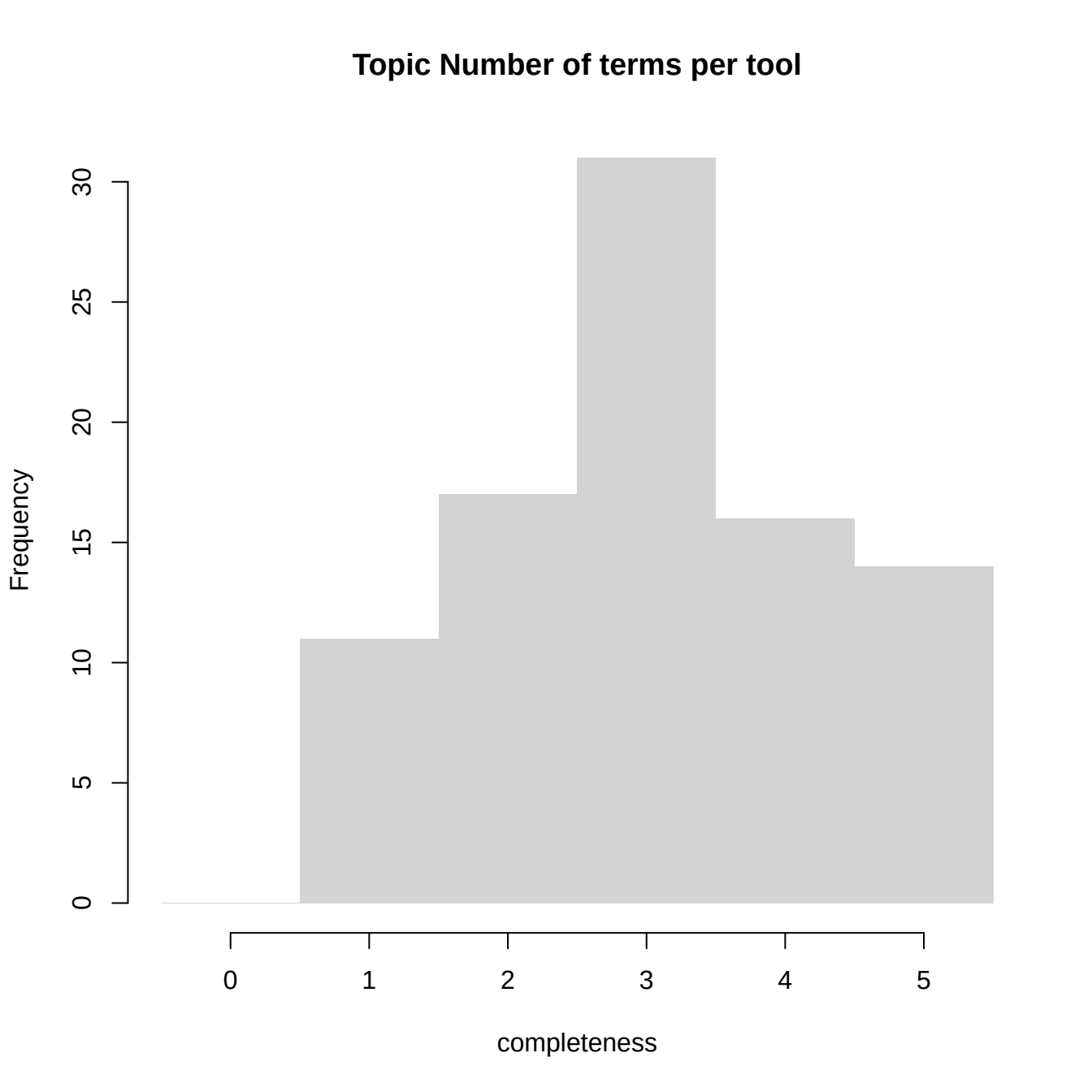
Topic Number of terms per tool
Frequency
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30
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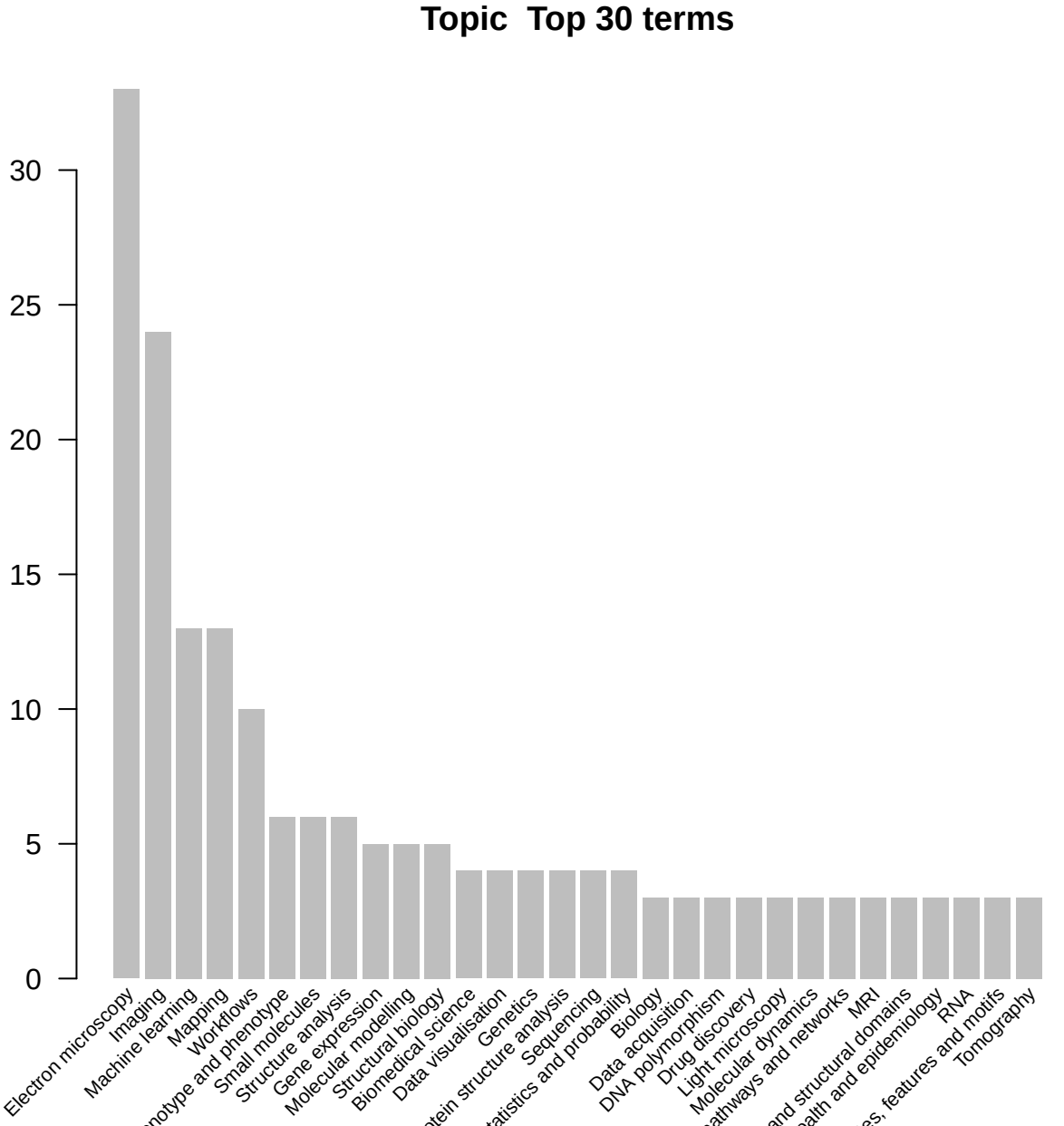
4
5
completeness


Topic Top 30 terms
30
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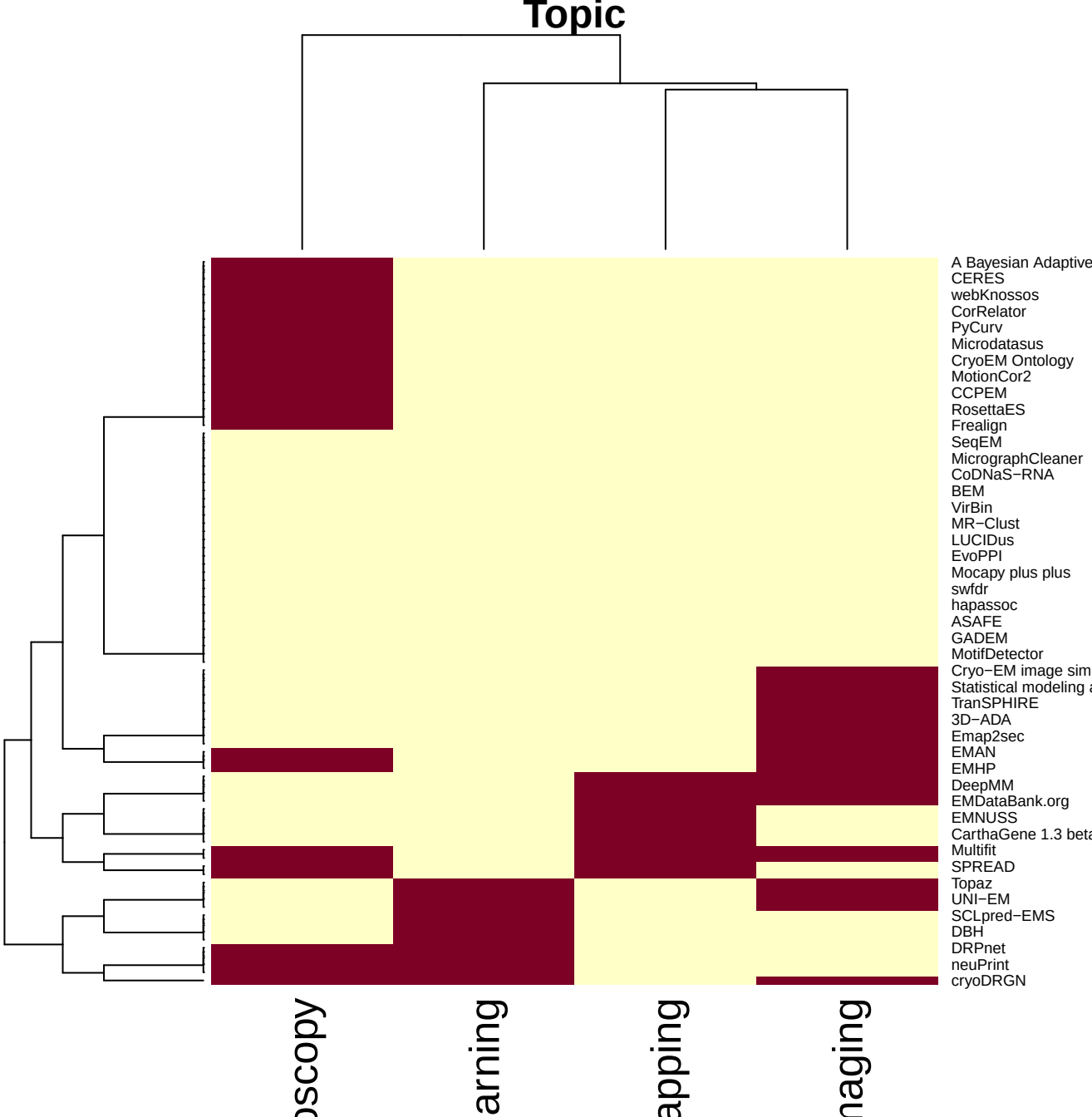
20
15
10
5
0
Electron microscopy
Imaging
Machine learning
Mapping
Workflows
Genotype and phenotype
Small molecules
Structure analysis
Gene expression
Molecular modelling
Structural biology
Biomedical science
Data visualisation
Genetics
Protein structure analysis
Sequencing
Statistics and probability
Biology
Data acquisition
DNA polymorphism
Drug discovery
Light microscopy
Molecular dynamics
Molecular networks
MRI
folds and structural domains
ions, pathways and networks
blic health and epidemiology
RNA
nce sites, features and motifs
Tomography


Topic
A Bayesian Adaptive
CERES
webKnossos
CorRelator
PyCurv
Microdatasus
CryoEM Ontology
MotionCor2
CCPEM
RosettaES
Frealign
SeqEM
MicrographCleaner
CoDNaS−RNA
BEM
VirBin
MR−Clust
LUCIDus
EvoPPI
Mocapy plus plus
swfdr
hapassoc
ASAFE
GADEM
MotifDetector
Cryo−EM image sim
Statistical modeling
TranSPHIRE
3D−ADA
Emap2sec
EMAN
EMHP
DeepMM
EMDataBank.org
EMNUSS
CarthaGene 1.3 beta
Multifit
SPREAD
Topaz
UNI−EM
SCLpred−EMS
DBH
DRPnet
neuPrint
cryoDRGN
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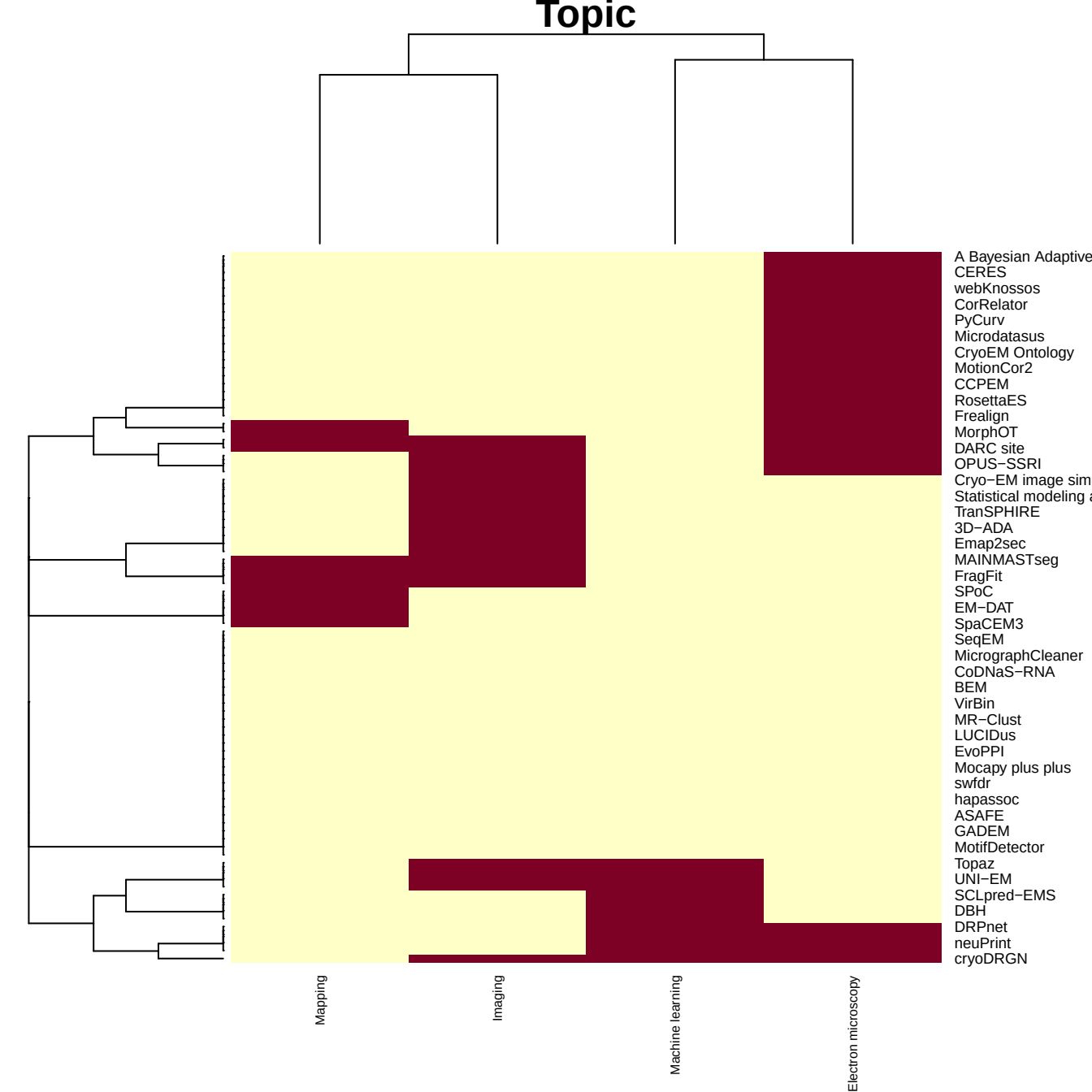
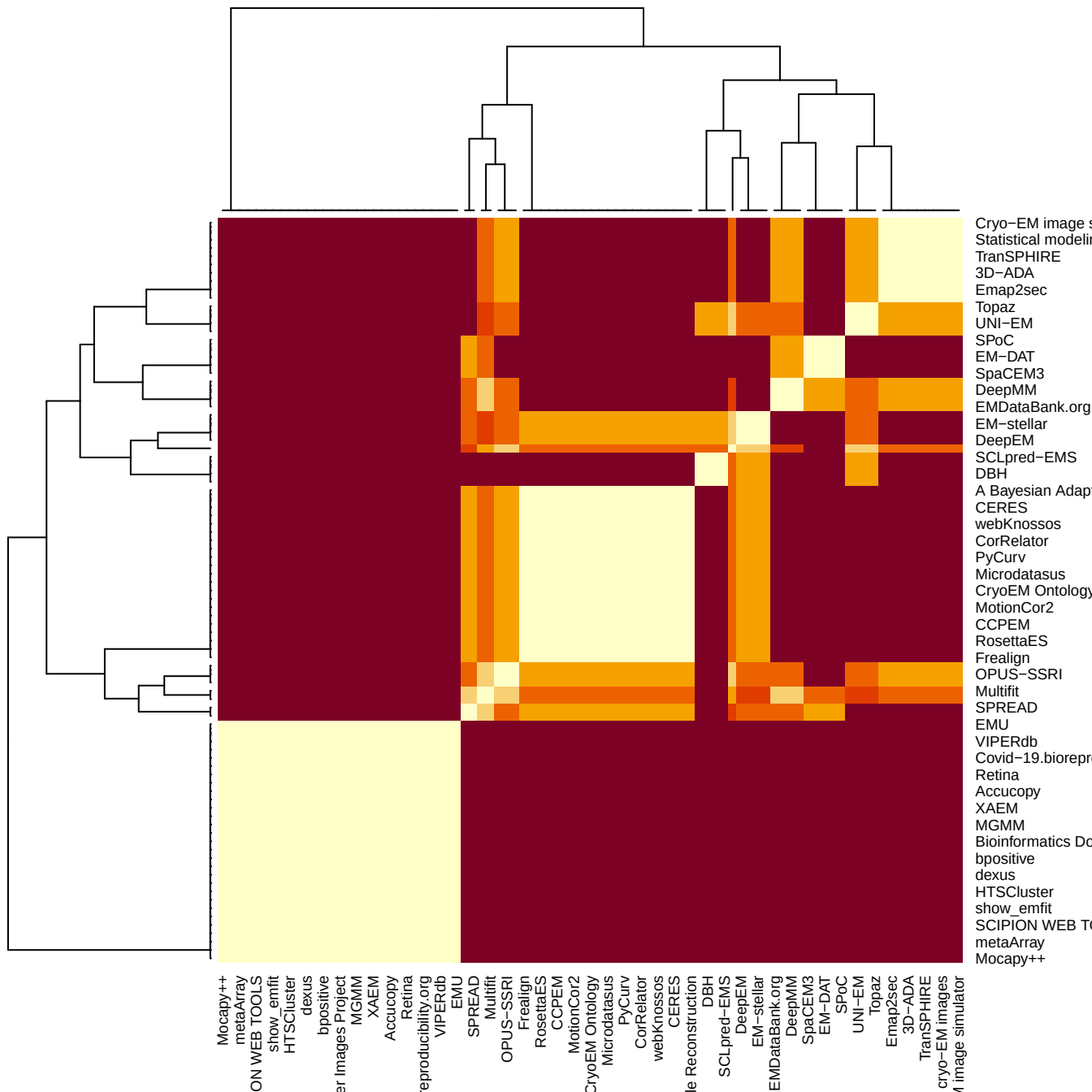
naging


Topic
A Bayesian Adaptive
CERES
webKnossos
CorRelator
PyCurv
Microdatasus
CryoEM Ontology
MotionCor2
CCPEM
RosettaES
Frealign
MorphOT
DARC site
OPUS−SSRI
Cryo−EM image sim
Statistical modeling a
TranSPHIRE
3D−ADA
Emap2sec
MAINMASTseg
FragFit
SPoC
EM−DAT
SpaCEM3
SeqEM
MicrographCleaner
CoDNaS−RNA
BEM
VirBin
MR−Clust
LUCIDus
EvoPPI
Mocapy plus plus
swfdr
hapassoc
ASAFE
GADEM
MotifDetector
Topaz
UNI−EM
SCLpred−EMS
DBH
DRPnet
neuPrint
cryoDRGN
Mapping
Imaging
Machine learning
Electron microscopy


Cryo−EM image s
Statistical modelin
TranSPHIRE
3D−ADA
Emap2sec
Topaz
UNI−EM
SPoC
EM−DAT
SpaCEM3
DeepMM
EMDataBank.org
EM−stellar
DeepEM
SCLpred−EMS
DBH
A Bayesian Adapt
CERES
webKnossos
CorRelator
PyCurv
Microdatasus
CryoEM Ontology
MotionCor2
CCPEM
RosettaES
Frealign
OPUS−SSRI
Multifit
SPREAD
EMU
VIPERdb
Covid−19.biorepr
Retina
Accucopy
XAEM
MGMM
Bioinformatics Do
bpositive
dexus
HTSCluster
show_emfit
SCIPION WEB TO
metaArray
Mocapy++
Mocapy++
metaArray
ON WEB TOOLS
show_emfit
HTSCluster
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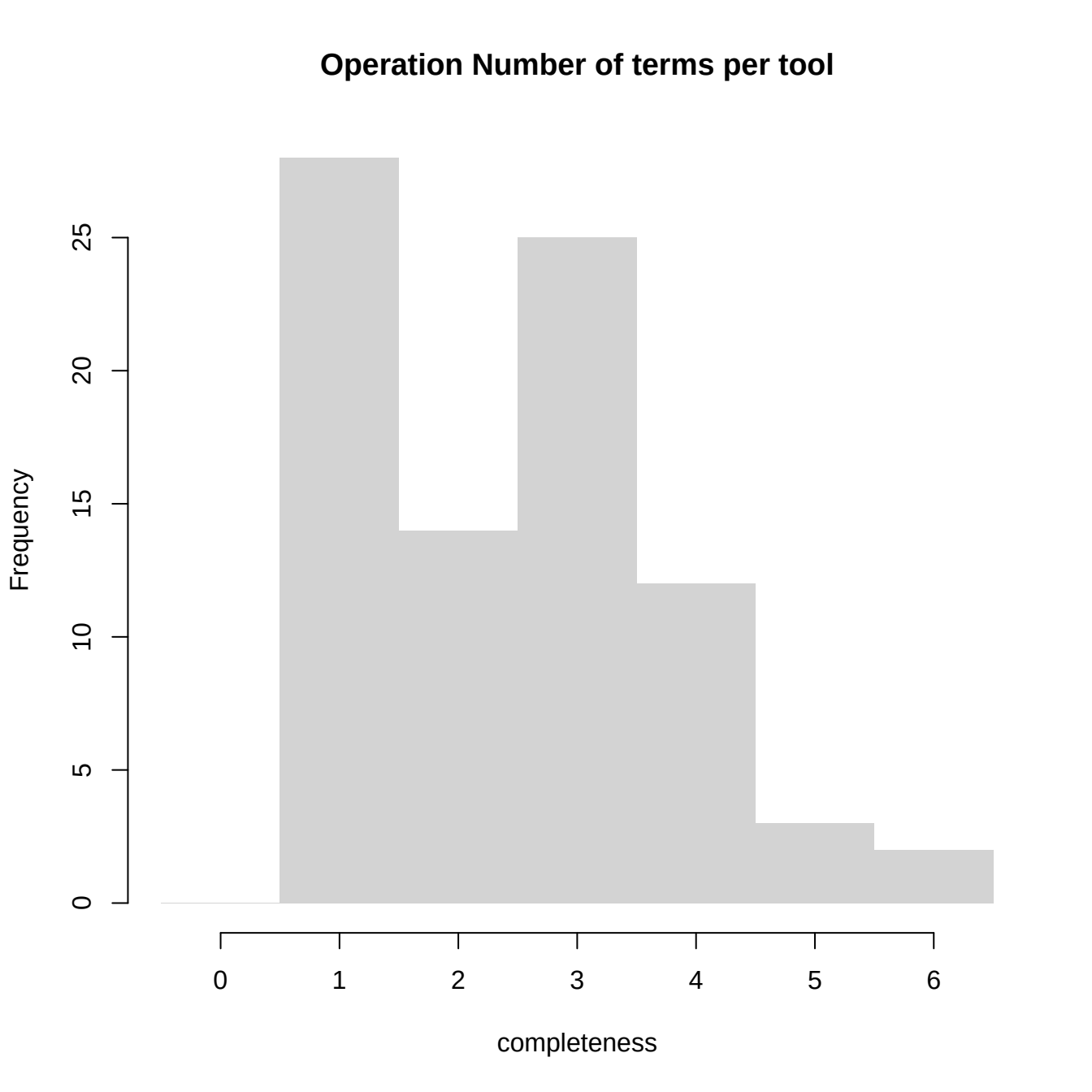
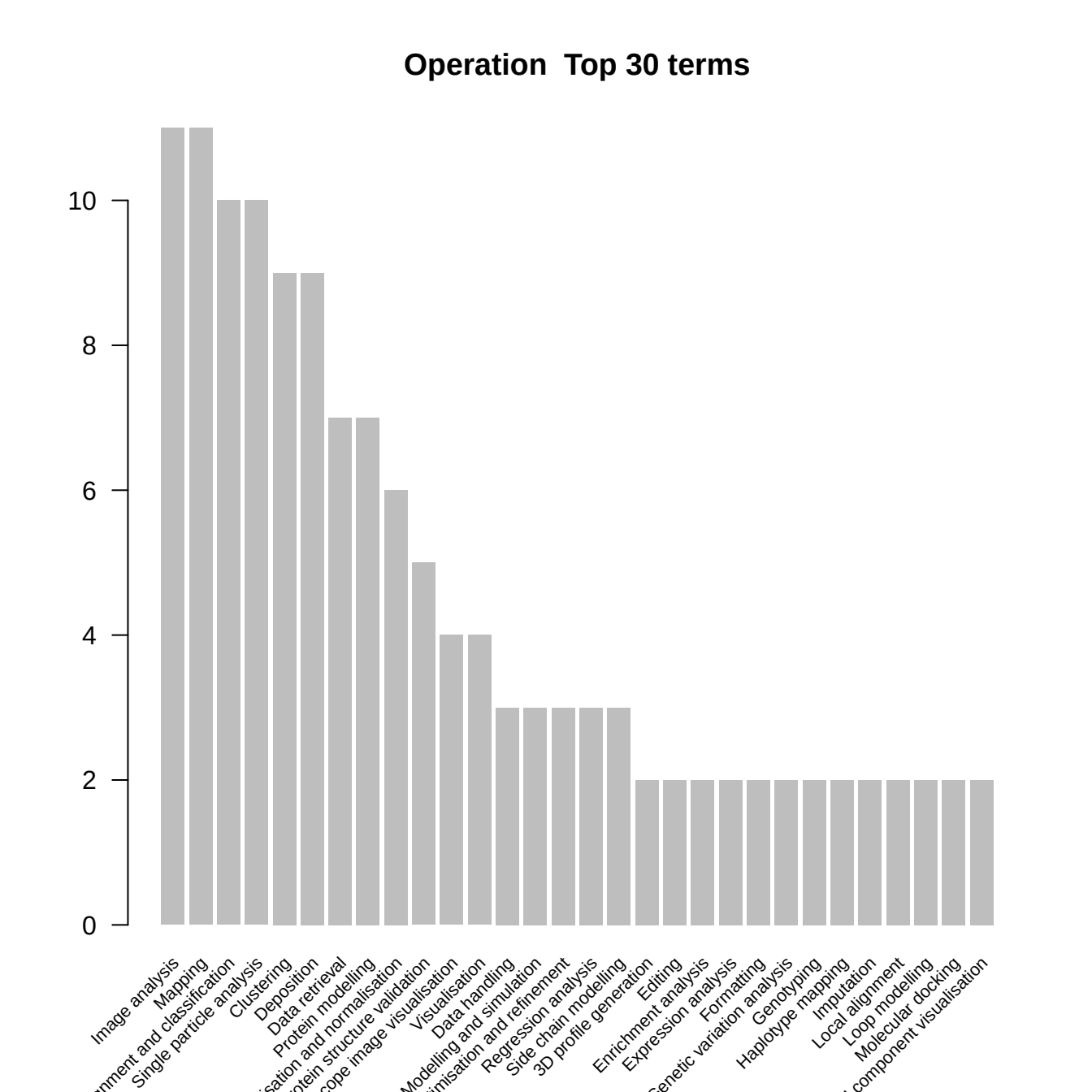
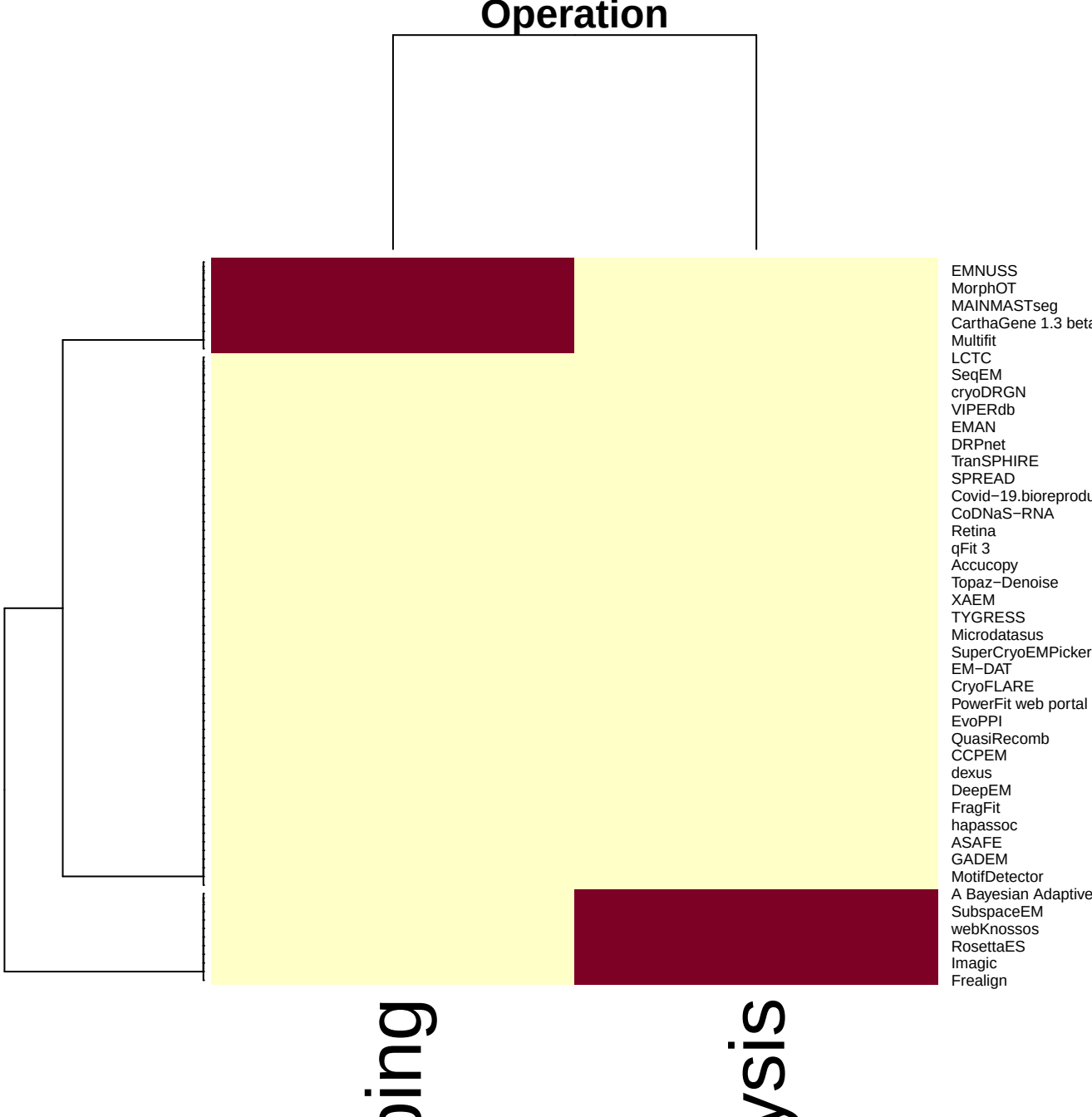
bpositive
er Images Project
MGMM
XAEM
Accucopy
Retina
eproducibility.org
VIPERdb
EMU
SPREAD
Multifit
OPUS−SSRI
Frealign
RosettaES
CCPEM
MotionCor2
CryoEM Ontology
Microdatasus
PyCurv
CorRelator
webKnossos
CERES
e Reconstruction
DBH
SCLpred−EMS
DeepEM
EM−stellar
EMDataBank.org
DeepMM
SpaCEM3
EM−DAT
SPoC
UNI−EM
Topaz
Emap2sec
3D−ADA
TranSPHIRE
cryo−EM images
image simulator


Operation Number of terms per tool
Frequency
0
5
10
15
20
25
0
1
2
3
4
5
6
completeness


Operation Top 30 terms
0
2
4
6
8
10
Image analysis
Mapping
nment and classification
Single particle analysis
Clustering
Deposition
Data retrieval
Protein modelling
sation and normalisation
otein structure validation
cope image visualisation
Visualisation
Data handling
Modelling and simulation
imisation and refinement
Regression analysis
Side chain modelling
3D profile generation
Editing
Enrichment analysis
Expression analysis
Formatting
enetic variation analysis
Genotyping
Haplotype mapping
Imputation
Local alignment
Loop modelling
Molecular docking
component visualisation


Operation
EMNUSS
MorphOT
MAINMASTseg
CarthaGene 1.3 beta
Multifit
LCTC
SeqEM
cryoDRGN
VIPERdb
EMAN
DRPnet
TranSPHIRE
SPREAD
Covid−19.bioreprodu
CoDNaS−RNA
Retina
qFit 3
Accucopy
Topaz−Denoise
XAEM
TYGRESS
Microdatasus
SuperCryoEMPicker
EM−DAT
CryoFLARE
PowerFit web portal
EvoPPI
QuasiRecomb
CCPEM
dexus
DeepEM
FragFit
hapassoc
ASAFE
GADEM
MotifDetector
A Bayesian Adaptive
SubspaceEM
webKnossos
RosettaES
Imagic
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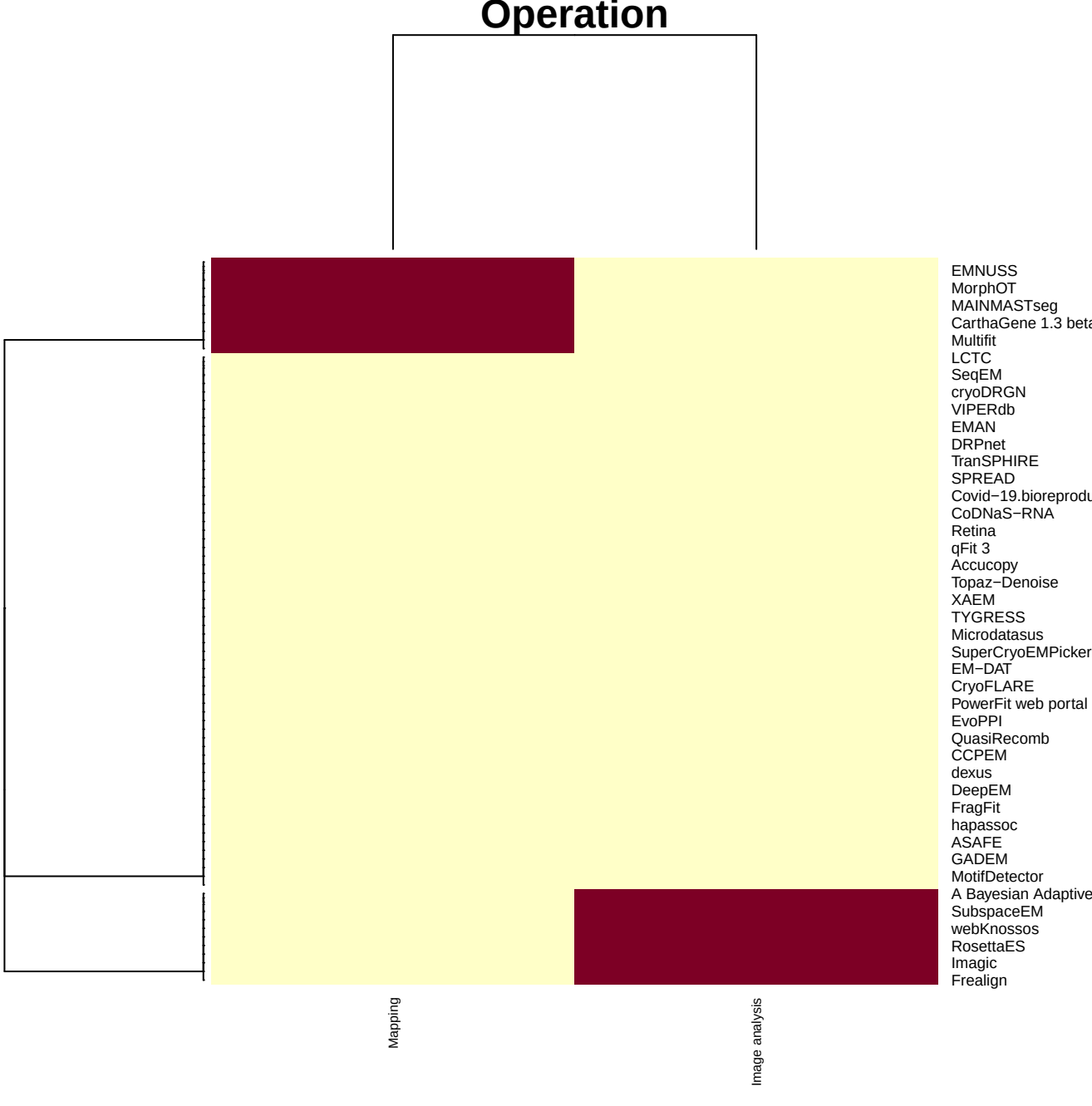
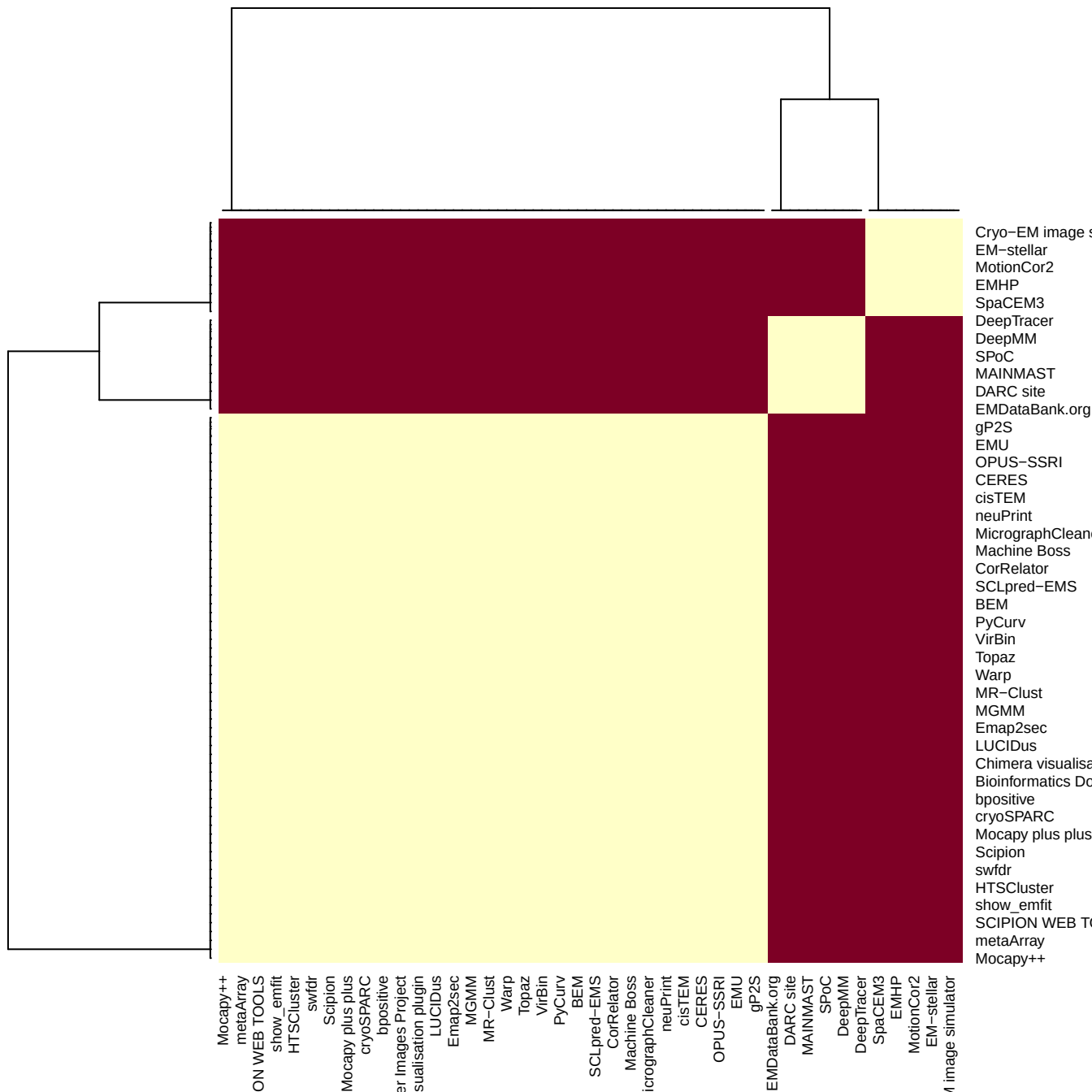
ysis


Operation
EMNUSS
MorphOT
MAINMASTseg
CarthaGene 1.3 beta
Multifit
LCTC
SeqEM
cryoDRGN
VIPERdb
EMAN
DRPnet
TranSPHIRE
SPREAD
Covid−19.bioreprodu
CoDNaS−RNA
Retina
qFit 3
Accucopy
Topaz−Denoise
XAEM
TYGRESS
Microdatasus
SuperCryoEMPicker
EM−DAT
CryoFLARE
PowerFit web portal
EvoPPI
QuasiRecomb
CCPEM
dexus
DeepEM
FragFit
hapassoc
ASAFE
GADEM
MotifDetector
A Bayesian Adaptive
SubspaceEM
webKnossos
RosettaES
Imagic
Frealign
Mapping
Image analysis


Cryo−EM image s
EM−stellar
MotionCor2
EMHP
SpaCEM3
DeepTracer
DeepMM
SPoC
MAINMAST
DARC site
EMDataBank.org
gP2S
EMU
OPUS−SSRI
CERES
cisTEM
neuPrint
MicrographClean
Machine Boss
CorRelator
SCLpred−EMS
BEM
PyCurv
VirBin
Topaz
Warp
MR−Clust
MGMM
Emap2sec
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Bioinformatics Do
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Mocapy plus plus
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HTSCluster
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SCIPION WEB TO
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Mocapy++
Mocapy++
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show_emfit
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MAINMAST
SPoC
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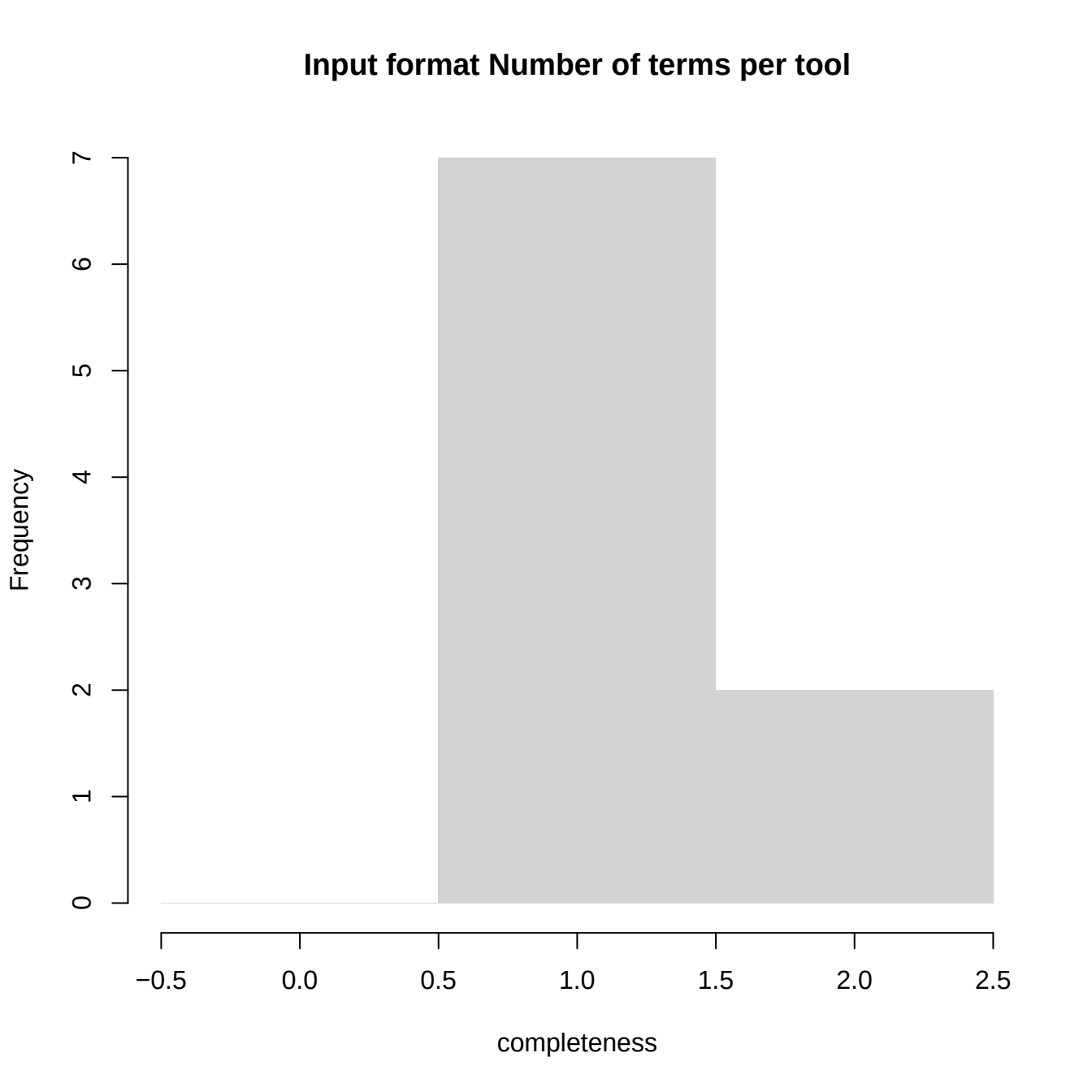
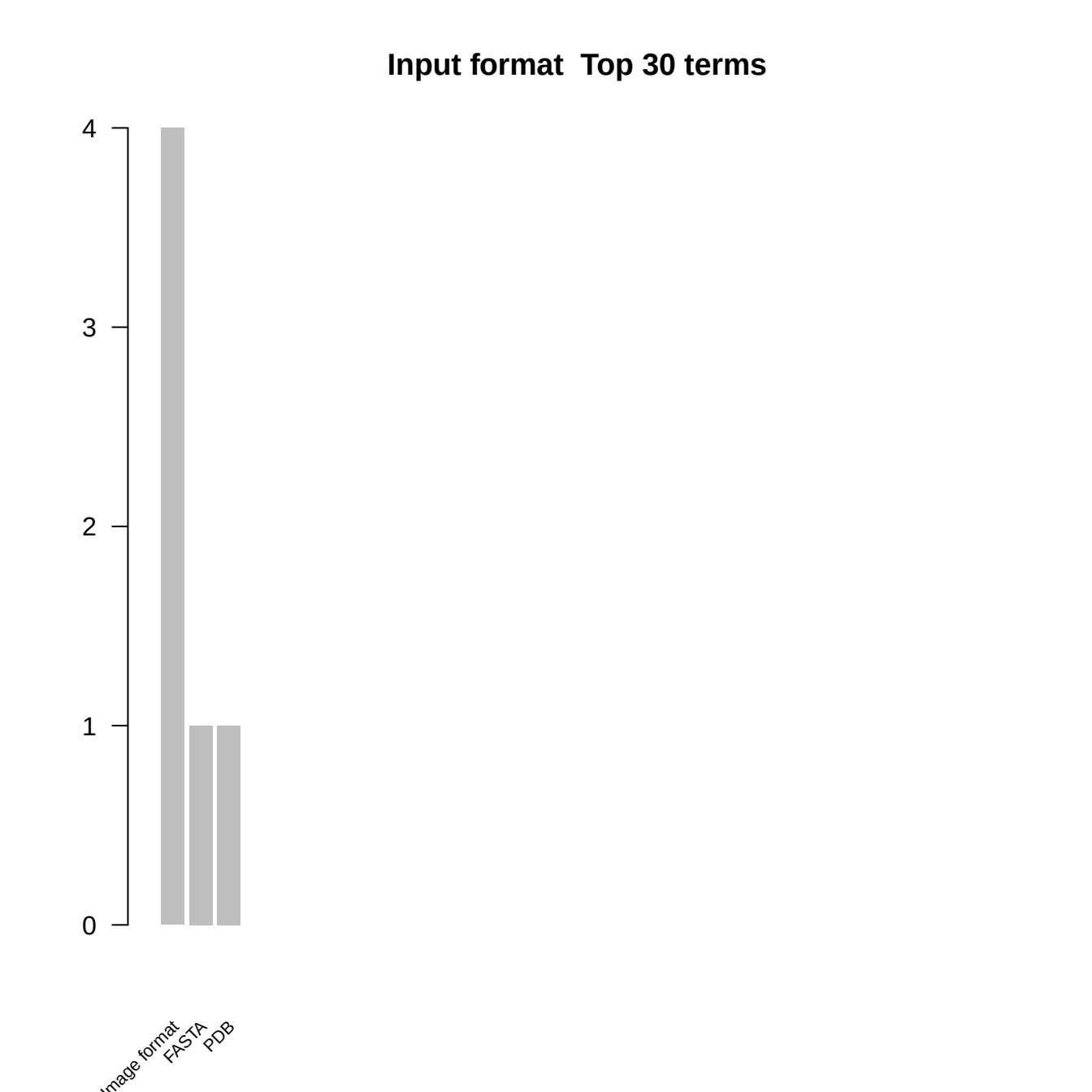
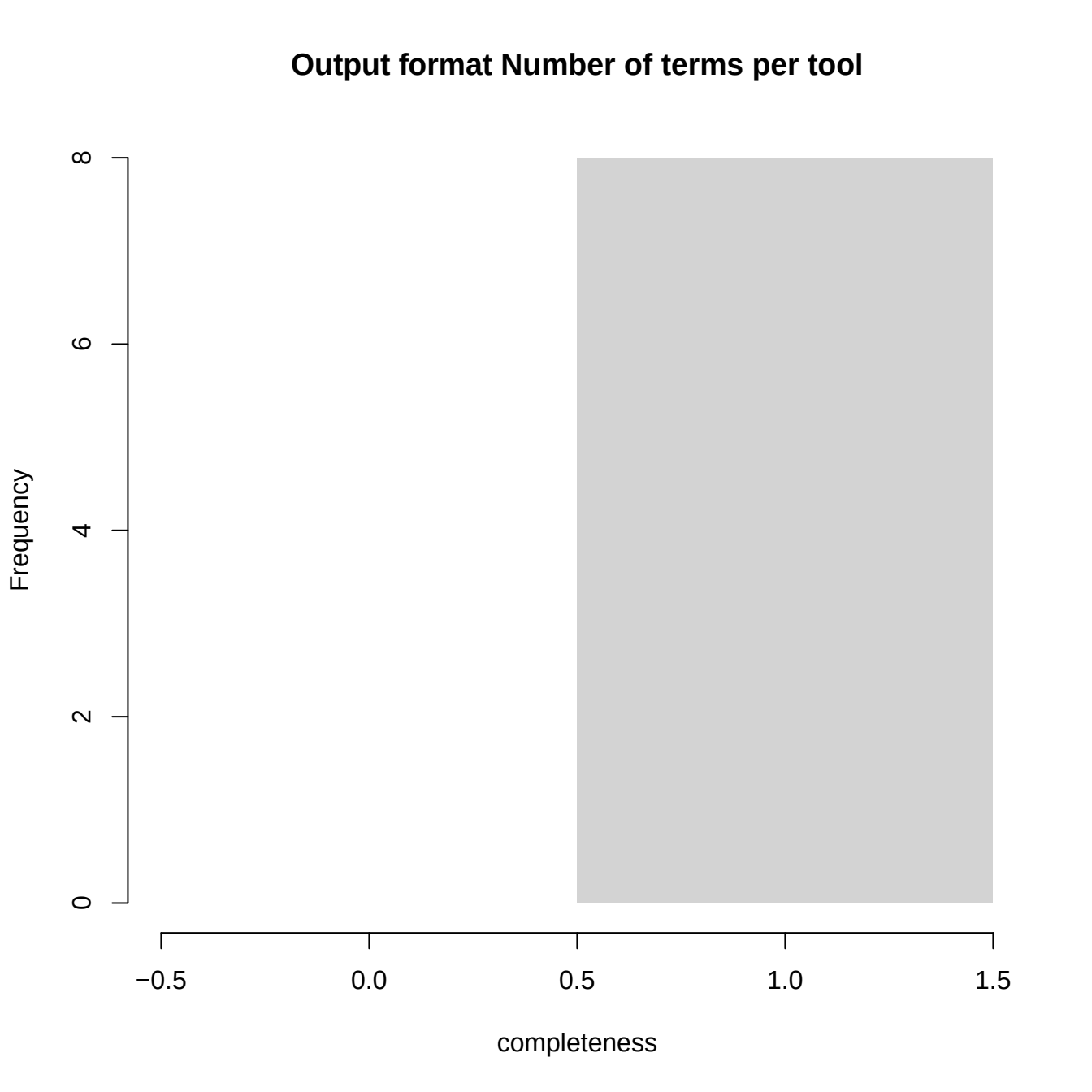
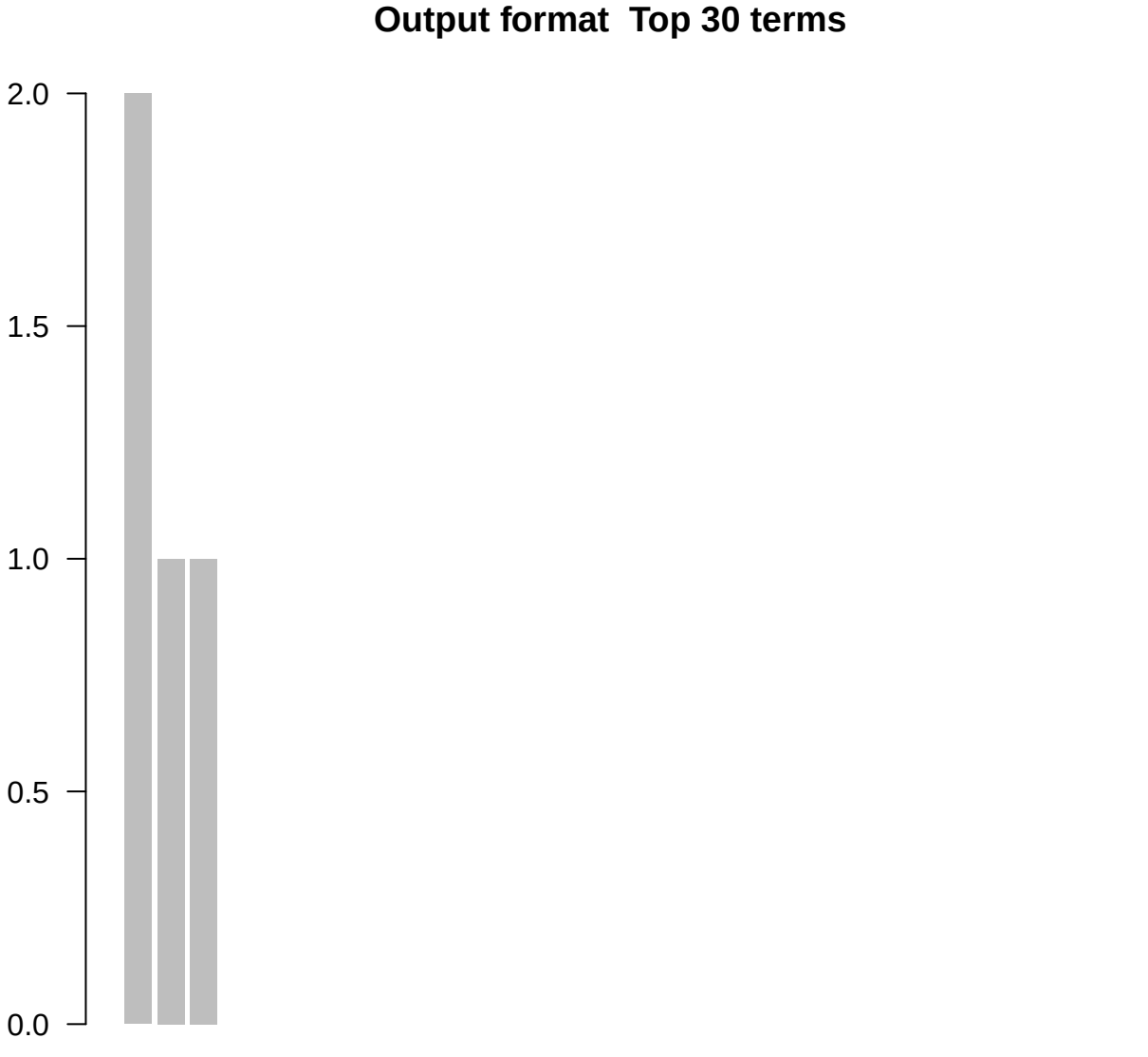
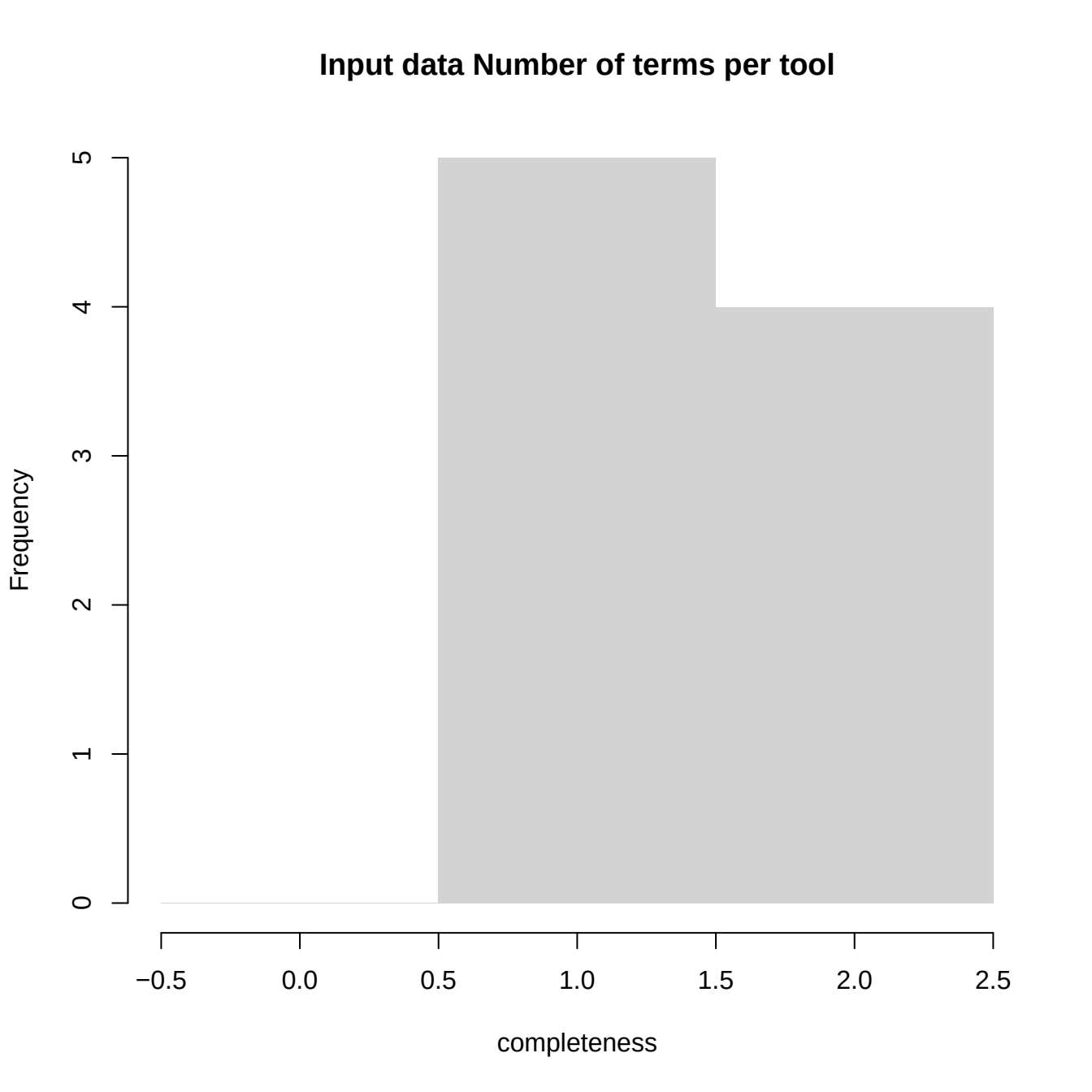
M image simulator


Input format Number of terms per tool
Frequency
0
1
2
3
4
5
6
7
−0.5
0.0
0.5
1.0
1.5
2.0
2.5
completeness


Input format Top 30 terms
4
3
2
1
0
Image format
FASTA
PDB


Output format Number of terms per tool
Frequency
0
2
4
6
8
−0.5
0.0
0.5
1.0
1.5
completeness


Output format Top 30 terms
2.0
1.5
1.0
0.5
0.0


Input data Number of terms per tool
Frequency
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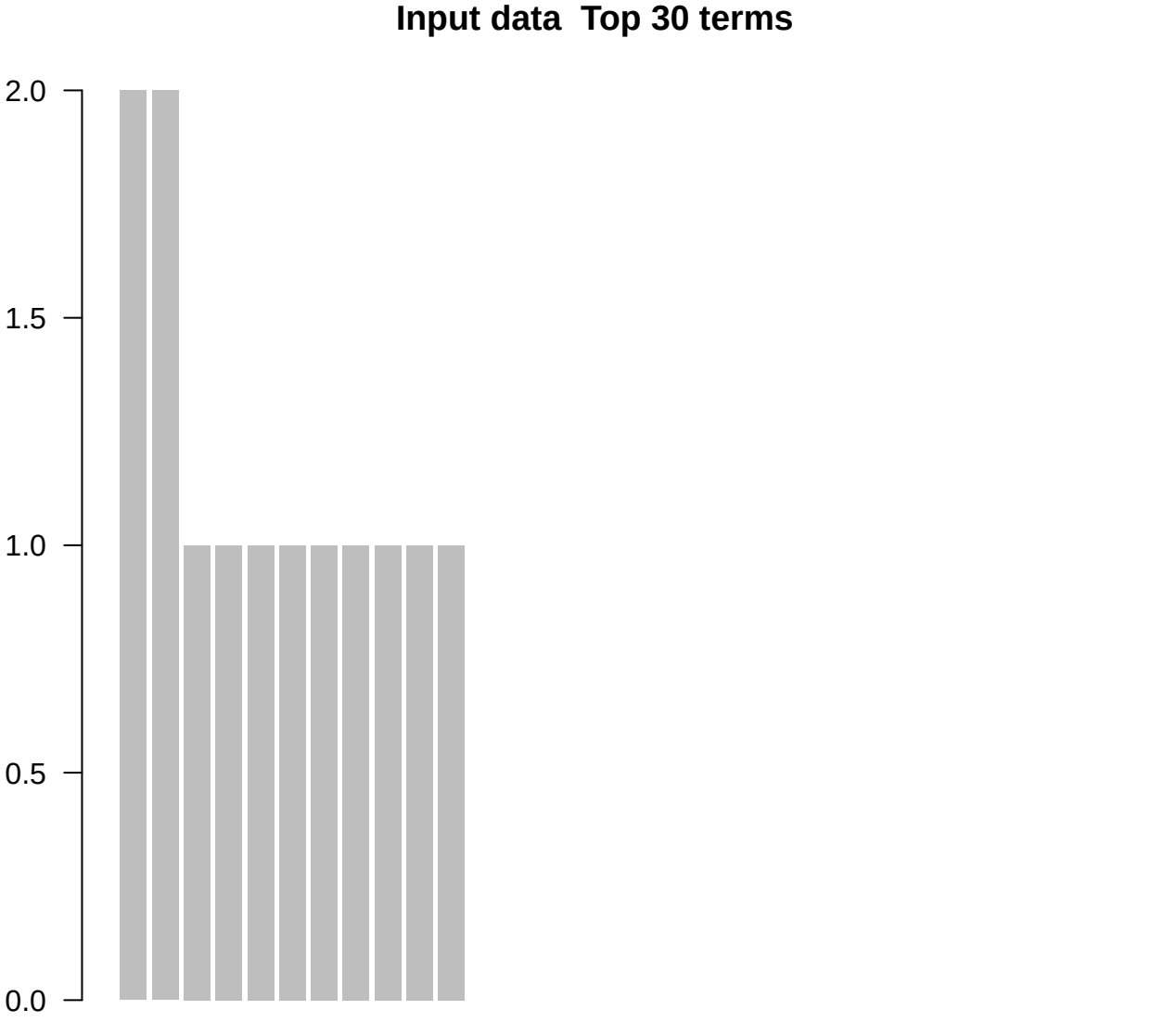
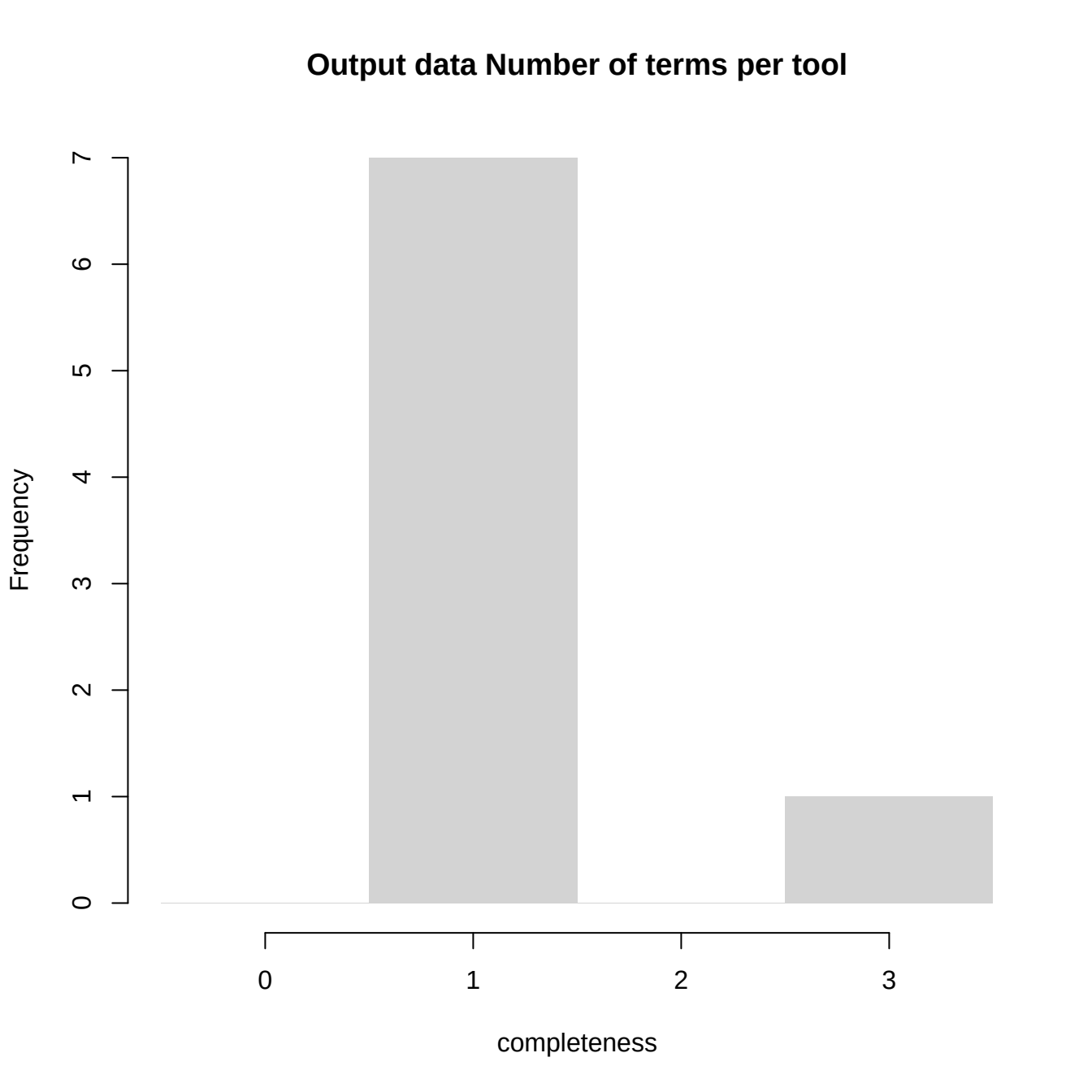
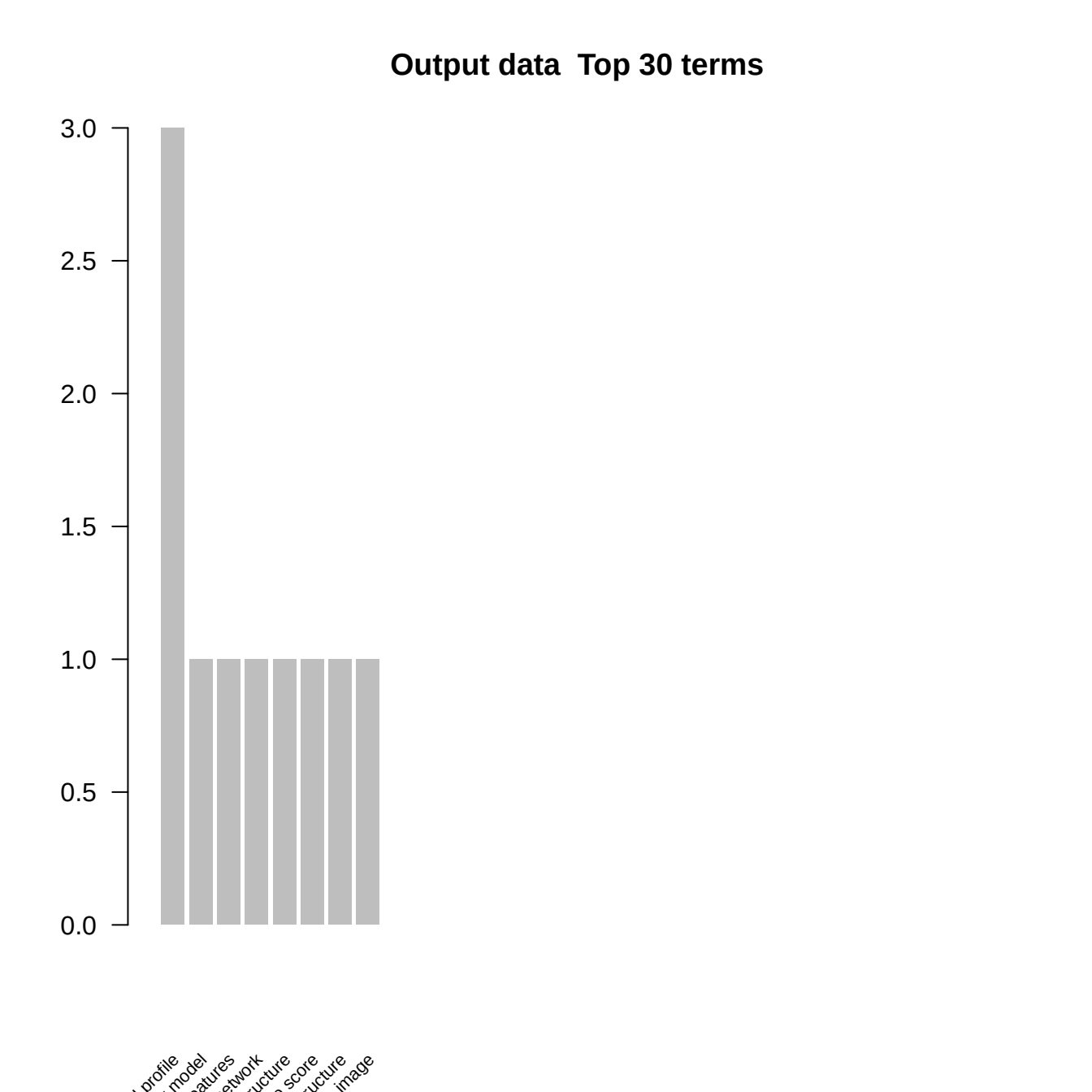
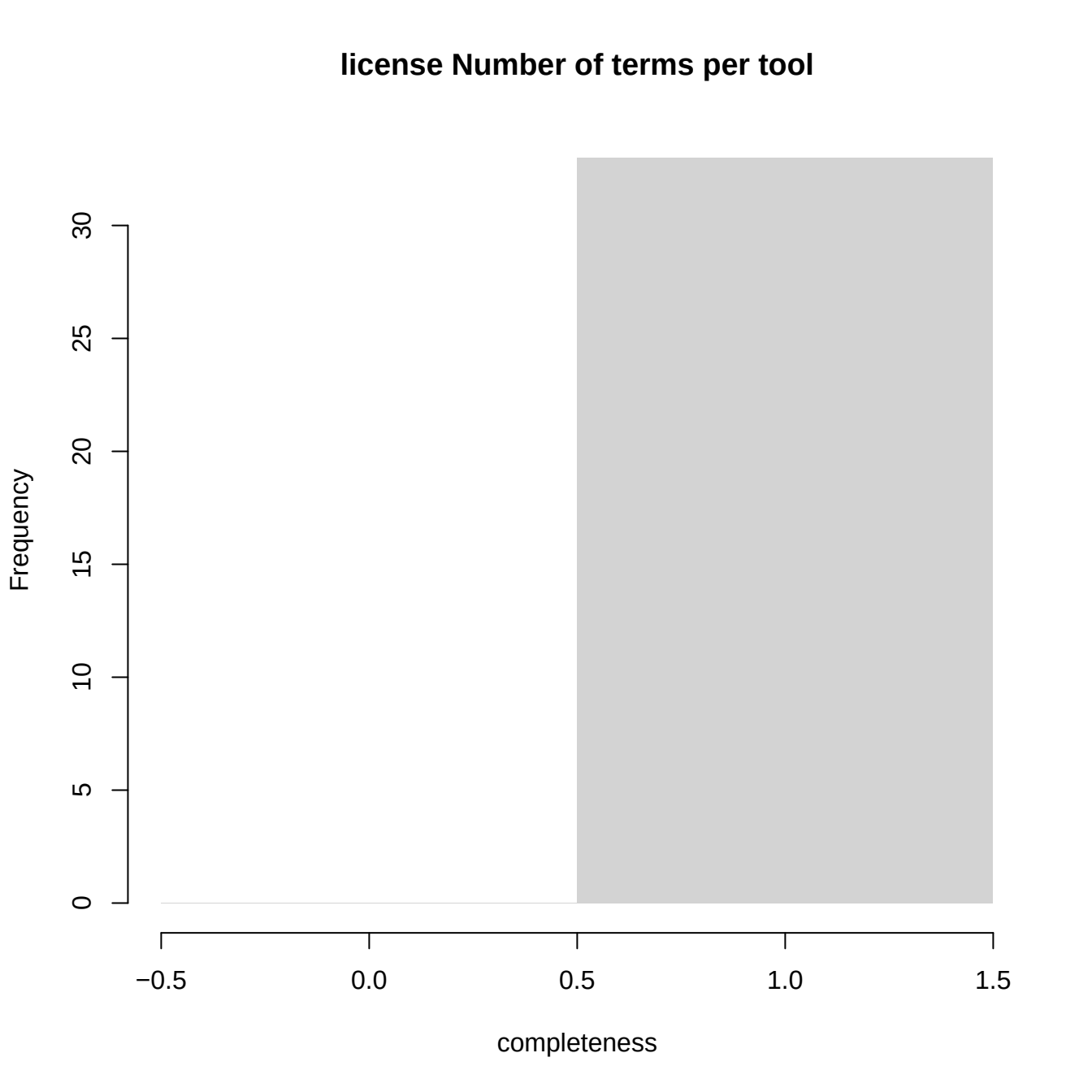
2
3
4
5
−0.5
0.0
0.5
1.0
1.5
2.0
2.5
completeness


Input data Top 30 terms
2.0
1.5
1.0
0.5
0.0


Output data Number of terms per tool
Frequency
0
1
2
3
4
5
6
7
0
1
2
3
completeness


Output data Top 30 terms
3.0
2.5
2.0
1.5
1.0
0.5
0.0
profile
model
atures
etwork
ucture
score
ucture
image


license Number of terms per tool
Frequency
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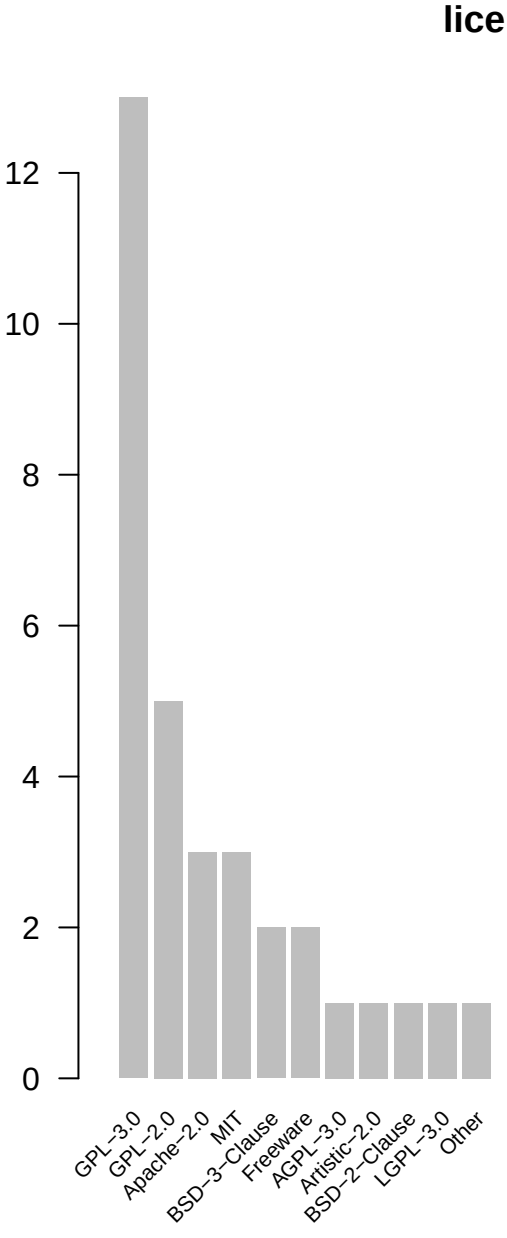
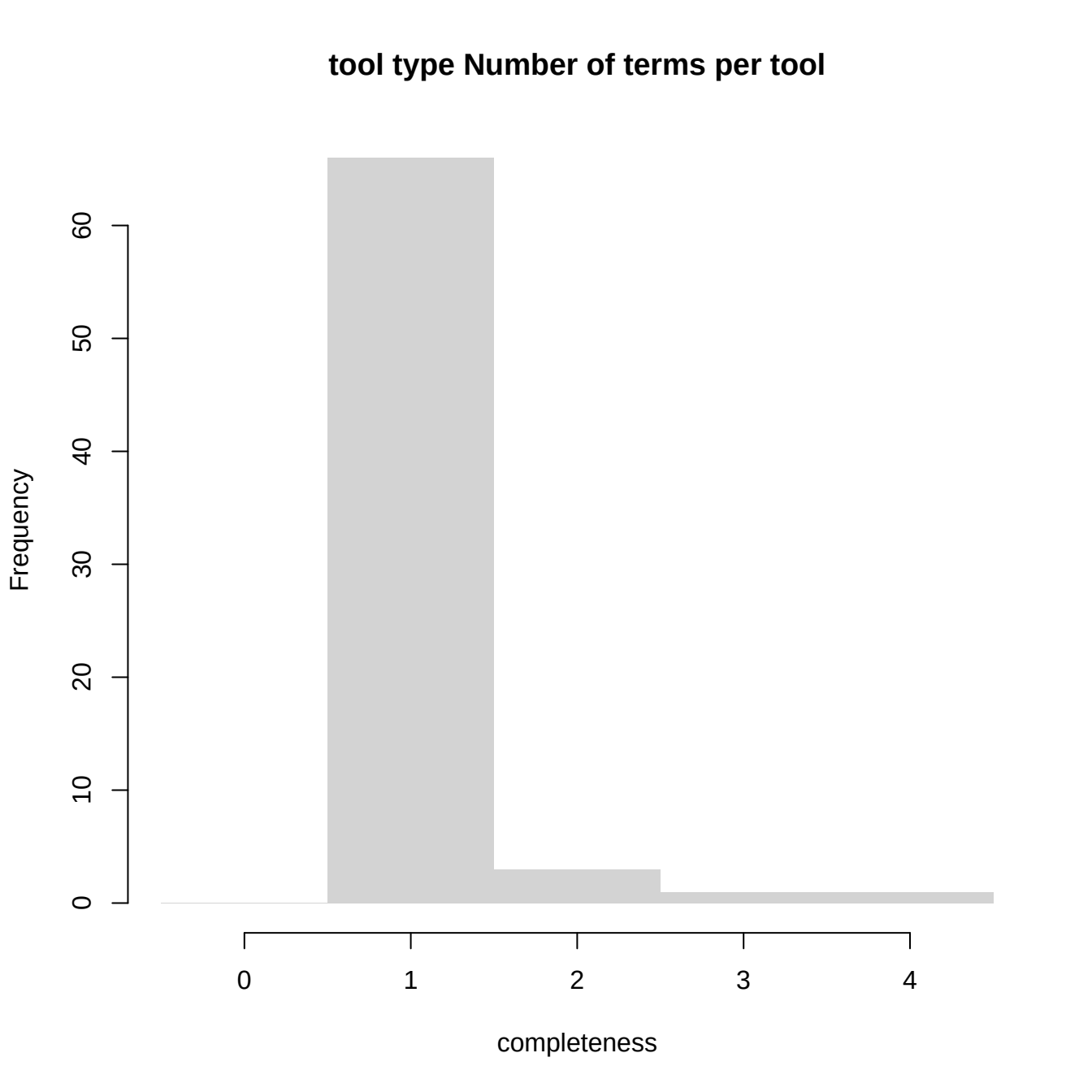
10
15
20
25
30
−0.5
0.0
0.5
1.0
1.5
completeness


license Top 30 terms
12
10
8
6
4
2
0
GPL−3.0
GPL−2.0
Apache−2.0
MIT
BSD−3−Clause
Freeware
AGPL−3.0
Artistic−2.0
BSD−2−Clause
LGPL−3.0
Other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Frequency
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40
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60
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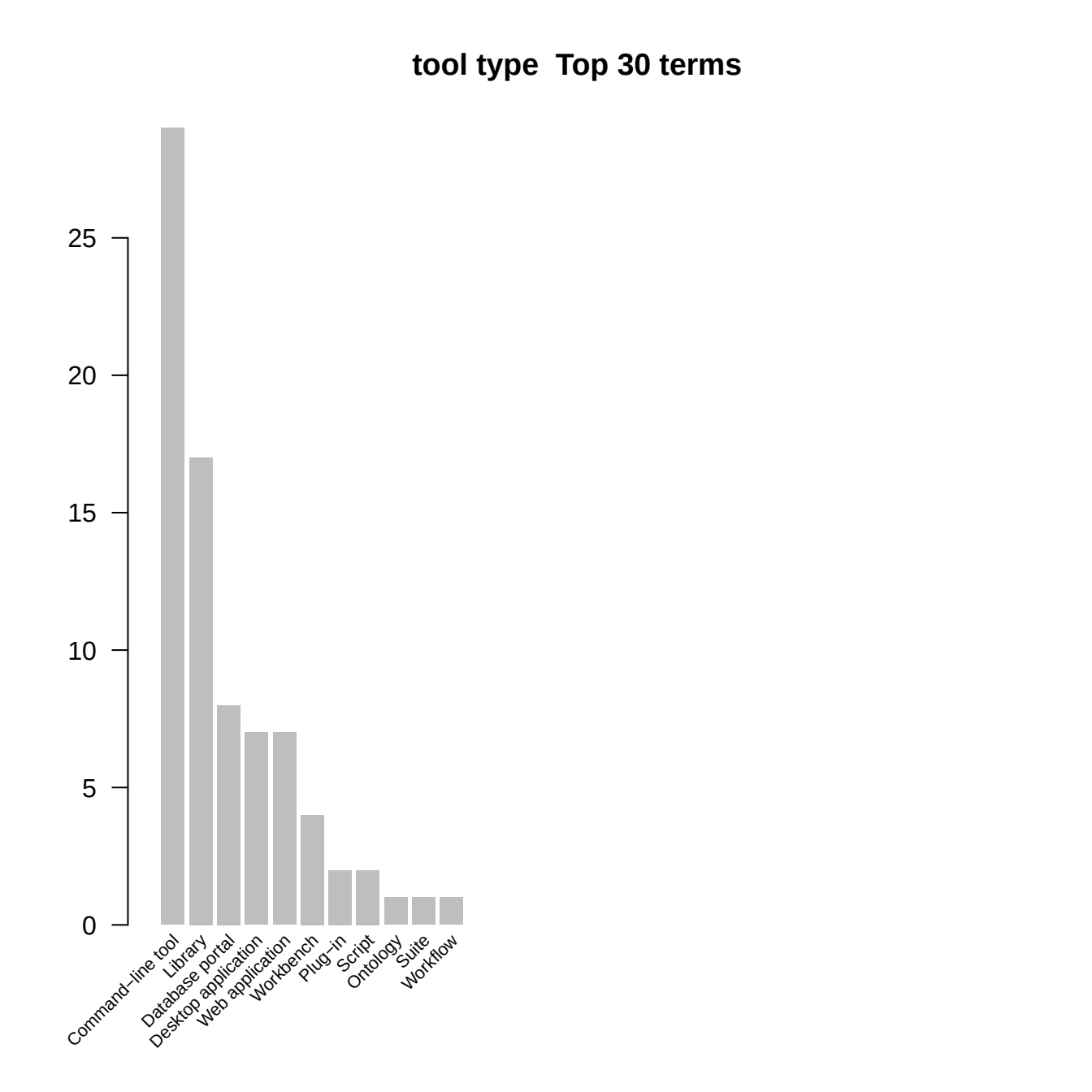
1
2
3
4
completeness


tool type Top 30 terms
25
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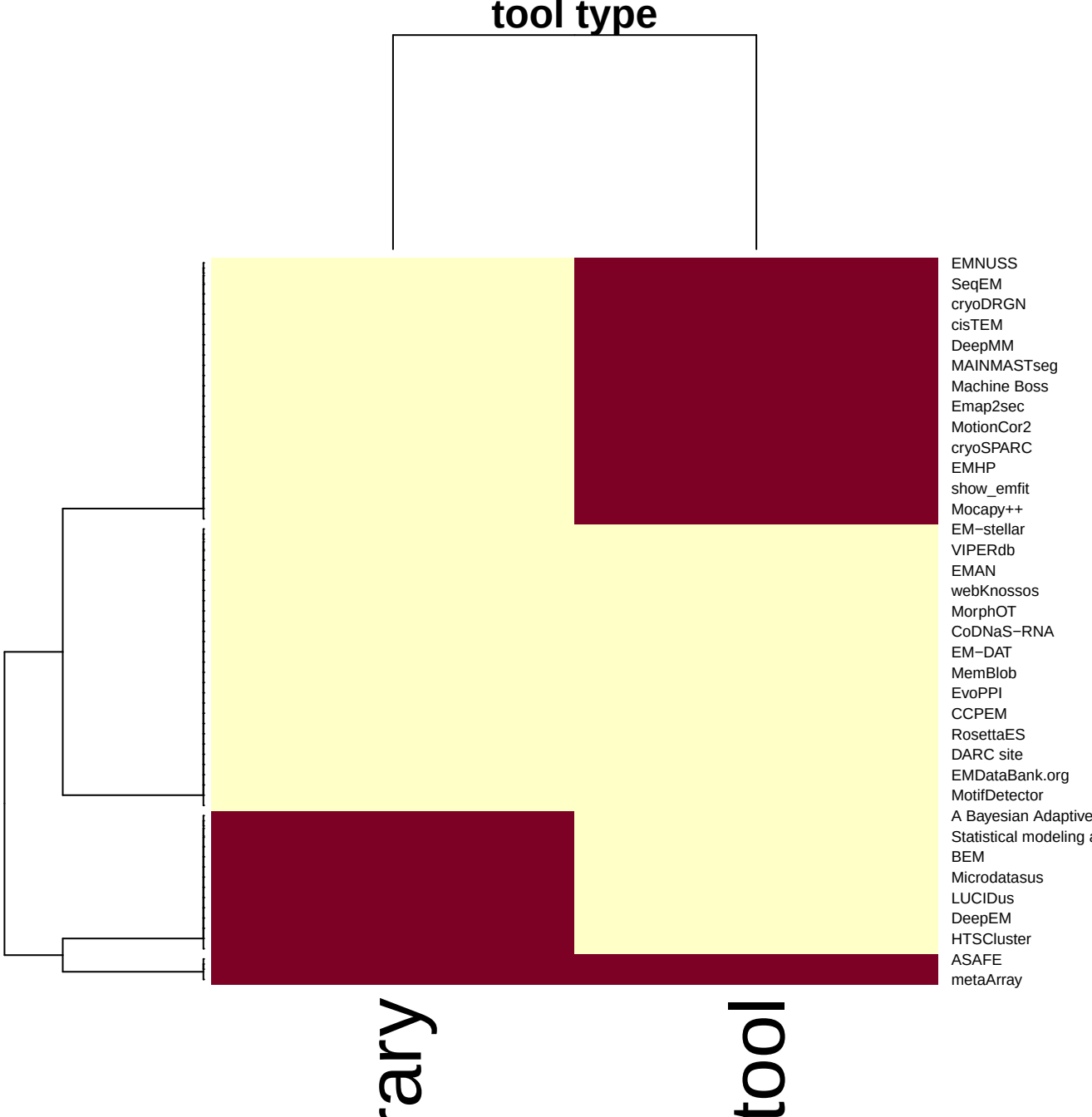
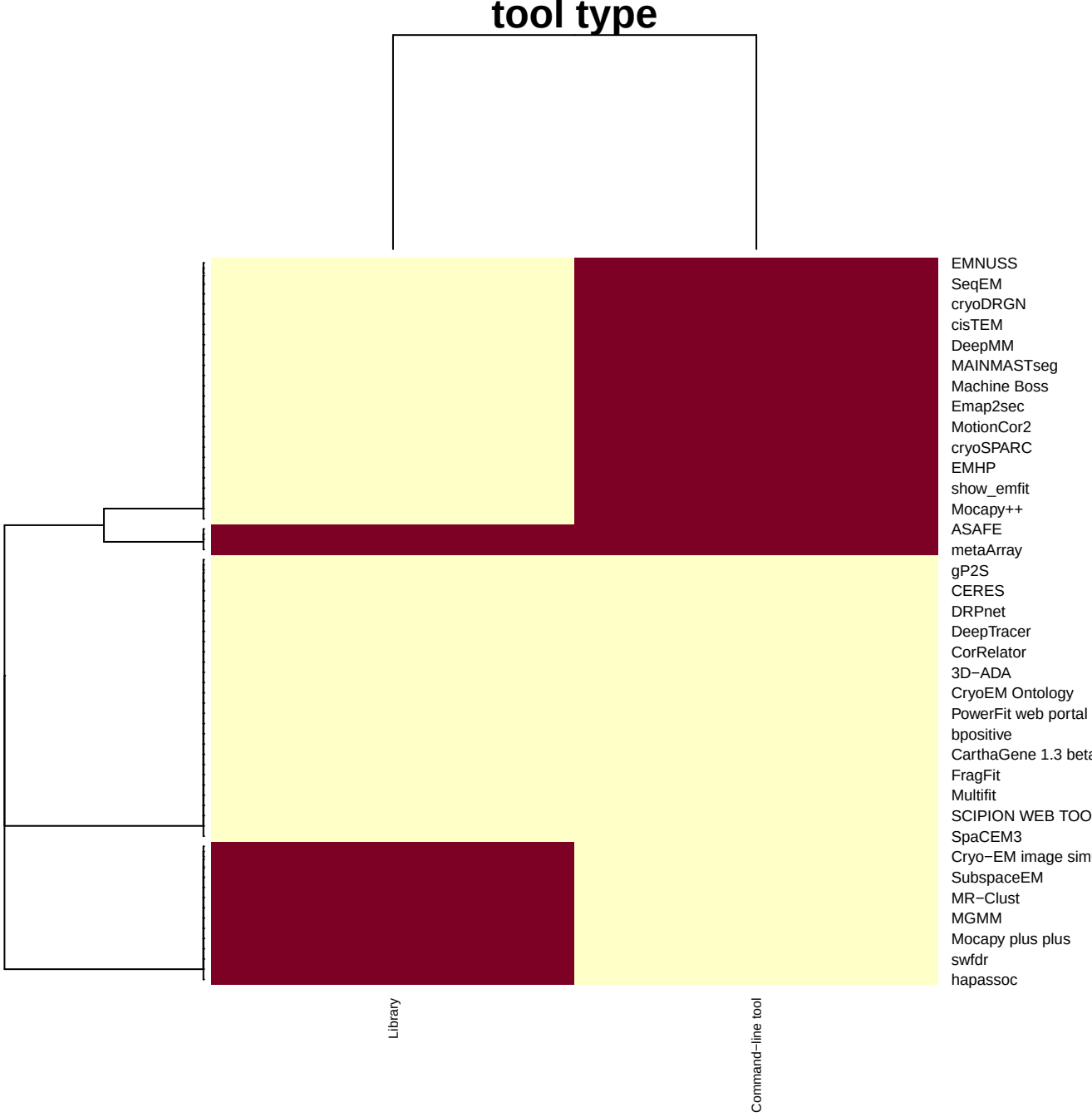
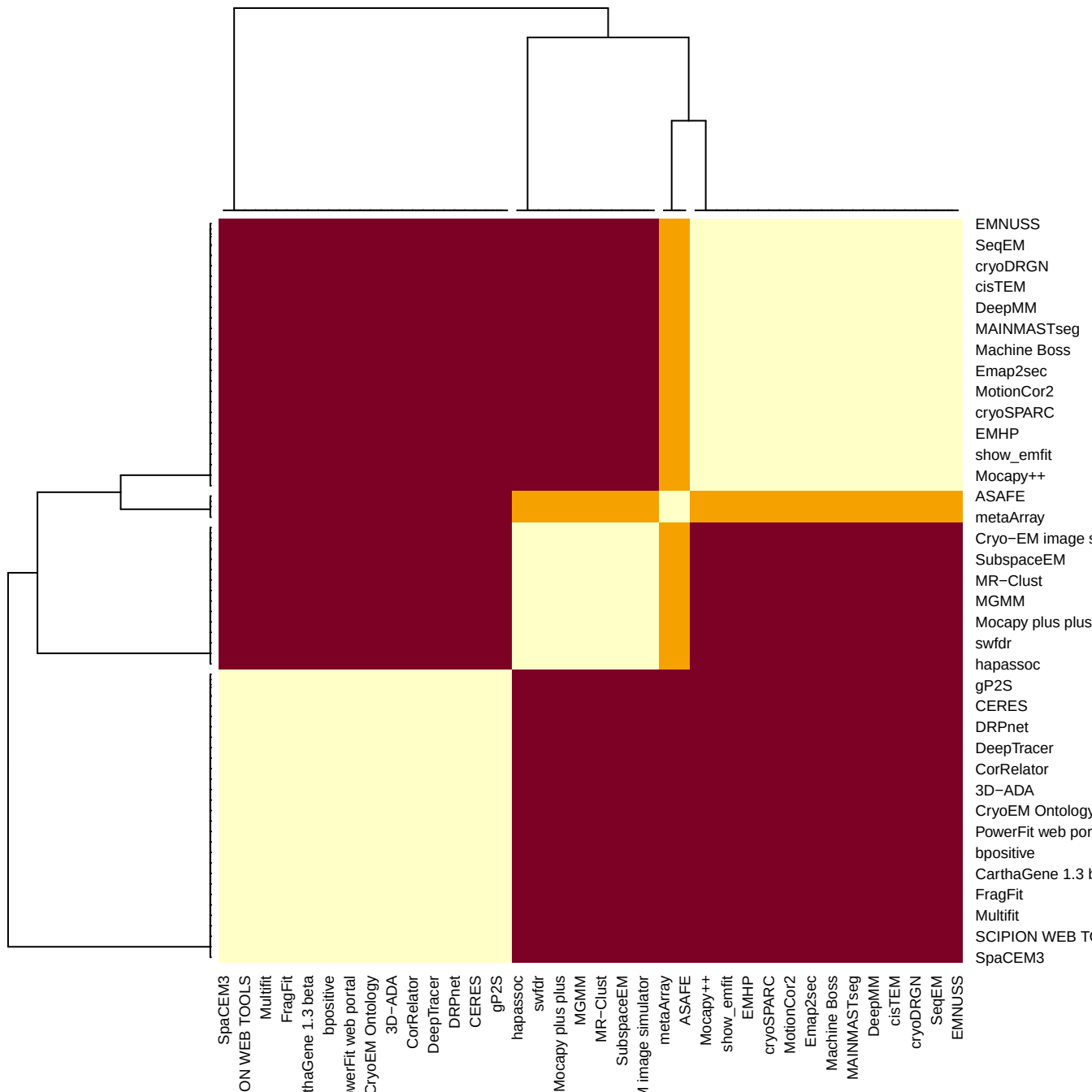
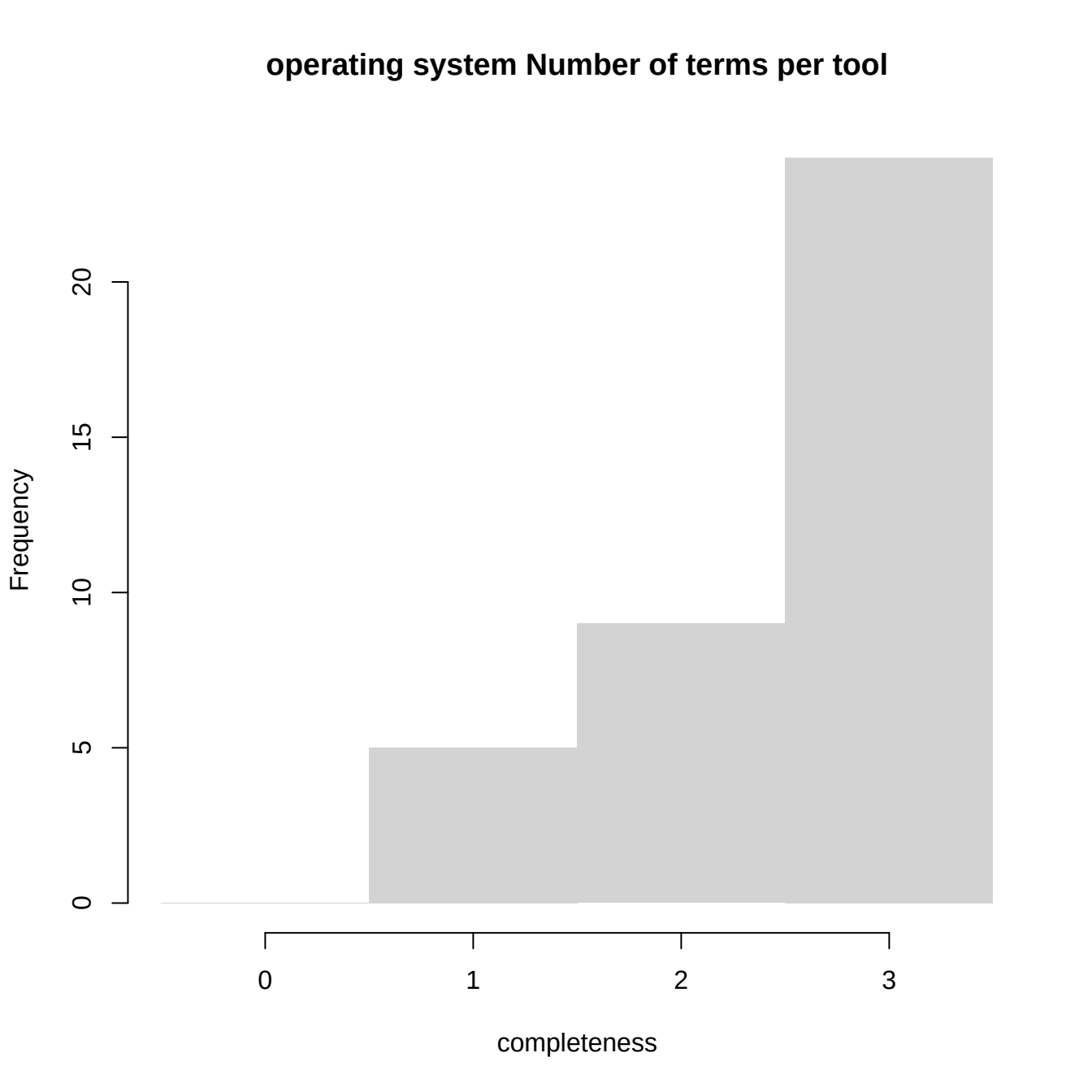
15
10
5
0
Command−line tool
Library
Database portal
Desktop application
Web application
Workbench
Plug−in
Script
Ontology
Suite
Workflow


tool type
EMNUSS
SeqEM
cryoDRGN
cisTEM
DeepMM
MAINMASTseg
Machine Boss
Emap2sec
MotionCor2
cryoSPARC
EMHP
show_emfit
Mocapy++
EM−stellar
VIPERdb
EMAN
webKnossos
MorphOT
CoDNaS−RNA
EM−DAT
MemBlob
EvoPPI
CCPEM
RosettaES
DARC site
EMDataBank.org
MotifDetector
A Bayesian Adaptive
Statistical modeling a
BEM
Microdatasus
LUCIDus
DeepEM
HTSCluster
ASAFE
metaArray
rary
tool


tool type
EMNUSS
SeqEM
cryoDRGN
cisTEM
DeepMM
MAINMASTseg
Machine Boss
Emap2sec
MotionCor2
cryoSPARC
EMHP
show_emfit
Mocapy++
ASAFE
metaArray
gP2S
CERES
DRPnet
DeepTracer
CorRelator
3D−ADA
CryoEM Ontology
PowerFit web portal
bpositive
CarthaGene 1.3 beta
FragFit
Multifit
SCIPION WEB TOO
SpaCEM3
Cryo−EM image sim
SubspaceEM
MR−Clust
MGMM
Mocapy plus plus
swfdr
hapassoc
Library
Command−line tool


EMNUSS
SeqEM
cryoDRGN
cisTEM
DeepMM
MAINMASTseg
Machine Boss
Emap2sec
MotionCor2
cryoSPARC
EMHP
show_emfit
Mocapy++
ASAFE
metaArray
Cryo−EM image s
SubspaceEM
MR−Clust
MGMM
Mocapy plus plus
swfdr
hapassoc
gP2S
CERES
DRPnet
DeepTracer
CorRelator
3D−ADA
CryoEM Ontology
PowerFit web por
bpositive
CarthaGene 1.3 b
FragFit
Multifit
SCIPION WEB T
SpaCEM3
SpaCEM3
ON WEB TOOLS
Multifit
FragFit
thaGene 1.3 beta
bpositive
werFit web portal
CryoEM Ontology
3D−ADA
CorRelator
DeepTracer
DRPnet
CERES
gP2S
hapassoc
swfdr
Mocapy plus plus
MGMM
MR−Clust
SubspaceEM
M image simulator
metaArray
ASAFE
Mocapy++
show_emfit
EMHP
cryoSPARC
MotionCor2
Emap2sec
Machine Boss
MAINMASTseg
DeepMM
cisTEM
cryoDRGN
SeqEM
EMNUSS


operating system Number of terms per tool
Frequency
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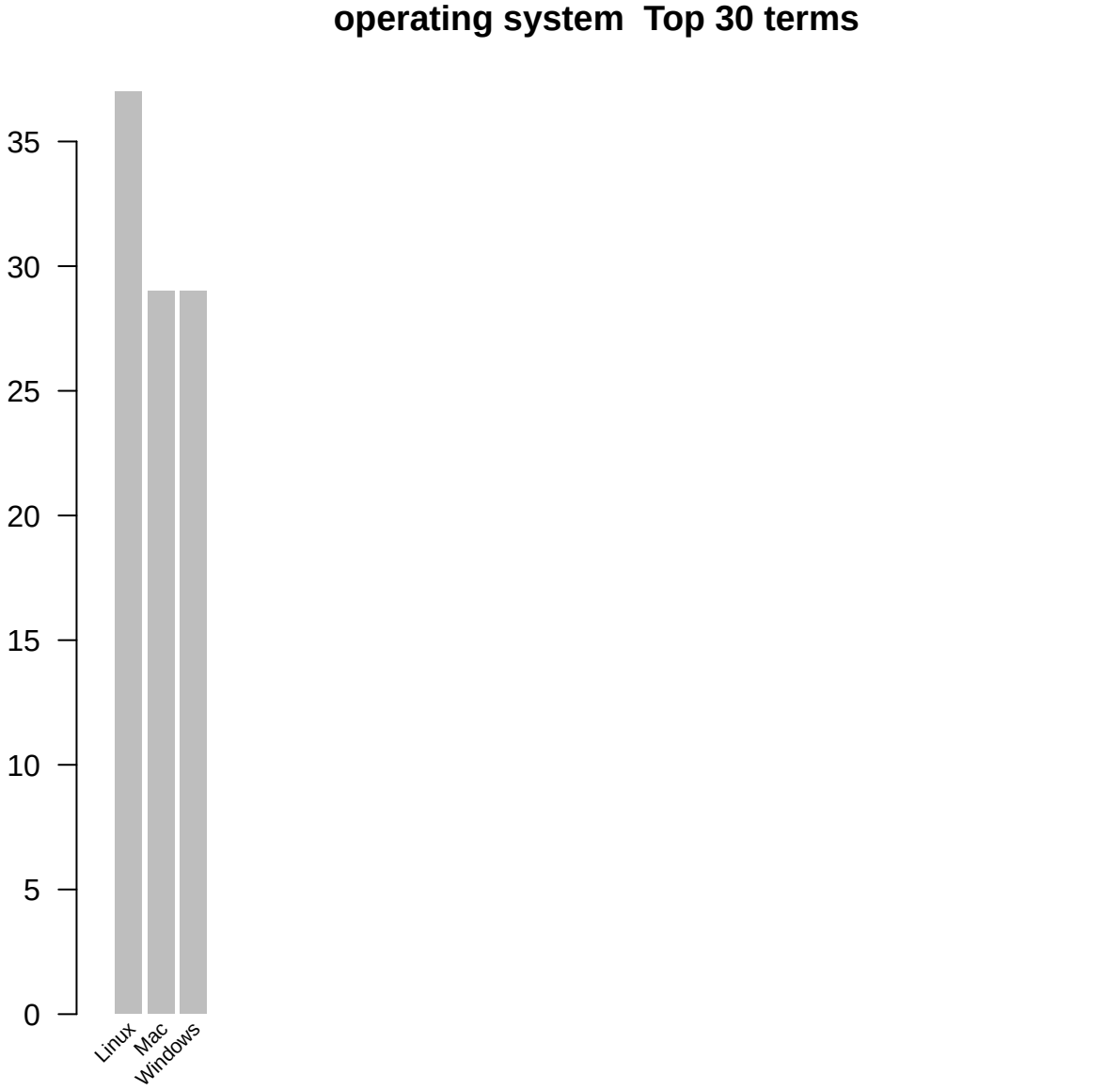
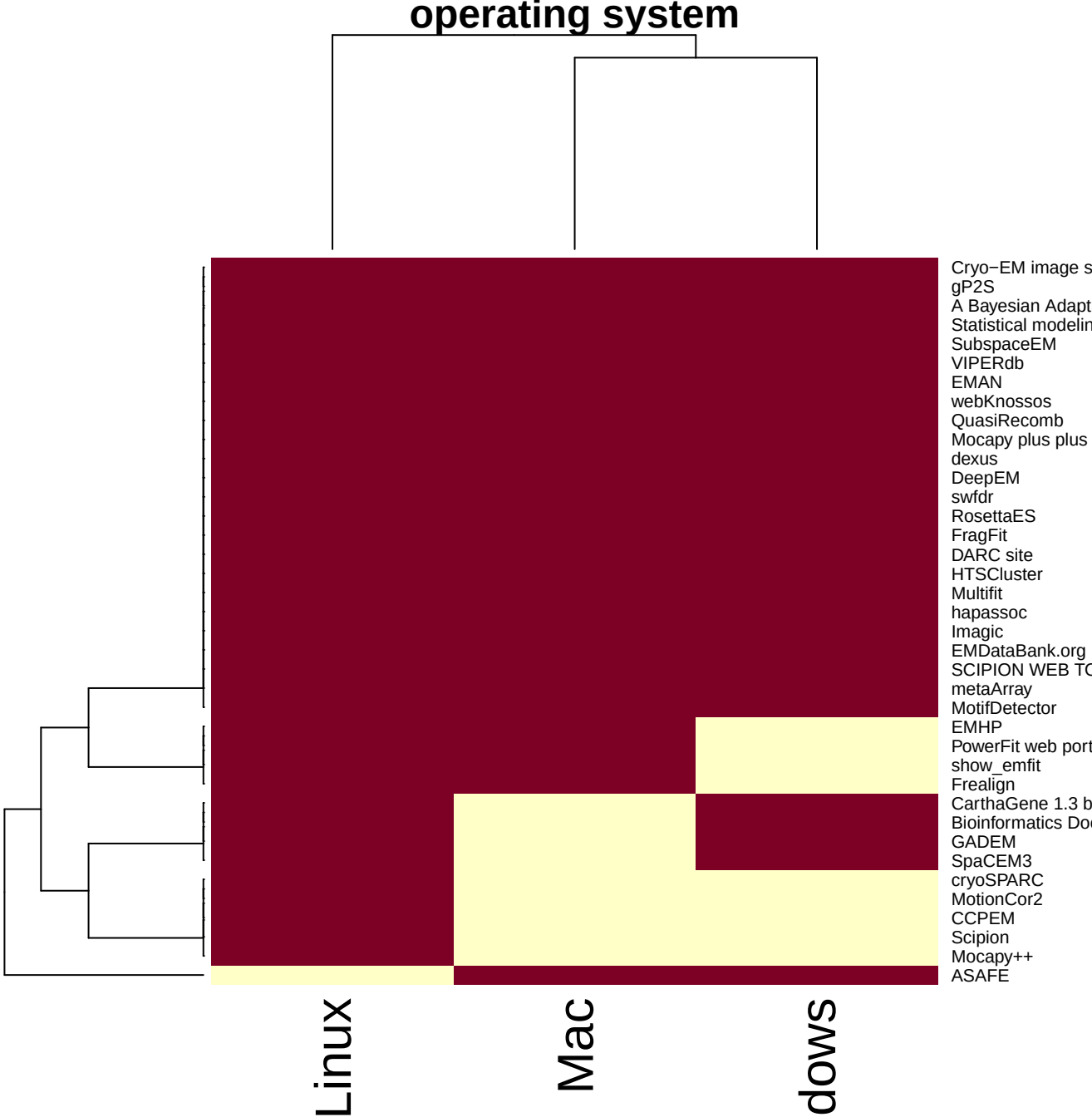
10
15
20
0
1
2
3
completeness


operating system Top 30 terms
35
30
25
20
15
10
5
0
Linux
Mac
Windows


operating system
Cryo−EM image s
gP2S
A Bayesian Adapt
Statistical modelin
SubspaceEM
VIPERdb
EMAN
webKnossos
QuasiRecomb
Mocapy plus plus
dexus
DeepEM
swfdr
RosettaES
FragFit
DARC site
HTSCluster
Multifit
hapassoc
Imagic
EMDataBank.org
SCIPION WEB TO
metaArray
MotifDetector
EMHP
PowerFit web port
show_emfit
Frealign
CarthaGene 1.3 b
Bioinformatics Do
GADEM
SpaCEM3
cryoSPARC
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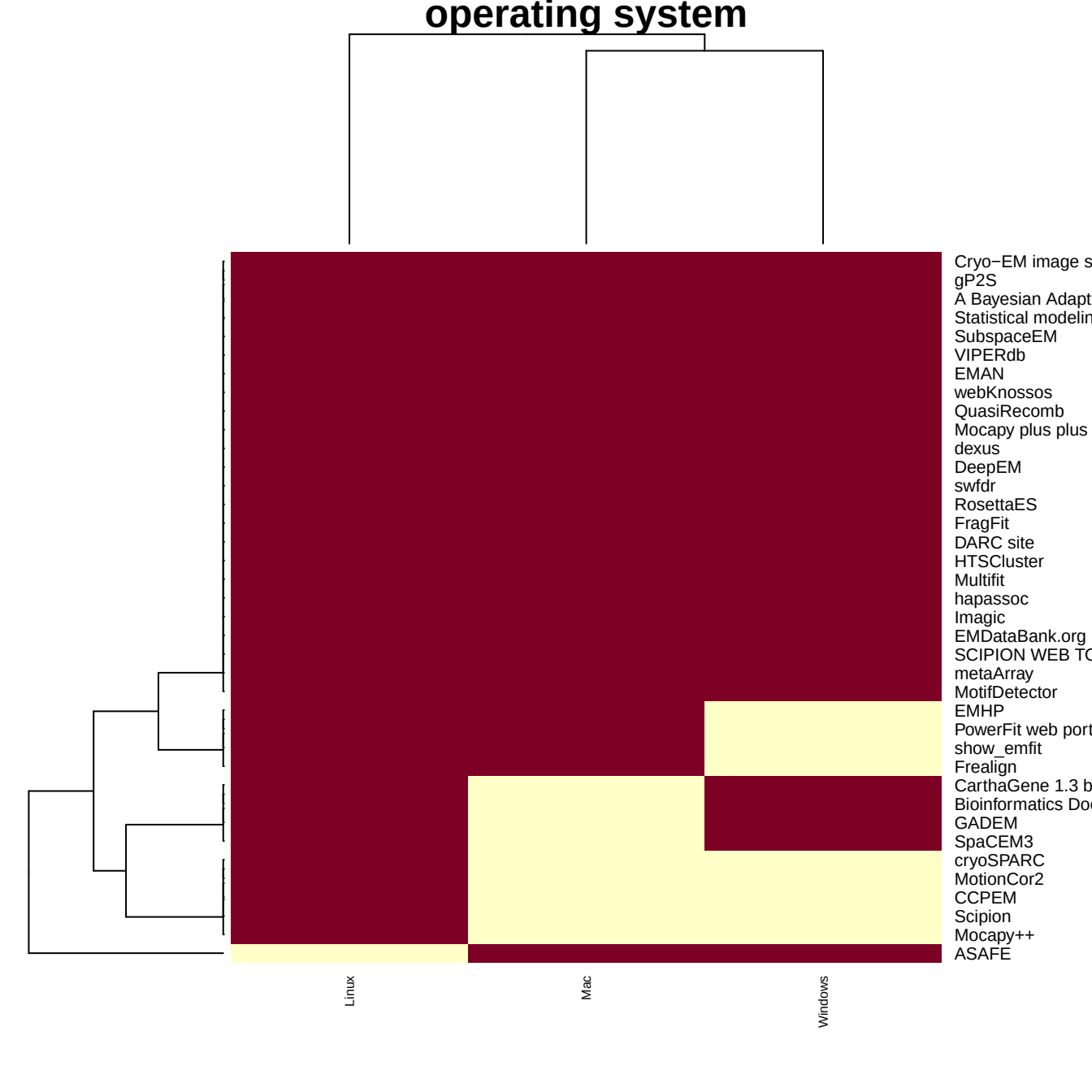
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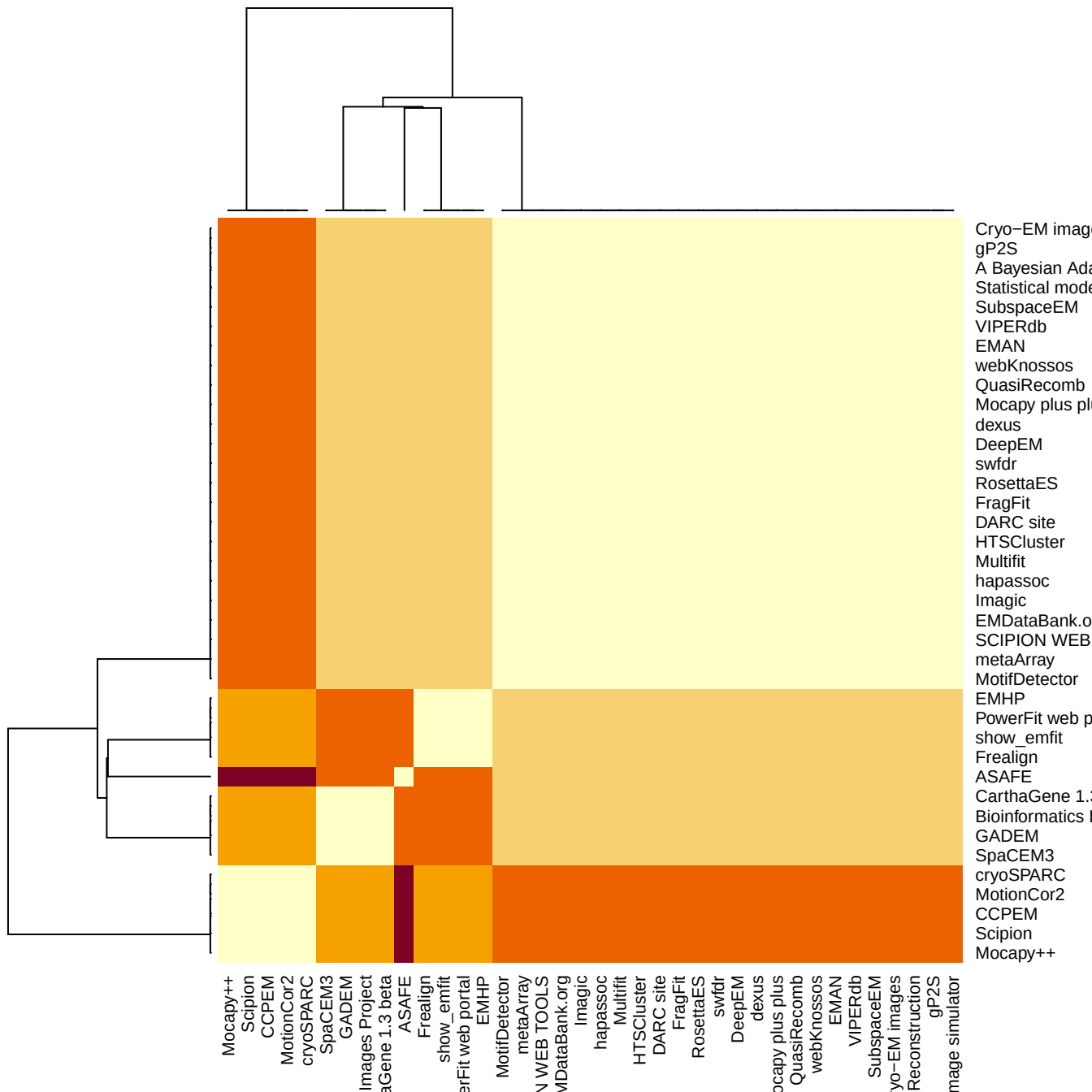
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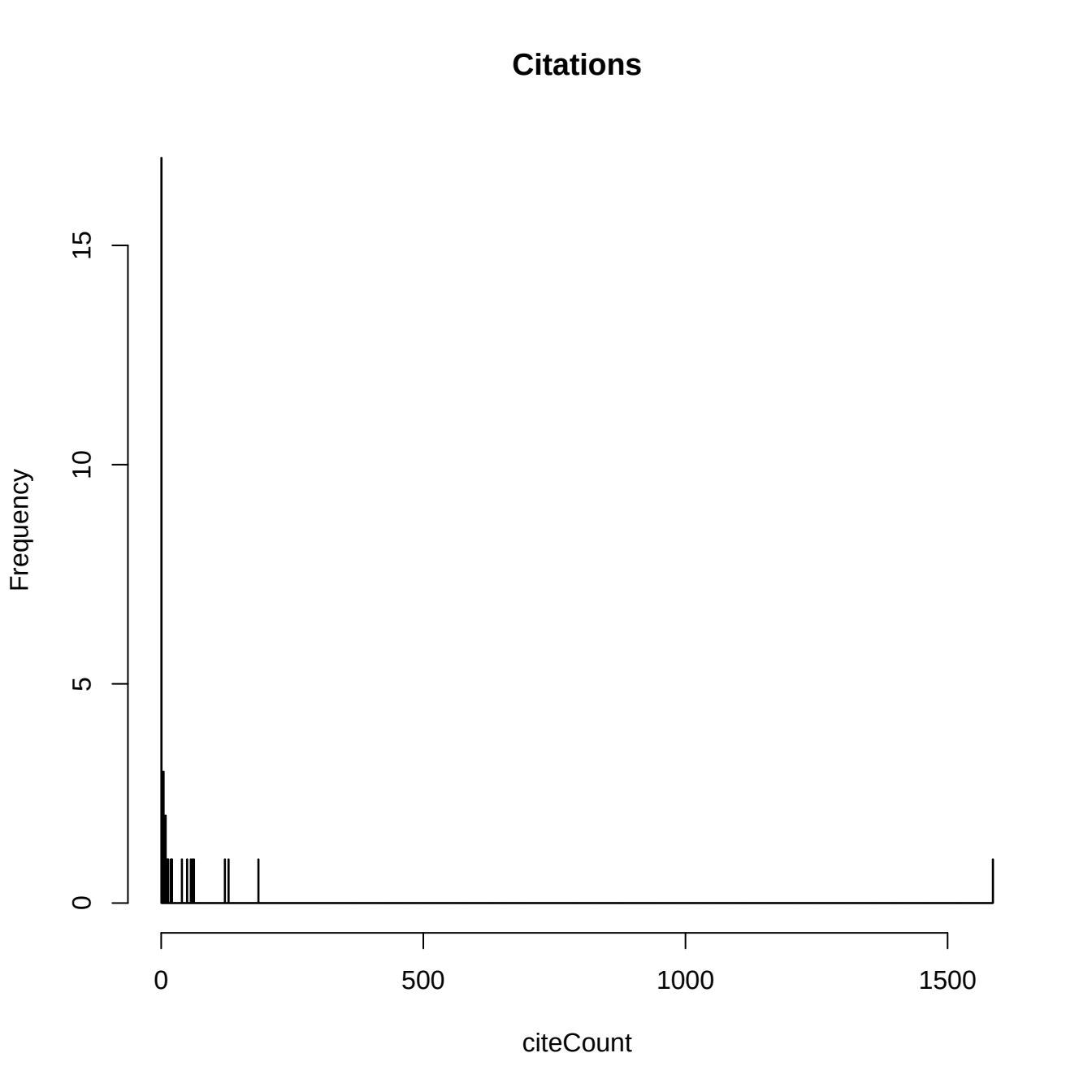
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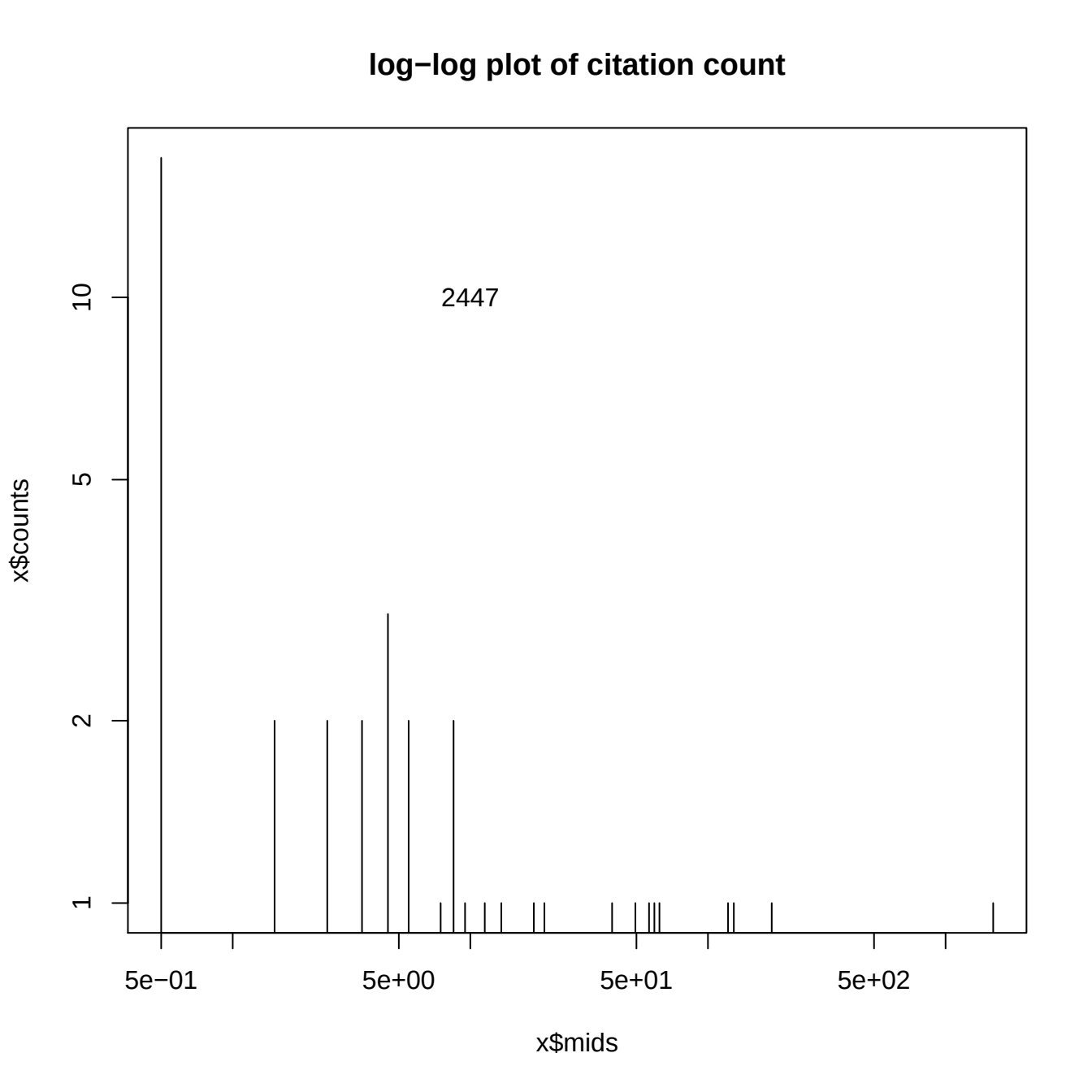
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