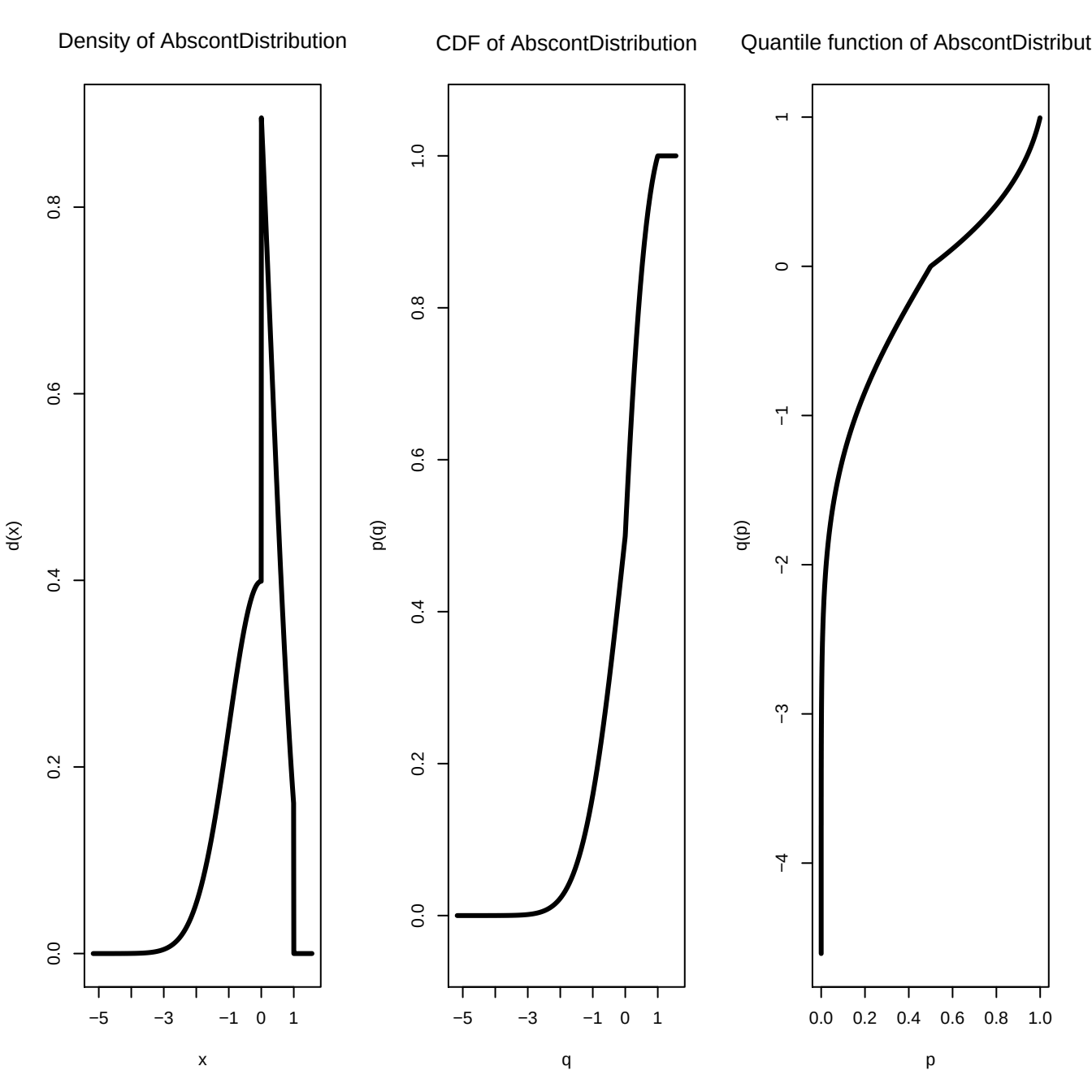

N(0,1)
N(0,1) huberized
CDF
0.0
0.2
0.4
0.6
0.8
1.0
−1.5
−0.5
0.5
1.5
x

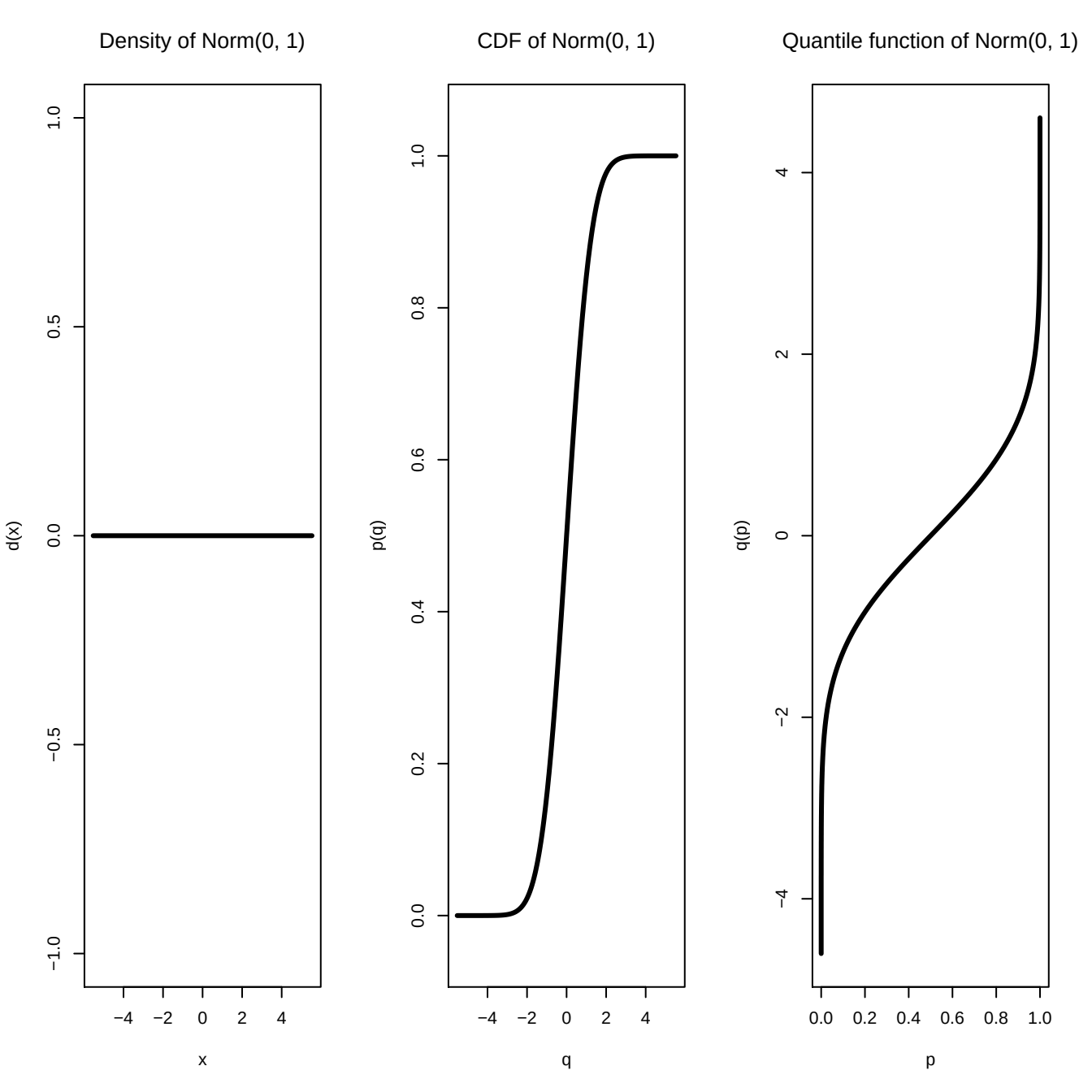

N(0,1)
N(0,1) huberized
Quantiles
−2
−1
0
1
2
3
0.0
0.2
0.4
0.6
0.8
1.0
x

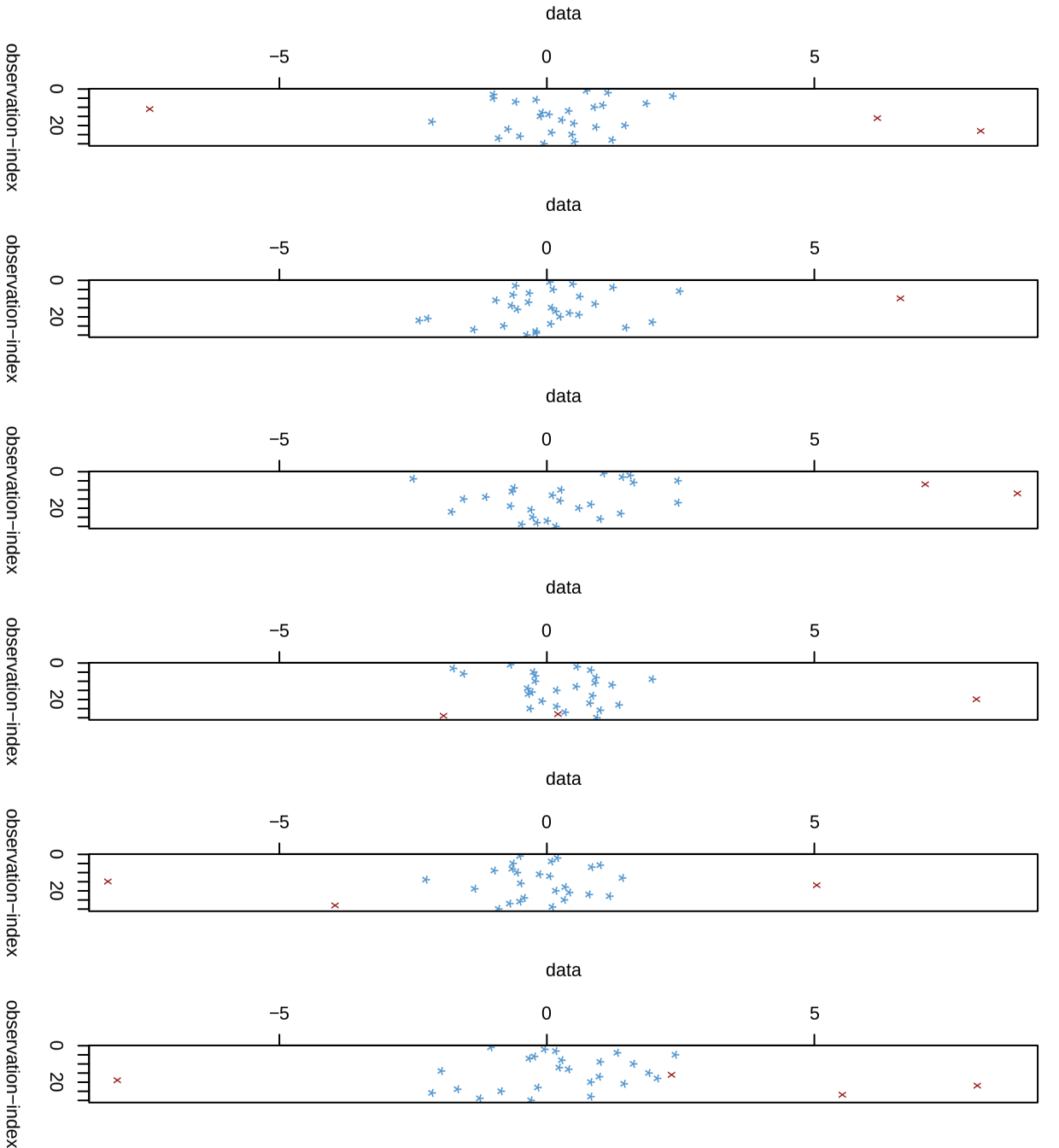

Density of AbscontDistribution
d(x)
0.0
0.2
0.4
0.6
−0.5
0.0
0.5
1.0
x
CDF of AbscontDistribution
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−0.5
0.0
0.5
1.0
q
Quantile function of AbscontDistribut
q(p)
−0.5
0.0
0.5
1.0
0.0
0.2
0.4
0.6
0.8
1.0
p

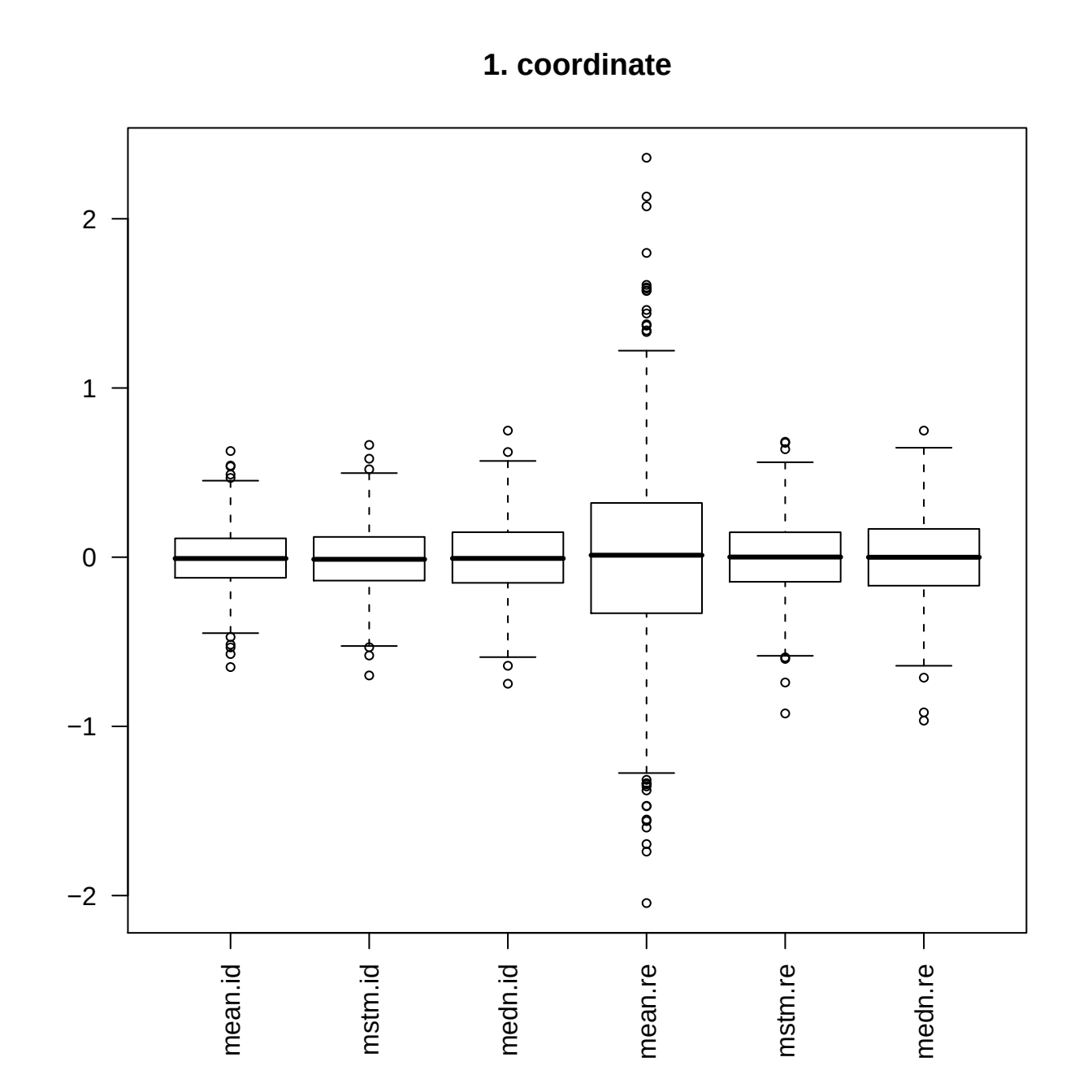

N(0,1)
N(0,1) truncated
CDF
0.0
0.2
0.4
0.6
0.8
1.0
−1.5
−0.5
0.5
1.5
N(0,1)
N(0,1) truncated
density
0.0
0.2
0.4
0.6
−1.5
−0.5
0.5
1.5

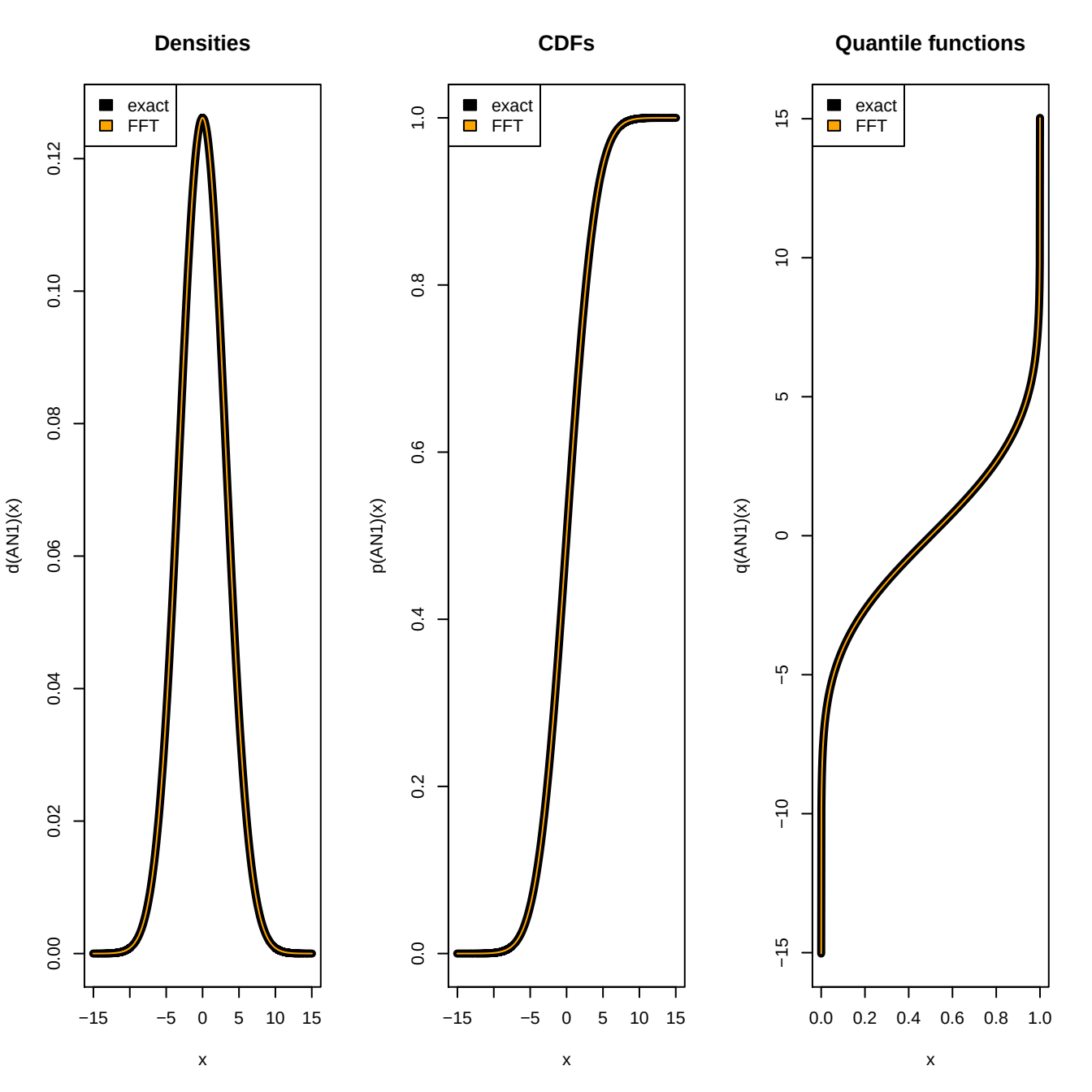

Density of AbscontDistribution
d(x)
0.0
0.2
0.4
0.6
0.8
1.0
0
1
2
3
4
5
x
CDF of AbscontDistribution
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
0
1
2
3
4
5
q
Quantile function of AbscontDistribut
q(p)
0
1
2
3
4
0.0
0.2
0.4
0.6
0.8
1.0
p


Density of AbscontDistribution
d(x)
0.0
0.2
0.4
0.6
0.8
−5
−3
−1
0
1
x
CDF of AbscontDistribution
p(q)
0.0
0.2
0.4
0.6
0.8
1.0
−5
−3
−1
0
1
q
Quantile function of AbscontDistribut
q(p)
−4
−3
−2
−1
0
1
0.0
0.2
0.4
0.6
0.8
1.0
p


Density of Norm(0, 1)
d(x)
1.0
0.5
0.0
−0.5
−1.0
−4
−2
0
2
4
x
CDF of Norm(0, 1)
p(q)
1.0
0.8
0.6
0.4
0.2
0.0
−4
−2
0
2
4
q
Quantile function of Norm(0, 1)
q(p)
4
2
0
−2
−4
0.0
0.2
0.4
0.6
0.8
1.0
p


data
observation−index
−5
0
5
0
20


1. coordinate
2
1
0
−1
−2
mean.id
mstm.id
medn.id
mean.re
mstm.re
medn.re


Densities
exact
FFT
d(AN1)(x)
0.00
0.02
0.04
0.06
0.08
0.10
0.12
−15
−5
0
5
10
15
x
CDFs
exact
FFT
p(AN1)(x)
0.0
0.2
0.4
0.6
0.8
1.0
−15
−5
0
5
10
15
x
Quantile functions
exact
FFT
q(AN1)(x)
−15
−10
−5
0
5
10
15
0.0
0.2
0.4
0.6
0.8
1.0
x