MBatch 04-02
Using MBatch Assessments: PCA_Regular_Structures
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2017-11-02-0855

1 Introduction

These instructions are aimed at people familiar with R and familiar with TCGA/GDC platforms and data types. They are intended to introduce the reader to producing the given assessment. These instructions will only rarely, if ever, touch on the appropriateness of the assessment algorithm or interpretation of output. See MBatch_01_InstallLinux.docx for instructions on downloading test data.
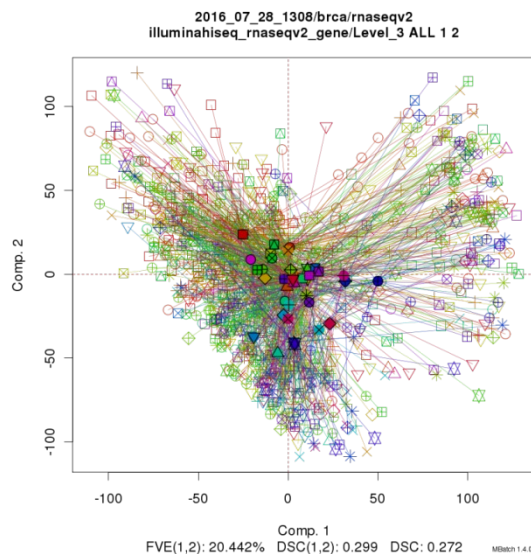
2 Algorithm

PCA_Regular_Structures is a function used to perform batch effects assessments using the PCA-Plus algorithm, which adds centroids to the class PCA diagram. PCA-Plus is performed on each batch type available by default.

3 Output

The primary output method for MBatch is to view results in the Batch Effects Website, described elsewhere. The PNG files are rough versions of the website output.

Graphical output is a PCA-Plus plot, which is a PCA diagram with centroids marked and a DSC value. For information, see http://bioinformatics.mdanderson.org/main/TCGABatchEffects:Overview.

2016_07_28_1308/brca/rnaseqv2
illuminahiseq_rnaseqv2_gene/Level_3 ALL 1 2

FVE(1,2): 20.442%   DSC(1,2): 0.299   DSC: 0.272   MBatch 1.4.04

4 Usage

```
PCA_Regular_Structures(theData, theTitle, theOutputPath,
       theBatchTypeAndValuePairsToRemove, theBatchTypeAndValuePairsToKeep,
       theIsPcaTrendFunction=function(...) {FALSE},
       theDoCentroidsMtoMFlag=TRUE, theDoPlainMtoMFlag=FALSE,
       theDoDSCFlag=TRUE, theDoDscPermsFileFlag=FALSE,
       theDoSampleLocatorFlag=TRUE,
       theListOfComponentsToPlot=c(1, 2, 1, 3, 1, 4, 2, 3, 2, 4, 3, 4),
       theDSCPermutations=2000, theDSCThreads=1, theMinBatchSize=2,
       theJavaParameters="-Xms1200m", theSeed=NULL, theMaxGeneCount=20000)
```

For DCC and GDC data, we usually run with a minimum batch size of 5, a Java parameter of "-Xms4800m", a max gene count of 20,000, and 2000 permutations, with up to 24 threads, depending on the hardware.

5 Arguments

theData   An instance of BEA_DATA BEA_DATA-class. This is the MBatch Data Object (of class BEA_DATA) described in MBatch_03_UserData.docx, and returned from mbatchLoadFiles or mbatchLoadStructures.

theTitle   Object of class "character". Title to use in PNG files.

theOutputPath   Object of class "character". Directory in which to place output PNG files and related data files used by the Batch Effects Website.

theBatchTypeAndValuePairsToRemove   Object of class "list". A list of vectors containing the batch type (or * for all types) and the value to remove. list() or NULL indicates do nothing. This type of list is described in MBatch_03_ParametersBatchTypesValues.docx.

theBatchTypeAndValuePairsToKeep   Object of class "list". A list of vectors containing the batch type (or * for all types) and a vector of the value(s) to keep. list() or NULL indicates do nothing. This type of list is described in MBatch_03_ParametersBatchTypesValues.docx.

theIsPcaTrendFunction   Object of class "function" This function is used by the PCA Centroids algorithm to determine if trending lines should be added. If the function returns true, a line is drawn between the centroids, using the string sorted order. This means, for date or time fields, the batch ids should be formatted such that when sorted as strings, the batch ids are in chronological order from oldest to newest. The function receives arguments theBatchTypeName (a string identifying the batch type) and theListOfBatchIds (a list of strings, which are the batch ids). See below for an example.

theDoCentroidsMtoMFlag Object of class "logical" A flag indicating whether or not to perform the many to many comparison with centroids.

theDoPlainMtoMFlag   Object of class "logical" A flag indicating whether or not to perform the many to many comparison without centroids.

theDoDSCFlag   Object of class "logical" A flag indicating whether or not to perform the DSC calculation for PCA-Plus plots.

theDoDscPermsFileFlag   Object of class "logical" A flag indicating whether or not to write a file documenting the contents and results of the permutations performed if theDoDSCFlag is TRUE.

theDoSampleLocatorFlag   Object of class "logical" A flag indicating whether or not to create the ANY_Scores.txt file, which contains the list of the PCA scores for samples versus components.

theListOfComponentsToPlot   Object of class "vector" A vector of integers. Each pair of integers is used to create a PCA plot of those two components. For instance, theListOfComponentsToPlot = c(1,2,1,4) will create a plot of components 1 and 2, and a plot of components 1 and 4.

theDSCPermutations   Object of class "numeric" The number of permutations to perform for DSC calculations.

theDSCThreads   Object of class "numeric" The number of threads (or CPUs or cores) to use to perform DSC calculations.

theMinBatchSize   Object of class "numeric" Minimum batch to allow in PCA calculations. Batches with fewer samples will be removed.

theJavaParameters Object of class "character" Command line arguments to Java 8 for DSC calculations–for example if memory needs to be more than "-Xms1200m".

theSeed   Object of class "numeric" If non-zero, a seed to use when calling sample to reduce genes used in PCA plots.

theMaxGeneCount   Object of class "numeric" If non-zero, maximum number of genes allowed for PCA plots. If count is greater than this, sample is used to select a subset of genes.

6 Example Call

The following code performs the PCA-Plus assessment and is taken from the tests/PCA_Regular_Structures.R file. Data used is from the testing data as per the MBatch_01_InstallLinux.docx document.

```
library(MBatch)

#used for PCA plotting
isTrendBatch<-function(theBatchTypeName, theListOfBatchIds)
{
  return(is.element(theBatchTypeName, c("ShipDate")))
}

# set the paths
theGeneFile <- "/bea_testing/MATRIX_DATA/matrix_data-Tumor.tsv"
theBatchFile <- "/bea_testing/MATRIX_DATA/batches-Tumor.tsv"
theOutputDir <- "/bea_testing/output/PCA_Regular_Structures"

# make sure the output dir exists and is empty
  unlink(theOutputDir, recursive=TRUE)
  dir.create(theOutputDir, showWarnings=FALSE, recursive=TRUE)

# load the data and reduce the amount of data to reduce run time
  myData <- mbatchLoadFiles(theGeneFile, theBatchFile)
  myData@mData <- mbatchTrimData(myData@mData, 100000)

  # here, we take most defaults
  PCA_Regular_Structures(theData=myData,
                theTitle="Test PCA",
                theOutputPath=theOutputDir,
                theBatchTypeAndValuePairsToRemove=NULL,
                theBatchTypeAndValuePairsToKeep=NULL,
                theDoDscPermsFileFlag = TRUE,
                theIsPcaTrendFunction=isTrendBatch,
                theDSCPermutations=1000,
                theDSCThreads=1,
                theMinBatchSize=2,
                theJavaParameters="-Xms2000m",
                theSeed=theRandomSeed,
                theMaxGeneCount=10000)
```

6.1 Example File Output

The above code creates the following subdirectories and files. The RData and DSCOverview.tsv files are used internally. The subdirectories correspond to the Batch Types on which the PCA-Plus assessment was performed.

```
linux@megazone23:/bea_testing/output/PCA_Regular_Structures$ ls -l
total 24
-rw-r--r-- 1 linux linux   90 Oct  3 15:37 ALL__CompListDSC.RData
drwxr-xr-x 3 linux linux 4096 Oct  3 15:37 BatchId
-rw-r--r-- 1 linux linux  787 Oct  3 15:38 DSCOverview.tsv
drwxr-xr-x 3 linux linux 4096 Oct  3 15:38 PlateId
drwxr-xr-x 3 linux linux 4096 Oct  3 15:38 ShipDate
drwxr-xr-x 3 linux linux 4096 Oct  3 15:38 TSS
```

Looking at the "BatchId" subdirectory, it contains another directory called ManyToMany (a different function provides "DualBatch" comparisons).

The ManyToMany directory contains the following files and a PCA-Plus sub-directory.

```
linux@megazone23:/bea_testing/output/PCA_Regular_Structures$ ls -l
total 24
-rw-r--r-- 1 linux linux   90 Oct  3 15:37 ALL__CompListDSC.RData
drwxr-xr-x 3 linux linux 4096 Oct  3 15:37 BatchId
-rw-r--r-- 1 linux linux  787 Oct  3 15:38 DSCOverview.tsv
drwxr-xr-x 3 linux linux 4096 Oct  3 15:38 PlateId
drwxr-xr-x 3 linux linux 4096 Oct  3 15:38 ShipDate
drwxr-xr-x 3 linux linux 4096 Oct  3 15:38 TSS
```

6.2 Command Line Output

In the future, we plan to make the output from MBatch more user friendly, but currently, this produces the following output at the command line.

```
> library(MBatch)
Loading required package: Cairo
Loading required package: cluster
Loading required package: mclust

    __  _____  __  _____
  / |/ / ____// / //// ___/_  __/
 / /|_/ // // /// /\__ \// /
// ///__//___//_//___/ // /
/_/ /_/\____/_____/\____//____//_/   version 5.3
Type 'citation("mclust")' for citing this R package in publications.
Loading required package: oompaBase
Loading required package: PreProcess
Loading required package: ClassDiscovery
Loading required package: squash
```

```
Attaching package: 'squash'

The following objects are masked from 'package:oompaBase':

    grayscale, greyscale

Loading required package: gtools
Loading required package: rJava
Loading required package: parallel
Loading required package: Vennerable
Loading required package: limma
Loading required package: epiR
Loading required package: survival
Package epiR 0.9-87 is loaded
Type help(epi.about) for summary information


All sorting in this package requires using a Sys.setlocale("LC_COLLATE","C"). MBatch Version: 2017-09-19-1530
Warning messages:
1: replacing previous import 'oompaBase::grayscale' by 'squash::grayscale' when loading 'MBatch'
2: replacing previous import 'oompaBase::greyscale' by 'squash::greyscale' when loading 'MBatch'
>
> #used for PCA plotting
> isTrendBatch<-function(theBatchTypeName, theListOfBatchIds)
+ {
+   return(is.element(theBatchTypeName, c("ShipDate")))
+ }
>
> # set the paths
> theGeneFile <- "/bea_testing/MATRIX_DATA/matrix_data-Tumor.tsv"
> theBatchFile <- "/bea_testing/MATRIX_DATA/batches-Tumor.tsv"
> theOutputDir <- "/bea_testing/output/PCA_Regular_Structures"
>
> # make sure the output dir exists and is empty
>   unlink(theOutputDir, recursive=TRUE)
>   dir.create(theOutputDir, showWarnings=FALSE, recursive=TRUE)
>
> # load the data and reduce the amount of data to reduce run time
>   myData <- mbatchLoadFiles(theGeneFile, theBatchFile)
2017 10 03 15:37:38.566 DEBUG MachineName Changing LC_COLLATE to C for duration of run
2017 10 03 15:37:38.600 INFO MachineName ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨
2017 10 03 15:37:38.601 INFO MachineName Starting mbatchLoadFiles
2017 10 03 15:37:38.601 INFO MachineName MBatch Version: 2017-09-19-1530
2017 10 03 15:37:38.602 INFO MachineName read batch file= /bea_testing/MATRIX_DATA/batches-Tumor.tsv
2017 10 03 15:37:38.606 INFO MachineName read gene file= /bea_testing/MATRIX_DATA/matrix_data-Tumor.tsv
Read 100000 records
2017 10 03 15:37:45.993 INFO MachineName filter samples in batches using gene samples
2017 10 03 15:37:45.994 INFO MachineName sort batches by gene file samples
2017 10 03 15:37:46.126 INFO MachineName Finishing mbatchLoadFiles
2017 10 03 15:37:46.126 INFO MachineName ^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^
>   myData@mData <- mbatchTrimData(myData@mData, 100000)
2017 10 03 15:37:46.127 DEBUG MachineName Changing LC_COLLATE to C for duration of run
2017 10 03 15:37:46.127 INFO MachineName ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨ ∨
2017 10 03 15:37:46.128 INFO MachineName mbatchTrimData Starting
2017 10 03 15:37:46.128 INFO MachineName MBatch Version: 2017-09-19-1530
2017 10 03 15:37:55.362 INFO MachineName mbatchTrimData Finishing
2017 10 03 15:37:55.362 INFO MachineName ^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^
>
>   # here, we take most defaults
> PCA_Regular_Structures(theData=myData,
+               theTitle="Test PCA",
+               theOutputPath=theOutputDir,
+               theBatchTypeAndValuePairsToRemove=NULL,
+               theBatchTypeAndValuePairsToKeep=NULL,
+               theDoDscPermsFileFlag = TRUE,
+               theIsPcaTrendFunction=isTrendBatch,
+               theDSCPermutations=1000,
+               theDSCThreads=1,
+               theMinBatchSize=2,
+               theJavaParameters="-Xms2000m",
```

```
+                theSeed=theRandomSeed,
+                theMaxGeneCount=10000)
2017 10 03 15:37:55.367 DEBUG MachineName Changing LC_COLLATE to C for duration of run
2017 10 03 15:37:55.367 INFO MachineName V V V V V V V V V V V V V
2017 10 03 15:37:55.367 INFO MachineName mbatchFilterData Starting
2017 10 03 15:37:55.368 INFO MachineName MBatch Version: 2017-09-19-1530
2017 10 03 15:37:55.368 DEBUG MachineName rows pre filter  1250
2017 10 03 15:37:55.645 DEBUG MachineName rows post filter  1250
2017 10 03 15:37:55.645 DEBUG MachineName mbatchFilterData Prefilter, gene data had  1250  while post filter  1250
2017 10 03 15:37:55.646 DEBUG MachineName mbatchFilterData Prefilter, batch data had  80  while post filter  80
2017 10 03 15:37:55.647 INFO MachineName mbatchFilterData Finishing
2017 10 03 15:37:55.647 INFO MachineName ^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^
2017 10 03 15:37:55.648 DEBUG MachineName createBatchEffectsOutput_pca
2017 10 03 15:37:55.649 DEBUG MachineName Calling .jinit for PCA
2017 10 03 15:37:55.650 DEBUG MachineName classpath=, /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/DscJava/DscJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/DscJava/commons-lang3-
3.1.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/DscJava/commons-math3-3.3.jar, parameters=, -Xms2000m
2017 10 03 15:37:55.758 DEBUG MachineName Changing LC_COLLATE to C for duration of run
2017 10 03 15:37:55.760 DEBUG MachineName doSamplePcaCall - pre-filter matrix size= 1250,80
2017 10 03 15:37:55.760 DEBUG MachineName filterTheGeneDataOnBatchSize theMinBatchSize= 2
2017 10 03 15:37:55.763 DEBUG MachineName filterBasedOnGeneLimit theGeneLimit= 10000
2017 10 03 15:37:55.763 DEBUG MachineName filterBasedOnGeneLimit theMatrixGeneData nrow= 1250
2017 10 03 15:37:55.763 DEBUG MachineName filterBasedOnGeneLimit theMatrixGeneData ncol= 80
2017 10 03 15:37:55.764 DEBUG MachineName doSamplePcaCall - pre-filter matrix size= 1250,80
2017 10 03 15:37:55.764 DEBUG MachineName doSamplePcaCall - no-NA matrix length= 1247
2017 10 03 15:37:55.811 DEBUG MachineName doSamplePcaCall - max(theCompPairList)= 4
2017 10 03 15:37:55.811 DEBUG MachineName doSamplePcaCall - pca scores size= 80,80
2017 10 03 15:37:55.812 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany
2017 10 03 15:37:55.812 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-
Plus
2017 10 03 15:37:55.813 DEBUG MachineName call pvalueDSC
2017 10 03 15:37:55.814 DEBUG MachineName pvalueDSC start
2017 10 03 15:37:55.814 DEBUG MachineName pvalueDSC component A < 1
2017 10 03 15:37:55.814 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:37:55.815 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:37:55.816 DEBUG MachineName nrow(thePcaDataExcerpt)= 80
2017 10 03 15:37:55.816 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:37:55.817 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:37:55.831 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=80
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=80
matrix[0].length=80
2017 10 03 15:37:55.915 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:37:55.917 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:37:55.918 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:37:55.918 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:37:55.918 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:37:55.941 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:37:55.945 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:37:55.946 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:37:55.946 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:37:55.946 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:37:55.947 DEBUG MachineName write writePcaDataFilesForDataset
2017 10 03 15:37:55.947 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany
2017 10 03 15:37:55.947 DEBUG MachineName writePCAValuesTSV
2017 10 03 15:37:55.948 DEBUG MachineName writePCAValuesTSV outputFile
2017 10 03 15:37:55.948 DEBUG MachineName writePCAValuesTSV components
2017 10 03 15:37:55.949 DEBUG MachineName writePCAValuesTSV myDataFrame
2017 10 03 15:37:55.949 DEBUG MachineName writePCAValuesTSV - values
2017 10 03 15:37:55.949 DEBUG MachineName writePCAValuesTSV - matrix
2017 10 03 15:37:55.951 DEBUG MachineName writePCAValuesTSV - write
2017 10 03 15:37:55.953 DEBUG MachineName writePCAValuesTSV finished
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCAValues.tsv
2017 10 03 15:37:55.954 DEBUG MachineName writePCAAnnotations
2017 10 03 15:37:55.954 DEBUG MachineName writePCAAnnotations - header and all data
2017 10 03 15:37:56.004 DEBUG MachineName write writeSharedFveWeightScoresFiles
2017 10 03 15:37:56.272 DEBUG MachineName createBatchEffectsOutput_pca loop
```

2017 10 03 15:37:56.275 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:37:56.275 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:37:56.275 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:37:56.277 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:37:56.277 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:37:56.278 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:37:56.278 DEBUG MachineName pvalueDSC start
2017 10 03 15:37:56.278 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:37:56.279 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:37:56.341 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:37:56.358 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:37:56.359 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:37:56.359 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:37:56.360 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:37:56.361 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:37:56.362 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:37:56.362 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:37:56.363 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:37:56.363 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:37:56.447 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:37:56.448 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:37:56.448 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:37:56.450 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:37:56.450 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:37:56.507 DEBUG MachineName writePCAAnnotations
2017 10 03 15:37:56.507 DEBUG MachineName writePCAAnnotations - data PC1,PC2
2017 10 03 15:37:56.528 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:37:56.528 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:37:56.626 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:56.738 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:37:56.739 DEBUG MachineName mbatchStandardLegend - theTitle Points: BatchId (80)
2017 10 03 15:37:56.739 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:37:56.739 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
2017 10 03 15:37:56.740 DEBUG MachineName mbatchStandardLegend - theLegendNames 00304 (80)
2017 10 03 15:37:56.740 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:37:56.740 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:37:56.741 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:37:56.741 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:37:56.741 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: BatchId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-
Plus/ALL_Comp1_Comp2_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:37:57.318 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:57.397 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:57.415 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:37:57.417 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:37:57.418 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:37:57.418 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-DSC.png
2017 10 03 15:37:57.419 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE
(%): 42.8449884549022, Second PCA Component: 2, Second Component FVE (%): 3.86069725110343, , Disp. Sep. Crit. (DSC) (1,2): 0, Disp.
within groups (Dw) (1,2): 8.71973243261482, Disp. between groups (Db) (1,2): 0, DSC pvalue(1,2): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within
groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1

```
2017 10 03 15:37:57.419 DEBUG MachineName mbatchStandardLegend - theLegendNames  14
2017 10 03 15:37:57.421 DEBUG MachineName mbatchStandardLegend - theLegendColors  0
2017 10 03 15:37:57.429 DEBUG MachineName mbatchStandardLegend - theLegendSymbols  0
2017 10 03 15:37:57.430 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:37:57.430 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-
Plus/ALL_Comp1_Comp2_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:37:57.694 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:57.696 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit  /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:57.702 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:37:57.704 DEBUG MachineName mbatchStandardCombineLegends - theTitle  Test PCA ALL 1 2
2017 10 03 15:37:57.705 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-ALL.png
2017 10 03 15:37:57.705 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
2017 10 03 15:37:57.705 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 2
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-
Plus/ALL_Comp1_Comp2_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:37:58.170 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:58.373 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids)  80
2017 10 03 15:37:58.374 DEBUG MachineName doInternalPca before filter - length of batch ids for samples  80
2017 10 03 15:37:58.374 DEBUG MachineName doInternalPca - filtering batch size of  2
2017 10 03 15:37:58.376 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids)  80
2017 10 03 15:37:58.376 DEBUG MachineName doInternalPca after filter - length of batch ids for samples  80
2017 10 03 15:37:58.377 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:37:58.377 DEBUG MachineName pvalueDSC start
2017 10 03 15:37:58.377 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:37:58.378 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:37:58.378 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:37:58.378 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:37:58.379 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:37:58.379 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:37:58.380 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:37:58.381 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:37:58.383 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:37:58.383 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:37:58.384 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:37:58.385 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:37:58.386 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:37:58.386 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:37:58.386 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:37:58.387 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:37:58.387 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:37:58.388 DEBUG MachineName writePCAAnnotations
2017 10 03 15:37:58.388 DEBUG MachineName writePCAAnnotations - data  PC1,PC3
2017 10 03 15:37:58.542 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids)  80
2017 10 03 15:37:58.543 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples  80
2017 10 03 15:37:58.632 DEBUG MachineName mbatchStandardLegend - Calling .jinit  /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:58.639 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:37:58.639 DEBUG MachineName mbatchStandardLegend - theTitle  Points: BatchId (80)
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2017 10 03 15:37:58.639 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:37:58.640 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
2017 10 03 15:37:58.640 DEBUG MachineName mbatchStandardLegend - theLegendNames 00304 (80)
2017 10 03 15:37:58.643 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:37:58.645 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:37:58.645 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:37:58.646 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:37:58.646 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: BatchId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:37:58.707 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:58.709 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:58.721 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:37:58.724 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:37:58.724 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:37:58.731 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png
2017 10 03 15:37:58.732 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE (%): 42.8449884549022, Second PCA Component: 3, Second Component FVE (%): 2.78568393481595, , Disp. Sep. Crit. (DSC) (1,3): 0, Disp. within groups (Dw) (1,3): 8.61879828574474, Disp. between groups (Db) (1,3): 0, DSC pvalue(1,3): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:37:58.732 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:37:58.738 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:37:58.738 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:37:58.739 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:37:58.739 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:37:58.995 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:59.011 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:59.017 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:37:59.017 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 3
2017 10 03 15:37:59.020 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-ALL.png
2017 10 03 15:37:59.020 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
2017 10 03 15:37:59.021 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 3
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:37:59.220 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:59.226 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:37:59.226 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:37:59.226 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:37:59.228 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:37:59.229 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:37:59.229 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:37:59.231 DEBUG MachineName pvalueDSC start
2017 10 03 15:37:59.231 DEBUG MachineName pvalueDSC transpose

2017 10 03 15:37:59.232 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:37:59.232 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:37:59.232 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:37:59.233 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:37:59.233 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:37:59.234 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:37:59.237 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:37:59.238 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:37:59.238 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:37:59.238 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:37:59.239 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:37:59.239 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:37:59.240 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:37:59.240 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:37:59.240 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:37:59.241 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:37:59.243 DEBUG MachineName writePCAAnnotations
2017 10 03 15:37:59.244 DEBUG MachineName writePCAAnnotations - data PC1,PC4
2017 10 03 15:37:59.251 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:37:59.252 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:37:59.344 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:59.350 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:37:59.350 DEBUG MachineName mbatchStandardLegend - theTitle Points: BatchId (80)
2017 10 03 15:37:59.351 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:37:59.351 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
2017 10 03 15:37:59.352 DEBUG MachineName mbatchStandardLegend - theLegendNames 00304 (80)
2017 10 03 15:37:59.352 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:37:59.352 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:37:59.353 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:37:59.353 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:37:59.353 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: BatchId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:37:59.390 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:59.392 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:59.401 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:37:59.402 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:37:59.402 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:37:59.403 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png
2017 10 03 15:37:59.403 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE (%): 42.8449884549022, Second PCA Component: 4, Second Component FVE (%): 2.38119857504325, , Disp. Sep. Crit. (DSC) (1,4): 0, Disp. within groups (Dw) (1,4): 8.58051331608968, Disp. between groups (Db) (1,4): 0, DSC pvalue(1,4): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:37:59.403 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:37:59.404 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:37:59.404 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:37:59.404 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:37:59.405 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16

writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:37:59.541 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:59.543 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:59.572 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:37:59.573 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 4
2017 10 03 15:37:59.574 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-ALL.png
2017 10 03 15:37:59.574 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
2017 10 03 15:37:59.575 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:37:59.756 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:59.758 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:37:59.759 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:37:59.759 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:37:59.761 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:37:59.761 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:37:59.762 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:37:59.762 DEBUG MachineName pvalueDSC start
2017 10 03 15:37:59.762 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:37:59.763 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:37:59.763 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:37:59.764 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:37:59.764 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:37:59.764 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:37:59.765 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:37:59.769 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:37:59.770 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:37:59.770 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:37:59.770 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:37:59.771 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:37:59.772 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:37:59.772 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:37:59.772 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:37:59.773 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:37:59.773 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:37:59.774 DEBUG MachineName writePCAAnnotations
2017 10 03 15:37:59.774 DEBUG MachineName writePCAAnnotations - data PC2,PC3
2017 10 03 15:37:59.776 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:37:59.777 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:37:59.860 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:59.867 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:37:59.867 DEBUG MachineName mbatchStandardLegend - theTitle Points: BatchId (80)
2017 10 03 15:37:59.867 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:37:59.868 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
2017 10 03 15:37:59.868 DEBUG MachineName mbatchStandardLegend - theLegendNames 00304 (80)
2017 10 03 15:37:59.868 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:37:59.869 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:37:59.869 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:37:59.869 DEBUG MachineName mbatchStandardLegend - myColors #b30000

2017 10 03 15:37:59.870 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: BatchId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-
Plus/ALL_Comp2_Comp3_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:37:59.908 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:37:59.909 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:37:59.917 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:37:59.917 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:37:59.918 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:37:59.918 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png
2017 10 03 15:37:59.919 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 2, First Component FVE
(%): 3.86069725110343, Second PCA Component: 3, Second Component FVE (%): 2.78568393481595, , Disp. Sep. Crit. (DSC) (2,3): 0, Disp.
within groups (Dw) (2,3): 3.28935619980036, Disp. between groups (Db) (2,3): 0, DSC pvalue(2,3): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within
groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:37:59.919 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:37:59.919 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:37:59.920 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:37:59.920 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:37:59.920 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-
Plus/ALL_Comp2_Comp3_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:00.081 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:00.083 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:00.089 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:00.089 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 2 3
2017 10 03 15:38:00.090 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-ALL.png
2017 10 03 15:38:00.090 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
2017 10 03 15:38:00.090 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 2 3
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-
Plus/ALL_Comp2_Comp3_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:00.276 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:00.277 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:00.277 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:00.277 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:00.279 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:00.280 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:00.280 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:00.280 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:00.281 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:00.281 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:00.281 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:00.282 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:00.282 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:00.282 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:00.283 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2

Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:00.284 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:00.285 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:00.285 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:00.287 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:00.288 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:00.288 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:00.288 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:00.289 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:00.289 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:00.289 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:00.290 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:00.290 DEBUG MachineName writePCAAnnotations - data PC2,PC4
2017 10 03 15:38:00.293 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:00.293 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:00.378 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:00.385 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:00.385 DEBUG MachineName mbatchStandardLegend - theTitle Points: BatchId (80)
2017 10 03 15:38:00.385 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:00.386 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
2017 10 03 15:38:00.387 DEBUG MachineName mbatchStandardLegend - theLegendNames 00304 (80)
2017 10 03 15:38:00.387 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:00.387 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:00.388 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:00.388 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:00.388 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: BatchId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:00.415 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:00.417 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:00.429 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:00.429 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:00.429 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:00.430 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png
2017 10 03 15:38:00.430 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 2, First Component FVE (%): 3.86069725110343, Second PCA Component: 4, Second Component FVE (%): 2.38119857504325, , Disp. Sep. Crit. (DSC) (2,4): 0, Disp. within groups (Dw) (2,4): 3.18769338023607, Disp. between groups (Db) (2,4): 0, DSC pvalue(2,4): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:00.431 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:00.431 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:00.431 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:00.432 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:00.432 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:00.563 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:00.565 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar

2017 10 03 15:38:00.572 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:00.572 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 2 4
2017 10 03 15:38:00.572 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-ALL.png
2017 10 03 15:38:00.573 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
2017 10 03 15:38:00.573 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 2 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:00.791 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:00.792 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:00.792 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:00.793 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:00.795 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:00.795 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:00.795 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:00.796 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:00.796 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:00.796 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:00.797 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:00.797 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:00.797 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:00.797 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:00.798 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:00.800 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:00.801 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:00.803 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:00.803 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:00.804 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:00.804 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:00.805 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:00.805 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:00.805 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:00.806 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:00.806 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:00.807 DEBUG MachineName writePCAAnnotations - data PC3,PC4
2017 10 03 15:38:00.809 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:00.809 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:00.899 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:00.908 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:00.909 DEBUG MachineName mbatchStandardLegend - theTitle Points: BatchId (80)
2017 10 03 15:38:00.909 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:00.910 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
2017 10 03 15:38:00.912 DEBUG MachineName mbatchStandardLegend - theLegendNames 00304 (80)
2017 10 03 15:38:00.913 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:00.913 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:00.913 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:00.914 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:00.914 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: BatchId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null

writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:00.946 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:00.948 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:00.963 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:00.964 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:00.964 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:00.965 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png
2017 10 03 15:38:00.966 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 3, First Component FVE (%): 2.78568393481595, Second PCA Component: 4, Second Component FVE (%): 2.38119857504325, , Disp. Sep. Crit. (DSC) (3,4): 0, Disp. within groups (Dw) (3,4): 2.90023090121504, Disp. between groups (Db) (3,4): 0, DSC pvalue(3,4): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:00.967 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:00.977 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:00.977 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:00.978 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:00.979 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:01.160 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:01.163 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:01.170 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:01.172 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 3 4
2017 10 03 15:38:01.173 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-ALL.png
2017 10 03 15:38:01.173 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
2017 10 03 15:38:01.173 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 3 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:01.369 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:01.370 DEBUG MachineName doSamplePcaCall - pre-filter matrix size= 1250,80
2017 10 03 15:38:01.371 DEBUG MachineName filterTheGeneDataOnBatchSize theMinBatchSize= 2
2017 10 03 15:38:01.372 DEBUG MachineName filterBasedOnGeneLimit theGeneLimit= 10000
2017 10 03 15:38:01.373 DEBUG MachineName filterBasedOnGeneLimit theMatrixGeneData nrow= 1250
2017 10 03 15:38:01.373 DEBUG MachineName filterBasedOnGeneLimit theMatrixGeneData ncol= 80
2017 10 03 15:38:01.374 DEBUG MachineName doSamplePcaCall - pre-filter matrix size= 1250,80
2017 10 03 15:38:01.374 DEBUG MachineName doSamplePcaCall - no-NA matrix length= 1247
2017 10 03 15:38:01.468 DEBUG MachineName doSamplePcaCall - max(theCompPairList)= 4
2017 10 03 15:38:01.468 DEBUG MachineName doSamplePcaCall - pca scores size= 80,80
2017 10 03 15:38:01.469 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany
2017 10 03 15:38:01.469 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus
2017 10 03 15:38:01.470 DEBUG MachineName call pvalueDSC
2017 10 03 15:38:01.470 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:01.470 DEBUG MachineName pvalueDSC component A < 1
2017 10 03 15:38:01.471 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:01.471 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:01.471 DEBUG MachineName nrow(thePcaDataExcerpt)= 80
2017 10 03 15:38:01.472 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:01.472 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:01.473 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=80
Number of Samples theDim[1]=80

```
theBatchIds.length=80
matrix.length=80
matrix[0].length=80
2017 10 03 15:38:01.477 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:01.478 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:01.480 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:01.481 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:01.481 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:01.519 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:01.520 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:01.520 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:01.520 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:01.521 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:01.521 DEBUG MachineName write writePcaDataFilesForDataset
2017 10 03 15:38:01.521 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany
2017 10 03 15:38:01.533 DEBUG MachineName writePCAValuesTSV
2017 10 03 15:38:01.533 DEBUG MachineName writePCAValuesTSV outputFile
2017 10 03 15:38:01.534 DEBUG MachineName writePCAValuesTSV components
2017 10 03 15:38:01.534 DEBUG MachineName writePCAValuesTSV myDataFrame
2017 10 03 15:38:01.539 DEBUG MachineName writePCAValuesTSV - values
2017 10 03 15:38:01.540 DEBUG MachineName writePCAValuesTSV - matrix
2017 10 03 15:38:01.552 DEBUG MachineName writePCAValuesTSV - write
2017 10 03 15:38:01.554 DEBUG MachineName writePCAValuesTSV finished
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCAValues.tsv
2017 10 03 15:38:01.555 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:01.555 DEBUG MachineName writePCAAnnotations - header and all data
2017 10 03 15:38:01.562 DEBUG MachineName write writeSharedFveWeightScoresFiles
2017 10 03 15:38:01.830 DEBUG MachineName createBatchEffectsOutput_pca loop
2017 10 03 15:38:01.831 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids)  80
2017 10 03 15:38:01.832 DEBUG MachineName doInternalPca before filter - length of batch ids for samples  80
2017 10 03 15:38:01.833 DEBUG MachineName doInternalPca - filtering batch size of  2
2017 10 03 15:38:01.835 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids)  80
2017 10 03 15:38:01.835 DEBUG MachineName doInternalPca after filter - length of batch ids for samples  80
2017 10 03 15:38:01.835 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:01.836 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:01.836 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:01.836 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:01.837 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:01.837 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:01.837 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:01.838 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:01.838 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:01.839 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:01.840 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:01.841 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:01.843 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:01.843 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:01.844 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:01.844 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:01.844 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:01.845 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:01.845 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:01.846 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:01.846 DEBUG MachineName writePCAAnnotations - data PC1,PC2
2017 10 03 15:38:01.848 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids)  80
2017 10 03 15:38:01.848 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples  80
2017 10 03 15:38:01.943 DEBUG MachineName mbatchStandardLegend - Calling .jinit  /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:01.949 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:01.949 DEBUG MachineName mbatchStandardLegend - theTitle  Points: PlateId (80)
2017 10 03 15:38:01.950 DEBUG MachineName mbatchStandardLegend - theVersion  MBatch 1.4.16
2017 10 03 15:38:01.950 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
```

2017 10 03 15:38:01.951 DEBUG MachineName mbatchStandardLegend - theLegendNames A29J (80)
2017 10 03 15:38:01.951 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:01.951 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:01.952 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:01.952 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:01.952 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: PlateId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-
Plus/ALL_Comp1_Comp2_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:01.988 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:01.991 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:01.998 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:01.998 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:01.999 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:01.999 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-DSC.png
2017 10 03 15:38:02.000 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE
(%): 42.8449884549022, Second PCA Component: 2, Second Component FVE (%): 3.86069725110343, , Disp. Sep. Crit. (DSC) (1,2): 0, Disp.
within groups (Dw) (1,2): 8.71973243261482, Disp. between groups (Db) (1,2): 0, DSC pvalue(1,2): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within
groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:02.000 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:02.000 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:02.001 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:02.001 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:02.001 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-
Plus/ALL_Comp1_Comp2_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:02.147 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:02.149 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:02.159 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:02.160 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 2
2017 10 03 15:38:02.160 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-ALL.png
2017 10 03 15:38:02.161 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
2017 10 03 15:38:02.161 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 2
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-
Plus/ALL_Comp1_Comp2_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:02.350 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:02.351 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:02.352 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:02.352 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:02.354 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:02.355 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:02.355 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:02.355 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:02.356 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:02.356 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:02.356 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:02.357 DEBUG MachineName nrow(thePcaDataExcerpt)= 2

2017 10 03 15:38:02.357 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:02.357 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:02.358 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:02.363 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:02.364 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:02.364 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:02.365 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:02.365 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:02.366 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:02.366 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:02.366 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:02.367 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:02.367 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:02.368 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:02.368 DEBUG MachineName writePCAAnnotations - data PC1,PC3
2017 10 03 15:38:02.371 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:02.371 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:02.465 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:02.471 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:02.472 DEBUG MachineName mbatchStandardLegend - theTitle Points: PlateId (80)
2017 10 03 15:38:02.472 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:02.473 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
2017 10 03 15:38:02.473 DEBUG MachineName mbatchStandardLegend - theLegendNames A29J (80)
2017 10 03 15:38:02.473 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:02.474 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:02.474 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:02.474 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:02.475 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: PlateId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:02.503 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:02.507 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:02.518 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:02.518 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:02.518 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:02.519 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png
2017 10 03 15:38:02.519 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE (%): 42.8449884549022, Second PCA Component: 3, Second Component FVE (%): 2.78568393481595, , Disp. Sep. Crit. (DSC) (1,3): 0, Disp. within groups (Dw) (1,3): 8.61879828574474, Disp. between groups (Db) (1,3): 0, DSC pvalue(1,3): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:02.520 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:02.520 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:02.520 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:02.521 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:02.521 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png
writeLegendWithSymbols write

writeLegendWithSymbols done
2017 10 03 15:38:02.654 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:02.657 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:02.669 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:02.670 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 3
2017 10 03 15:38:02.670 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-ALL.png
2017 10 03 15:38:02.671 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
2017 10 03 15:38:02.671 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 3
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:02.875 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:02.877 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:02.877 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:02.878 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:02.880 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:02.881 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:02.881 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:02.882 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:02.882 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:02.882 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:02.883 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:02.883 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:02.883 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:02.884 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:02.884 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:02.887 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:02.888 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:02.888 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:02.889 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:02.889 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:02.890 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:02.890 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:02.890 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:02.891 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:02.891 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:02.892 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:02.892 DEBUG MachineName writePCAAnnotations - data PC1,PC4
2017 10 03 15:38:02.895 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:02.895 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:03.011 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:03.020 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:03.021 DEBUG MachineName mbatchStandardLegend - theTitle Points: PlateId (80)
2017 10 03 15:38:03.021 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:03.025 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
2017 10 03 15:38:03.025 DEBUG MachineName mbatchStandardLegend - theLegendNames A29J (80)
2017 10 03 15:38:03.026 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:03.026 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:03.027 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:03.027 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:03.028 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: PlateId (80)

writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:03.066 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:03.069 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:03.077 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:03.078 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:03.078 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:03.079 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png
2017 10 03 15:38:03.080 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE (%): 42.8449884549022, Second PCA Component: 4, Second Component FVE (%): 2.38119857504325, , Disp. Sep. Crit. (DSC) (1,4): 0, Disp. within groups (Dw) (1,4): 8.58051331608968, Disp. between groups (Db) (1,4): 0, DSC pvalue(1,4): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:03.080 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:03.080 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:03.081 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:03.081 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:03.081 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:03.226 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:03.228 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:03.235 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:03.236 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 4
2017 10 03 15:38:03.238 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-ALL.png
2017 10 03 15:38:03.238 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
2017 10 03 15:38:03.238 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:03.413 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:03.417 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:03.418 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:03.419 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:03.421 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:03.422 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:03.422 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:03.422 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:03.423 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:03.425 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:03.425 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:03.425 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:03.426 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:03.426 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:03.427 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2

matrix[0].length=80
2017 10 03 15:38:03.428 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:03.429 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:03.429 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:03.429 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:03.430 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:03.430 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:03.431 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:03.431 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:03.432 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:03.432 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:03.433 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:03.433 DEBUG MachineName writePCAAnnotations - data PC2,PC3
2017 10 03 15:38:03.438 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:03.444 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:03.535 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:03.542 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:03.542 DEBUG MachineName mbatchStandardLegend - theTitle Points: PlateId (80)
2017 10 03 15:38:03.543 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:03.543 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
2017 10 03 15:38:03.544 DEBUG MachineName mbatchStandardLegend - theLegendNames A29J (80)
2017 10 03 15:38:03.544 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:03.544 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:03.545 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:03.545 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:03.547 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: PlateId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:03.581 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:03.584 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:03.590 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:03.590 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:03.591 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:03.591 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png
2017 10 03 15:38:03.592 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 2, First Component FVE
(%): 3.86069725110343, Second PCA Component: 3, Second Component FVE (%): 2.78568393481595, , Disp. Sep. Crit. (DSC) (2,3): 0, Disp.
within groups (Dw) (2,3): 3.28935619980036, Disp. between groups (Db) (2,3): 0, DSC pvalue(2,3): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within
groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:03.592 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:03.592 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:03.592 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:03.593 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:03.593 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:03.743 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:03.745 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:03.751 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:03.752 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 2 3

2017 10 03 15:38:03.752 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-ALL.png
2017 10 03 15:38:03.754 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
2017 10 03 15:38:03.754 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 2 3
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:03.962 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:03.963 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:03.964 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:03.964 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:03.968 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:03.968 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:03.968 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:03.969 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:03.969 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:03.969 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:03.970 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:03.970 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:03.970 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:03.971 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:03.971 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:03.974 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:03.975 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:03.975 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:03.976 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:03.976 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:03.976 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:03.977 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:03.977 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:03.978 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:03.978 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:03.979 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:03.979 DEBUG MachineName writePCAAnnotations - data PC2,PC4
2017 10 03 15:38:03.982 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:03.982 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:04.066 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:04.073 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:04.074 DEBUG MachineName mbatchStandardLegend - theTitle Points: PlateId (80)
2017 10 03 15:38:04.074 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:04.075 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
2017 10 03 15:38:04.075 DEBUG MachineName mbatchStandardLegend - theLegendNames A29J (80)
2017 10 03 15:38:04.075 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:04.076 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:04.076 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:04.083 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:04.089 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: PlateId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done

2017 10 03 15:38:04.151 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:04.154 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:04.175 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:04.176 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:04.176 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:04.177 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png
2017 10 03 15:38:04.177 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 2, First Component FVE (%): 3.86069725110343, Second PCA Component: 4, Second Component FVE (%): 2.38119857504325, , Disp. Sep. Crit. (DSC) (2,4): 0, Disp. within groups (Dw) (2,4): 3.18769338023607, Disp. between groups (Db) (2,4): 0, DSC pvalue(2,4): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:04.178 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:04.178 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:04.178 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:04.179 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:04.179 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:04.314 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:04.317 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:04.323 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:04.324 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 2 4
2017 10 03 15:38:04.326 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-ALL.png
2017 10 03 15:38:04.326 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
2017 10 03 15:38:04.326 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 2 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:04.510 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:04.511 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:04.511 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:04.512 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:04.514 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:04.514 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:04.514 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:04.515 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:04.515 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:04.516 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:04.516 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:04.516 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:04.517 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:04.517 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:04.517 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:04.518 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:04.519 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:04.522 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:04.522 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:04.523 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:04.523 DEBUG MachineName openAndWriteDscPermsFile -- start

2017 10 03 15:38:04.524 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:04.524 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:04.525 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:04.525 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:04.526 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:04.526 DEBUG MachineName writePCAAnnotations - data PC3,PC4
2017 10 03 15:38:04.529 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:04.529 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:04.613 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:04.644 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:04.645 DEBUG MachineName mbatchStandardLegend - theTitle Points: PlateId (80)
2017 10 03 15:38:04.645 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:04.647 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
2017 10 03 15:38:04.647 DEBUG MachineName mbatchStandardLegend - theLegendNames A29J (80)
2017 10 03 15:38:04.649 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:04.650 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:04.650 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:04.651 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:04.651 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: PlateId (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:04.674 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:04.681 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:04.690 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:04.693 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:04.694 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:04.695 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png
2017 10 03 15:38:04.695 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 3, First Component FVE (%): 2.78568393481595, Second PCA Component: 4, Second Component FVE (%): 2.38119857504325, , Disp. Sep. Crit. (DSC) (3,4): 0, Disp. within groups (Dw) (3,4): 2.90023090121504, Disp. between groups (Db) (3,4): 0, DSC pvalue(3,4): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:04.696 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:04.696 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:04.696 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:04.697 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:04.697 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:04.830 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:04.832 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:04.841 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:04.843 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 3 4
2017 10 03 15:38:04.843 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-ALL.png
2017 10 03 15:38:04.843 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
2017 10 03 15:38:04.844 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 3 4

combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/PlateId/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:05.039 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:05.040 DEBUG MachineName doSamplePcaCall - pre-filter matrix size= 1250,80
2017 10 03 15:38:05.041 DEBUG MachineName filterTheGeneDataOnBatchSize theMinBatchSize= 2
2017 10 03 15:38:05.043 DEBUG MachineName filterBasedOnGeneLimit theGeneLimit= 10000
2017 10 03 15:38:05.043 DEBUG MachineName filterBasedOnGeneLimit theMatrixGeneData nrow= 1250
2017 10 03 15:38:05.043 DEBUG MachineName filterBasedOnGeneLimit theMatrixGeneData ncol= 80
2017 10 03 15:38:05.044 DEBUG MachineName doSamplePcaCall - pre-filter matrix size= 1250,80
2017 10 03 15:38:05.044 DEBUG MachineName doSamplePcaCall - no-NA matrix length= 1247
2017 10 03 15:38:05.091 DEBUG MachineName doSamplePcaCall - max(theCompPairList)= 4
2017 10 03 15:38:05.091 DEBUG MachineName doSamplePcaCall - pca scores size= 80,80
2017 10 03 15:38:05.092 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany
2017 10 03 15:38:05.092 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus
2017 10 03 15:38:05.093 DEBUG MachineName call pvalueDSC
2017 10 03 15:38:05.093 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:05.094 DEBUG MachineName pvalueDSC component A < 1
2017 10 03 15:38:05.094 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:05.094 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:05.095 DEBUG MachineName nrow(thePcaDataExcerpt)= 80
2017 10 03 15:38:05.095 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:05.095 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:05.096 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=80
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=80
matrix[0].length=80
2017 10 03 15:38:05.113 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:05.114 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:05.115 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:05.115 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:05.116 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:05.122 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:05.122 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:05.123 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:05.123 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:05.123 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:05.132 DEBUG MachineName write writePcaDataFilesForDataset
2017 10 03 15:38:05.133 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany
2017 10 03 15:38:05.133 DEBUG MachineName writePCAValuesTSV
2017 10 03 15:38:05.134 DEBUG MachineName writePCAValuesTSV outputFile
2017 10 03 15:38:05.134 DEBUG MachineName writePCAValuesTSV components
2017 10 03 15:38:05.134 DEBUG MachineName writePCAValuesTSV myDataFrame
2017 10 03 15:38:05.135 DEBUG MachineName writePCAValuesTSV - values
2017 10 03 15:38:05.135 DEBUG MachineName writePCAValuesTSV - matrix
2017 10 03 15:38:05.137 DEBUG MachineName writePCAValuesTSV - write
2017 10 03 15:38:05.139 DEBUG MachineName writePCAValuesTSV finished
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCAValues.tsv
2017 10 03 15:38:05.139 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:05.140 DEBUG MachineName writePCAAnnotations - header and all data
2017 10 03 15:38:05.154 DEBUG MachineName write writeSharedFveWeightScoresFiles
2017 10 03 15:38:05.363 DEBUG MachineName createBatchEffectsOutput_pca loop
2017 10 03 15:38:05.364 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:05.365 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:05.365 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:05.367 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:05.367 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:05.368 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:05.368 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:05.368 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:05.369 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:05.369 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:05.369 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:05.370 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:05.370 DEBUG MachineName length(theBatchIdsForSamples)= 80

2017 10 03 15:38:05.371 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:05.372 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:05.373 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:05.373 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:05.373 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:05.375 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:05.376 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:05.377 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:05.377 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:05.378 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:05.378 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:05.379 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:05.379 DEBUG MachineName writePCAAnnotations - data PC1,PC2
2017 10 03 15:38:05.381 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:05.382 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:05.473 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:05.479 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:05.480 DEBUG MachineName mbatchStandardLegend - theTitle Points: ShipDate (80)
2017 10 03 15:38:05.480 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:05.481 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
2017 10 03 15:38:05.481 DEBUG MachineName mbatchStandardLegend - theLegendNames 2013-05-08 (80)
2017 10 03 15:38:05.481 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:05.482 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:05.482 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:05.482 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:05.483 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: ShipDate (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:05.513 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:05.520 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:05.527 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:05.528 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:05.528 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:05.529 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-DSC.png
2017 10 03 15:38:05.530 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE
(%): 42.8449884549022, Second PCA Component: 2, Second Component FVE (%): 3.86069725110343, , Disp. Sep. Crit. (DSC) (1,2): 0, Disp.
within groups (Dw) (1,2): 8.71973243261482, Disp. between groups (Db) (1,2): 0, DSC pvalue(1,2): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within
groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:05.530 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:05.531 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:05.531 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:05.531 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:05.532 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:05.668 DEBUG MachineName mbatchStandardLegend after java

2017 10 03 15:38:05.671 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:05.681 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:05.682 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 2
2017 10 03 15:38:05.682 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-ALL.png
2017 10 03 15:38:05.682 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
2017 10 03 15:38:05.683 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 2
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:05.934 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:05.936 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:05.936 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:05.936 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:05.972 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:05.974 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:05.978 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:05.979 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:05.980 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:05.981 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:05.981 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:05.982 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:05.982 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:05.983 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:05.984 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:05.985 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:05.986 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:05.987 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:05.988 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:05.989 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:05.989 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:05.990 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:05.990 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:05.991 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:05.991 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:05.992 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:05.992 DEBUG MachineName writePCAAnnotations - data PC1,PC3
2017 10 03 15:38:05.995 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:05.995 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:06.093 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:06.101 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:06.102 DEBUG MachineName mbatchStandardLegend - theTitle Points: ShipDate (80)
2017 10 03 15:38:06.102 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:06.107 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
2017 10 03 15:38:06.107 DEBUG MachineName mbatchStandardLegend - theLegendNames 2013-05-08 (80)
2017 10 03 15:38:06.108 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:06.108 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:06.109 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:06.109 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:06.110 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: ShipDate (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16

writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:06.151 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:06.157 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:06.179 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:06.180 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:06.180 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:06.181 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png
2017 10 03 15:38:06.182 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE (%): 42.8449884549022, Second PCA Component: 3, Second Component FVE (%): 2.78568393481595, , Disp. Sep. Crit. (DSC) (1,3): 0, Disp. within groups (Dw) (1,3): 8.61879828574474, Disp. between groups (Db) (1,3): 0, DSC pvalue(1,3): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:06.182 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:06.183 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:06.190 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:06.192 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:06.192 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:06.320 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:06.322 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:06.328 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:06.328 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 3
2017 10 03 15:38:06.329 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-ALL.png
2017 10 03 15:38:06.329 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
2017 10 03 15:38:06.330 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 3
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:06.518 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:06.519 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:06.520 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:06.520 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:06.522 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:06.522 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:06.523 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:06.523 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:06.523 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:06.524 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:06.524 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:06.524 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:06.525 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:06.525 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:06.526 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80

2017 10 03 15:38:06.527 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:06.528 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:06.530 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:06.530 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:06.531 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:06.531 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:06.532 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:06.532 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:06.532 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:06.533 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:06.533 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:06.534 DEBUG MachineName writePCAAnnotations - data PC1,PC4
2017 10 03 15:38:06.536 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:06.537 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:06.624 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:06.631 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:06.631 DEBUG MachineName mbatchStandardLegend - theTitle Points: ShipDate (80)
2017 10 03 15:38:06.632 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:06.633 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
2017 10 03 15:38:06.633 DEBUG MachineName mbatchStandardLegend - theLegendNames 2013-05-08 (80)
2017 10 03 15:38:06.633 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:06.634 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:06.634 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:06.634 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:06.636 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: ShipDate (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:06.663 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:06.671 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:06.679 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:06.680 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:06.680 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:06.681 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png
2017 10 03 15:38:06.682 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE (%): 42.8449884549022, Second PCA Component: 4, Second Component FVE (%): 2.38119857504325, , Disp. Sep. Crit. (DSC) (1,4): 0, Disp. within groups (Dw) (1,4): 8.58051331608968, Disp. between groups (Db) (1,4): 0, DSC pvalue(1,4): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:06.682 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:06.682 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:06.683 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:06.684 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:06.685 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:06.820 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:06.822 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:06.830 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:06.832 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 4
2017 10 03 15:38:06.832 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-ALL.png

2017 10 03 15:38:06.832 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
2017 10 03 15:38:06.833 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-
Plus/ALL_Comp1_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:07.011 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:07.012 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:07.012 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:07.013 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:07.015 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:07.016 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:07.016 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:07.017 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:07.017 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:07.018 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:07.018 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:07.019 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:07.019 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:07.020 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:07.020 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:07.023 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:07.025 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:07.025 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:07.026 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:07.026 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:07.027 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:07.027 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:07.028 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:07.028 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:07.028 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:07.029 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:07.030 DEBUG MachineName writePCAAnnotations - data PC2,PC3
2017 10 03 15:38:07.032 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:07.035 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:07.144 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:07.151 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:07.152 DEBUG MachineName mbatchStandardLegend - theTitle Points: ShipDate (80)
2017 10 03 15:38:07.152 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:07.153 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
2017 10 03 15:38:07.153 DEBUG MachineName mbatchStandardLegend - theLegendNames 2013-05-08 (80)
2017 10 03 15:38:07.153 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:07.154 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:07.156 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:07.160 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:07.161 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: ShipDate (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-
Plus/ALL_Comp2_Comp3_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:07.191 DEBUG MachineName mbatchStandardLegend after java

2017 10 03 15:38:07.193 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:07.201 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:07.202 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:07.203 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:07.204 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png
2017 10 03 15:38:07.204 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 2, First Component FVE (%): 3.86069725110343, Second PCA Component: 3, Second Component FVE (%): 2.78568393481595, , Disp. Sep. Crit. (DSC) (2,3): 0, Disp. within groups (Dw) (2,3): 3.28935619980036, Disp. between groups (Db) (2,3): 0, DSC pvalue(2,3): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:07.205 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:07.205 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:07.206 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:07.206 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:07.206 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:07.343 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:07.344 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:07.351 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:07.351 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 2 3
2017 10 03 15:38:07.351 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-ALL.png
2017 10 03 15:38:07.352 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
2017 10 03 15:38:07.352 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 2 3
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:07.533 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:07.534 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:07.534 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:07.535 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:07.537 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:07.537 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:07.537 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:07.538 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:07.538 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:07.538 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:07.539 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:07.539 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:07.539 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:07.540 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:07.540 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:07.580 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:07.582 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:07.582 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:07.583 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:07.583 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:07.584 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:07.584 DEBUG MachineName openAndWriteDscPermsFile -- redo name

2017 10 03 15:38:07.585 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:07.585 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:07.585 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:07.586 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:07.586 DEBUG MachineName writePCAAnnotations - data PC2,PC4
2017 10 03 15:38:07.589 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:07.589 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:07.671 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:07.680 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:07.680 DEBUG MachineName mbatchStandardLegend - theTitle Points: ShipDate (80)
2017 10 03 15:38:07.680 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:07.681 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
2017 10 03 15:38:07.684 DEBUG MachineName mbatchStandardLegend - theLegendNames 2013-05-08 (80)
2017 10 03 15:38:07.685 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:07.685 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:07.686 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:07.686 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:07.687 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: ShipDate (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:07.722 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:07.728 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:07.752 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:07.753 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:07.754 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:07.754 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png
2017 10 03 15:38:07.755 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 2, First Component FVE (%): 3.86069725110343, Second PCA Component: 4, Second Component FVE (%): 2.38119857504325, , Disp. Sep. Crit. (DSC) (2,4): 0, Disp. within groups (Dw) (2,4): 3.18769338023607, Disp. between groups (Db) (2,4): 0, DSC pvalue(2,4): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:07.760 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:07.760 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:07.760 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:07.761 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:07.761 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:07.892 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:07.894 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:07.900 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:07.901 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 2 4
2017 10 03 15:38:07.901 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-ALL.png
2017 10 03 15:38:07.902 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
2017 10 03 15:38:07.903 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 2 4

combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:08.200 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:08.202 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:08.203 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 80
2017 10 03 15:38:08.213 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:08.216 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:08.218 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 80
2017 10 03 15:38:08.218 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:08.219 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:08.219 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:08.219 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:08.220 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:08.220 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:08.221 DEBUG MachineName ncol(thePcaDataExcerpt)= 80
2017 10 03 15:38:08.221 DEBUG MachineName length(theBatchIdsForSamples)= 80
2017 10 03 15:38:08.222 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=80
theBatchIds.length=80
matrix.length=2
matrix[0].length=80
2017 10 03 15:38:08.226 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:08.236 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:08.236 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 1
2017 10 03 15:38:08.238 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1
2017 10 03 15:38:08.239 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:08.242 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:08.242 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:08.243 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:08.243 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:08.244 DEBUG MachineName openAndWriteDscPermsFile -- nothing to write
2017 10 03 15:38:08.245 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:08.245 DEBUG MachineName writePCAAnnotations - data PC3,PC4
2017 10 03 15:38:08.250 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 80
2017 10 03 15:38:08.251 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 80
2017 10 03 15:38:08.351 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:08.357 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:08.358 DEBUG MachineName mbatchStandardLegend - theTitle Points: ShipDate (80)
2017 10 03 15:38:08.358 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:08.359 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
2017 10 03 15:38:08.359 DEBUG MachineName mbatchStandardLegend - theLegendNames 2013-05-08 (80)
2017 10 03 15:38:08.359 DEBUG MachineName mbatchStandardLegend - theLegendNames 1
2017 10 03 15:38:08.360 DEBUG MachineName mbatchStandardLegend - theLegendColors 1
2017 10 03 15:38:08.360 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 1
2017 10 03 15:38:08.360 DEBUG MachineName mbatchStandardLegend - myColors #b30000
2017 10 03 15:38:08.365 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: ShipDate (80)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:08.399 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:08.400 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:08.410 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:08.411 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:08.411 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16

2017 10 03 15:38:08.412 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png
2017 10 03 15:38:08.412 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 3, First Component FVE
(%): 2.78568393481595, Second PCA Component: 4, Second Component FVE (%): 2.38119857504325, , Disp. Sep. Crit. (DSC) (3,4): 0, Disp.
within groups (Dw) (3,4): 2.90023090121504, Disp. between groups (Db) (3,4): 0, DSC pvalue(3,4): 1, , Disp. Sep. Crit. (DSC): 0, Disp. within
groups (Dw): 12.7590483279015, Disp. between groups (Db): 0, DSC pvalue: 1
2017 10 03 15:38:08.413 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:08.413 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:08.413 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:08.413 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:08.414 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-
Plus/ALL_Comp3_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:08.549 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:08.551 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:08.562 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:08.563 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 3 4
2017 10 03 15:38:08.563 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-ALL.png
2017 10 03 15:38:08.563 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
2017 10 03 15:38:08.564 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 3 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/ShipDate/ManyToMany/PCA-
Plus/ALL_Comp3_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:08.740 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:08.741 DEBUG MachineName doSamplePcaCall - pre-filter matrix size= 1250,80
2017 10 03 15:38:08.742 DEBUG MachineName filterTheGeneDataOnBatchSize theMinBatchSize= 2
2017 10 03 15:38:08.743 DEBUG MachineName filterBasedOnGeneLimit theGeneLimit= 10000
2017 10 03 15:38:08.744 DEBUG MachineName filterBasedOnGeneLimit theMatrixGeneData nrow= 1250
2017 10 03 15:38:08.744 DEBUG MachineName filterBasedOnGeneLimit theMatrixGeneData ncol= 78
2017 10 03 15:38:08.744 DEBUG MachineName doSamplePcaCall - pre-filter matrix size= 1250,80
2017 10 03 15:38:08.745 DEBUG MachineName doSamplePcaCall - no-NA matrix length= 1247
2017 10 03 15:38:08.793 DEBUG MachineName doSamplePcaCall - max(theCompPairList)= 4
2017 10 03 15:38:08.794 DEBUG MachineName doSamplePcaCall - pca scores size= 78,78
2017 10 03 15:38:08.795 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany
2017 10 03 15:38:08.795 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus
2017 10 03 15:38:08.796 DEBUG MachineName call pvalueDSC
2017 10 03 15:38:08.796 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:08.797 DEBUG MachineName pvalueDSC component A < 1
2017 10 03 15:38:08.797 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:08.797 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:08.798 DEBUG MachineName nrow(thePcaDataExcerpt)= 78
2017 10 03 15:38:08.798 DEBUG MachineName ncol(thePcaDataExcerpt)= 78
2017 10 03 15:38:08.799 DEBUG MachineName length(theBatchIdsForSamples)= 78
2017 10 03 15:38:08.799 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=78
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=78
matrix[0].length=78
2017 10 03 15:38:08.816 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:08.823 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:08.826 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 3
2017 10 03 15:38:08.829 DEBUG MachineName pvalueDSCwithExcerpt call doDscPerms
2017 10 03 15:38:08.830 DEBUG MachineName doDscPerms before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=78

Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=78
matrix[0].length=78
perms=1000
threads=1
Perm::compute - mPerms=1000
Perm::compute - mThreads=1
Perm::compute - fork
Perm::compute - do joins
Thread 9 is starting perm # 0
Thread 9 is starting perm # 100
Thread 9 is starting perm # 200
Thread 9 is starting perm # 300
Thread 9 is starting perm # 400
Thread 9 is starting perm # 500
Thread 9 is starting perm # 600
Thread 9 is starting perm # 700
Thread 9 is starting perm # 800
Thread 9 is starting perm # 900
after joins
2017 10 03 15:38:10.430 DEBUG MachineName doDscPerms after java
2017 10 03 15:38:10.979 DEBUG MachineName doDscPerms length(resultsList)= 1000
2017 10 03 15:38:10.979 DEBUG MachineName pvalueDSCwithExcerpt length(permResults)= 1000
2017 10 03 15:38:11.060 DEBUG MachineName p-value run time = 2.23095989227295
2017 10 03 15:38:11.062 DEBUG MachineName p-value is 0.921
2017 10 03 15:38:11.063 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1000
2017 10 03 15:38:11.063 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:11.166 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:11.166 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:11.166 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:11.167 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:11.560 DEBUG MachineName write writePcaDataFilesForDataset
2017 10 03 15:38:11.561 DEBUG MachineName checkCreateDir: /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany
2017 10 03 15:38:11.561 DEBUG MachineName writePCAValuesTSV
2017 10 03 15:38:11.561 DEBUG MachineName writePCAValuesTSV outputFile
2017 10 03 15:38:11.562 DEBUG MachineName writePCAValuesTSV components
2017 10 03 15:38:11.562 DEBUG MachineName writePCAValuesTSV myDataFrame
2017 10 03 15:38:11.562 DEBUG MachineName writePCAValuesTSV - values
2017 10 03 15:38:11.563 DEBUG MachineName writePCAValuesTSV - matrix
2017 10 03 15:38:11.564 DEBUG MachineName writePCAValuesTSV - write
2017 10 03 15:38:11.566 DEBUG MachineName writePCAValuesTSV finished
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCAValues.tsv
2017 10 03 15:38:11.566 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:11.566 DEBUG MachineName writePCAAnnotations - header and all data
2017 10 03 15:38:11.574 DEBUG MachineName write writeSharedFveWeightScoresFiles
2017 10 03 15:38:11.848 DEBUG MachineName createBatchEffectsOutput_pca loop
2017 10 03 15:38:11.849 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:11.849 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 78
2017 10 03 15:38:11.850 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:11.852 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:11.852 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 78
2017 10 03 15:38:11.852 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:11.853 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:11.853 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:11.853 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:11.854 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:11.854 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:11.854 DEBUG MachineName ncol(thePcaDataExcerpt)= 78
2017 10 03 15:38:11.855 DEBUG MachineName length(theBatchIdsForSamples)= 78
2017 10 03 15:38:11.855 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=2
matrix[0].length=78
2017 10 03 15:38:11.856 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:11.857 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:11.858 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 3

2017 10 03 15:38:11.858 DEBUG MachineName pvalueDSCwithExcerpt call doDscPerms
2017 10 03 15:38:11.882 DEBUG MachineName doDscPerms before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=2
matrix[0].length=78
perms=1000
threads=1
Perm::compute - mPerms=1000
Perm::compute - mThreads=1
Perm::compute - fork
Perm::compute - do joins
Thread 10 is starting perm # 0
Thread 10 is starting perm # 100
Thread 10 is starting perm # 200
Thread 10 is starting perm # 300
Thread 10 is starting perm # 400
Thread 10 is starting perm # 500
Thread 10 is starting perm # 600
Thread 10 is starting perm # 700
Thread 10 is starting perm # 800
Thread 10 is starting perm # 900
after joins
2017 10 03 15:38:12.190 DEBUG MachineName doDscPerms after java
2017 10 03 15:38:12.847 DEBUG MachineName doDscPerms length(resultsList)= 1000
2017 10 03 15:38:12.847 DEBUG MachineName pvalueDSCwithExcerpt length(permResults)= 1000
2017 10 03 15:38:12.851 DEBUG MachineName p-value run time = 0.99251914024353
2017 10 03 15:38:12.851 DEBUG MachineName p-value is 0.922
2017 10 03 15:38:12.852 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1000
2017 10 03 15:38:12.852 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:12.853 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:12.854 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:12.854 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:12.854 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:13.208 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:13.209 DEBUG MachineName writePCAAnnotations - data PC1,PC2
2017 10 03 15:38:13.211 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:13.212 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 78
2017 10 03 15:38:13.305 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:13.312 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:13.312 DEBUG MachineName mbatchStandardLegend - theTitle Points: TSS (78)
2017 10 03 15:38:13.313 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:13.313 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
2017 10 03 15:38:13.314 DEBUG MachineName mbatchStandardLegend - theLegendNames OR - University of Michigan
(72), P6 - Translational Genomics
Research Institute (2), PK - University Health
Network (4)
2017 10 03 15:38:13.314 DEBUG MachineName mbatchStandardLegend - theLegendNames 3
2017 10 03 15:38:13.314 DEBUG MachineName mbatchStandardLegend - theLegendColors 3
2017 10 03 15:38:13.315 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 3
2017 10 03 15:38:13.315 DEBUG MachineName mbatchStandardLegend - myColors #b30000,#00b300,#0000b3
2017 10 03 15:38:13.315 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: TSS (78)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:13.371 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:13.377 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar

2017 10 03 15:38:13.384 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:13.384 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:13.385 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:13.385 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-DSC.png
2017 10 03 15:38:13.386 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE
(%): 42.6240095759654, Second PCA Component: 2, Second Component FVE (%): 3.89149789287004, , Disp. Sep. Crit. (DSC) (1,2):
0.0591349130022416, Disp. within groups (Dw) (1,2): 8.6925144794163, Disp. between groups (Db) (1,2): 0.514031087511008, DSC
pvalue(1,2): 0.922, , Disp. Sep. Crit. (DSC): 0.124148841624636, Disp. within groups (Dw): 12.6701927334314, Disp. between groups (Db):
1.5729897510164, DSC pvalue: 0.921
2017 10 03 15:38:13.386 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:13.389 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:13.390 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:13.390 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:13.391 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-
Plus/ALL_Comp1_Comp2_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:13.530 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:13.532 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:13.538 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:13.538 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 2
2017 10 03 15:38:13.539 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-ALL.png
2017 10 03 15:38:13.539 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-Points.png
2017 10 03 15:38:13.539 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 2
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp2_Legend-
ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:13.752 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:13.753 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:13.754 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 78
2017 10 03 15:38:13.754 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:13.756 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:13.757 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 78
2017 10 03 15:38:13.757 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:13.757 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:13.758 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:13.758 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:13.758 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:13.759 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:13.759 DEBUG MachineName ncol(thePcaDataExcerpt)= 78
2017 10 03 15:38:13.759 DEBUG MachineName length(theBatchIdsForSamples)= 78
2017 10 03 15:38:13.760 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=2
matrix[0].length=78
2017 10 03 15:38:13.761 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:13.764 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:13.765 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 3
2017 10 03 15:38:13.765 DEBUG MachineName pvalueDSCwithExcerpt call doDscPerms
2017 10 03 15:38:13.766 DEBUG MachineName doDscPerms before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78

matrix.length=2
matrix[0].length=78
perms=1000
threads=1
Perm::compute - mPerms=1000
Perm::compute - mThreads=1
Perm::compute - fork
Perm::compute - do joins
Thread 11 is starting perm # 0
Thread 11 is starting perm # 100
Thread 11 is starting perm # 200
Thread 11 is starting perm # 300
Thread 11 is starting perm # 400
Thread 11 is starting perm # 500
Thread 11 is starting perm # 600
Thread 11 is starting perm # 700
Thread 11 is starting perm # 800
Thread 11 is starting perm # 900
after joins
2017 10 03 15:38:13.999 DEBUG MachineName doDscPerms after java
2017 10 03 15:38:14.453 DEBUG MachineName doDscPerms length(resultsList)= 1000
2017 10 03 15:38:14.453 DEBUG MachineName pvalueDSCwithExcerpt length(permResults)= 1000
2017 10 03 15:38:14.457 DEBUG MachineName p-value run time = 0.691699266433716
2017 10 03 15:38:14.457 DEBUG MachineName p-value is 0.893
2017 10 03 15:38:14.458 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1000
2017 10 03 15:38:14.458 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:14.459 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:14.460 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:14.460 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:14.460 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:14.819 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:14.820 DEBUG MachineName writePCAAnnotations - data PC1,PC3
2017 10 03 15:38:14.822 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:14.823 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 78
2017 10 03 15:38:14.913 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:14.919 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:14.920 DEBUG MachineName mbatchStandardLegend - theTitle Points: TSS (78)
2017 10 03 15:38:14.920 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:14.921 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
2017 10 03 15:38:14.921 DEBUG MachineName mbatchStandardLegend - theLegendNames OR - University of Michigan
(72), P6 - Translational Genomics
Research Institute (2), PK - University Health
Network (4)
2017 10 03 15:38:14.922 DEBUG MachineName mbatchStandardLegend - theLegendNames 3
2017 10 03 15:38:14.922 DEBUG MachineName mbatchStandardLegend - theLegendColors 3
2017 10 03 15:38:14.922 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 3
2017 10 03 15:38:14.923 DEBUG MachineName mbatchStandardLegend - myColors #b30000,#00b300,#0000b3
2017 10 03 15:38:14.923 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: TSS (78)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:14.979 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:14.980 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:14.986 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:14.987 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:14.987 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:14.988 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png

2017 10 03 15:38:14.988 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE (%): 42.6240095759654, Second PCA Component: 3, Second Component FVE (%): 2.78783739194708, , Disp. Sep. Crit. (DSC) (1,3): 0.064500714361263, Disp. within groups (Dw) (1,3): 8.5859354084488, Disp. between groups (Db) (1,3): 0.55379896730461, DSC pvalue(1,3): 0.893, , Disp. Sep. Crit. (DSC): 0.124148841624636, Disp. within groups (Dw): 12.6701927334314, Disp. between groups (Db): 1.5729897510164, DSC pvalue: 0.921

2017 10 03 15:38:14.990 DEBUG MachineName mbatchStandardLegend - theLegendNames 14

2017 10 03 15:38:14.990 DEBUG MachineName mbatchStandardLegend - theLegendColors 0

2017 10 03 15:38:14.991 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0

2017 10 03 15:38:14.991 DEBUG MachineName mbatchStandardLegend - myColors

2017 10 03 15:38:14.991 DEBUG MachineName mbatchStandardLegend before java

LegendJava 2013_05_03_0823

writeLegendWithSymbols theTitle = Dispersion Metrics

writeLegendWithSymbols theVersion = MBatch 1.4.16

writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png

writeLegendWithSymbols write

writeLegendWithSymbols done

2017 10 03 15:38:15.134 DEBUG MachineName mbatchStandardLegend after java

2017 10 03 15:38:15.136 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar

2017 10 03 15:38:15.142 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete

2017 10 03 15:38:15.142 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 1 3

2017 10 03 15:38:15.142 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-ALL.png

2017 10 03 15:38:15.143 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-DSC.png, /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-Points.png

2017 10 03 15:38:15.143 DEBUG MachineName mbatchStandardLegend before java

LegendJava 2013_05_03_0823

combineLegends theTitle = Test PCA ALL 1 3

combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp3_Legend-ALL.png

combineLegends write

combineLegends done

2017 10 03 15:38:15.373 DEBUG MachineName mbatchStandardLegend after java

2017 10 03 15:38:15.374 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 78

2017 10 03 15:38:15.374 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 78

2017 10 03 15:38:15.375 DEBUG MachineName doInternalPca - filtering batch size of 2

2017 10 03 15:38:15.376 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 78

2017 10 03 15:38:15.377 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 78

2017 10 03 15:38:15.377 DEBUG MachineName doInternalPca - pvalueDSC

2017 10 03 15:38:15.377 DEBUG MachineName pvalueDSC start

2017 10 03 15:38:15.378 DEBUG MachineName pvalueDSC transpose

2017 10 03 15:38:15.378 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt

2017 10 03 15:38:15.378 DEBUG MachineName pvalueDSCwithExcerpt start

2017 10 03 15:38:15.379 DEBUG MachineName nrow(thePcaDataExcerpt)= 2

2017 10 03 15:38:15.379 DEBUG MachineName ncol(thePcaDataExcerpt)= 78

2017 10 03 15:38:15.379 DEBUG MachineName length(theBatchIdsForSamples)= 78

2017 10 03 15:38:15.380 DEBUG MachineName getDSCwithExcerpt before java

DscJava 2015-08-31-1400

Number of Components/Genes theDim[0]=2

Number of Samples theDim[1]=78

theBatchIds.length=78

matrix.length=2

matrix[0].length=78

2017 10 03 15:38:15.381 DEBUG MachineName getDSCwithExcerpt after java

2017 10 03 15:38:15.382 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt

2017 10 03 15:38:15.382 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 3

2017 10 03 15:38:15.384 DEBUG MachineName pvalueDSCwithExcerpt call doDscPerms

2017 10 03 15:38:15.385 DEBUG MachineName doDscPerms before java

DscJava 2015-08-31-1400

Number of Components/Genes theDim[0]=2

Number of Samples theDim[1]=78

theBatchIds.length=78

matrix.length=2

matrix[0].length=78

perms=1000

threads=1

Perm::compute - mPerms=1000

40

Perm::compute - mThreads=1
Perm::compute - fork
Perm::compute - do joins
Thread 12 is starting perm # 0
Thread 12 is starting perm # 100
Thread 12 is starting perm # 200
Thread 12 is starting perm # 300
Thread 12 is starting perm # 400
Thread 12 is starting perm # 500
Thread 12 is starting perm # 600
Thread 12 is starting perm # 700
Thread 12 is starting perm # 800
Thread 12 is starting perm # 900
after joins
2017 10 03 15:38:15.613 DEBUG MachineName doDscPerms after java
2017 10 03 15:38:16.076 DEBUG MachineName doDscPerms length(resultsList)= 1000
2017 10 03 15:38:16.077 DEBUG MachineName pvalueDSCwithExcerpt length(permResults)= 1000
2017 10 03 15:38:16.081 DEBUG MachineName p-value run time = 0.696584224700928
2017 10 03 15:38:16.082 DEBUG MachineName p-value is 0.973
2017 10 03 15:38:16.082 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1000
2017 10 03 15:38:16.082 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:16.084 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:16.084 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:16.084 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:16.085 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:16.452 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:16.453 DEBUG MachineName writePCAAnnotations - data PC1,PC4
2017 10 03 15:38:16.457 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:16.458 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 78
2017 10 03 15:38:16.544 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:16.550 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:16.550 DEBUG MachineName mbatchStandardLegend - theTitle Points: TSS (78)
2017 10 03 15:38:16.551 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:16.551 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
2017 10 03 15:38:16.552 DEBUG MachineName mbatchStandardLegend - theLegendNames OR - University of Michigan
(72), P6 - Translational Genomics
Research Institute (2), PK - University Health
Network (4)
2017 10 03 15:38:16.552 DEBUG MachineName mbatchStandardLegend - theLegendNames 3
2017 10 03 15:38:16.552 DEBUG MachineName mbatchStandardLegend - theLegendColors 3
2017 10 03 15:38:16.553 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 3
2017 10 03 15:38:16.553 DEBUG MachineName mbatchStandardLegend - myColors #b30000,#00b300,#0000b3
2017 10 03 15:38:16.553 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: TSS (78)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:16.609 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:16.611 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:16.617 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:16.617 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:16.618 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:16.618 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png
2017 10 03 15:38:16.618 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 1, First Component FVE
(%): 42.6240095759654, Second PCA Component: 4, Second Component FVE (%): 2.37127934613424, , Disp. Sep. Crit. (DSC) (1,4):
0.038879503032331, Disp. within groups (Dw) (1,4): 8.55775982931, Disp. between groups (Db) (1,4): 0.332721449233619, DSC pvalue(1,4):
0.973, , Disp. Sep. Crit. (DSC): 0.124148841624636, Disp. within groups (Dw): 12.6701927334314, Disp. between groups (Db):
1.5729897510164, DSC pvalue: 0.921
2017 10 03 15:38:16.619 DEBUG MachineName mbatchStandardLegend - theLegendNames 14

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2017 10 03 15:38:16.621 DEBUG MachineName mbatchStandardLegend - theLegendColors  0
2017 10 03 15:38:16.621 DEBUG MachineName mbatchStandardLegend - theLegendSymbols  0
2017 10 03 15:38:16.622 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:16.622 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-
Plus/ALL_Comp1_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:16.764 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:16.767 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit  /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:16.773 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:16.773 DEBUG MachineName mbatchStandardCombineLegends - theTitle  Test PCA ALL 1 4
2017 10 03 15:38:16.776 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-ALL.png
2017 10 03 15:38:16.777 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-Points.png
2017 10 03 15:38:16.777 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 1 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp1_Comp4_Legend-
ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:16.995 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:16.996 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids)  78
2017 10 03 15:38:16.997 DEBUG MachineName doInternalPca before filter - length of batch ids for samples  78
2017 10 03 15:38:16.997 DEBUG MachineName doInternalPca - filtering batch size of  2
2017 10 03 15:38:16.999 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids)  78
2017 10 03 15:38:16.999 DEBUG MachineName doInternalPca after filter - length of batch ids for samples  78
2017 10 03 15:38:17.000 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:17.000 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:17.000 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:17.001 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:17.001 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:17.001 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:17.002 DEBUG MachineName ncol(thePcaDataExcerpt)= 78
2017 10 03 15:38:17.002 DEBUG MachineName length(theBatchIdsForSamples)= 78
2017 10 03 15:38:17.003 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=2
matrix[0].length=78
2017 10 03 15:38:17.003 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:17.004 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:17.006 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 3
2017 10 03 15:38:17.007 DEBUG MachineName pvalueDSCwithExcerpt call doDscPerms
2017 10 03 15:38:17.007 DEBUG MachineName doDscPerms before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=2
matrix[0].length=78
perms=1000
threads=1
Perm::compute - mPerms=1000
Perm::compute - mThreads=1
Perm::compute - fork
Perm::compute - do joins
Thread 13 is starting perm # 0
Thread 13 is starting perm # 100
Thread 13 is starting perm # 200
```

Thread 13 is starting perm # 300
Thread 13 is starting perm # 400
Thread 13 is starting perm # 500
Thread 13 is starting perm # 600
Thread 13 is starting perm # 700
Thread 13 is starting perm # 800
Thread 13 is starting perm # 900
after joins
2017 10 03 15:38:17.193 DEBUG MachineName doDscPerms after java
2017 10 03 15:38:17.652 DEBUG MachineName doDscPerms length(resultsList)= 1000
2017 10 03 15:38:17.653 DEBUG MachineName pvalueDSCwithExcerpt length(permResults)= 1000
2017 10 03 15:38:17.657 DEBUG MachineName p-value run time = 0.650277853012085
2017 10 03 15:38:17.657 DEBUG MachineName p-value is 0.144
2017 10 03 15:38:17.658 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1000
2017 10 03 15:38:17.658 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:17.660 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:17.660 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:17.660 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:17.661 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:18.053 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:18.054 DEBUG MachineName writePCAAnnotations - data PC2,PC3
2017 10 03 15:38:18.056 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:18.057 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 78
2017 10 03 15:38:18.140 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:18.146 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:18.147 DEBUG MachineName mbatchStandardLegend - theTitle Points: TSS (78)
2017 10 03 15:38:18.147 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:18.148 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
2017 10 03 15:38:18.148 DEBUG MachineName mbatchStandardLegend - theLegendNames OR - University of Michigan
(72), P6 - Translational Genomics
Research Institute (2), PK - University Health
Network (4)
2017 10 03 15:38:18.148 DEBUG MachineName mbatchStandardLegend - theLegendNames 3
2017 10 03 15:38:18.149 DEBUG MachineName mbatchStandardLegend - theLegendColors 3
2017 10 03 15:38:18.149 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 3
2017 10 03 15:38:18.149 DEBUG MachineName mbatchStandardLegend - myColors #b30000,#00b300,#0000b3
2017 10 03 15:38:18.150 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: TSS (78)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:18.203 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:18.211 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:18.220 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:18.221 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:18.221 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:18.222 DEBUG MachineName mbatchStandardLegend - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png
2017 10 03 15:38:18.222 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 2, First Component FVE
(%): 3.89149789287004, Second PCA Component: 3, Second Component FVE (%): 2.78783739194708, , Disp. Sep. Crit. (DSC) (2,3):
0.218147340931971, Disp. within groups (Dw) (2,3): 3.22385779888497, Disp. between groups (Db) (2,3): 0.703276006369551, DSC
pvalue(2,3): 0.144, , Disp. Sep. Crit. (DSC): 0.124148841624636, Disp. within groups (Dw): 12.6701927334314, Disp. between groups (Db):
1.5729897510164, DSC pvalue: 0.921
2017 10 03 15:38:18.222 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:18.222 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:18.223 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:18.223 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:18.223 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics

writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-
Plus/ALL_Comp2_Comp3_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:18.362 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:18.364 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-
library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-
1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:18.370 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:18.370 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 2 3
2017 10 03 15:38:18.371 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-ALL.png
2017 10 03 15:38:18.371 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-Points.png
2017 10 03 15:38:18.372 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 2 3
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp3_Legend-
ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:18.607 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:18.609 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:18.609 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 78
2017 10 03 15:38:18.609 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:18.611 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:18.612 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 78
2017 10 03 15:38:18.612 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:18.612 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:18.613 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:18.613 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:18.613 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:18.614 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:18.614 DEBUG MachineName ncol(thePcaDataExcerpt)= 78
2017 10 03 15:38:18.614 DEBUG MachineName length(theBatchIdsForSamples)= 78
2017 10 03 15:38:18.615 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=2
matrix[0].length=78
2017 10 03 15:38:18.616 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:18.617 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:18.617 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 3
2017 10 03 15:38:18.619 DEBUG MachineName pvalueDSCwithExcerpt call doDscPerms
2017 10 03 15:38:18.620 DEBUG MachineName doDscPerms before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=2
matrix[0].length=78
perms=1000
threads=1
Perm::compute - mPerms=1000
Perm::compute - mThreads=1
Perm::compute - fork
Perm::compute - do joins
Thread 14 is starting perm # 0
Thread 14 is starting perm # 100
Thread 14 is starting perm # 200
Thread 14 is starting perm # 300
Thread 14 is starting perm # 400
Thread 14 is starting perm # 500
Thread 14 is starting perm # 600
Thread 14 is starting perm # 700
Thread 14 is starting perm # 800

Thread 14 is starting perm # 900
after joins
2017 10 03 15:38:18.849 DEBUG MachineName doDscPerms after java
2017 10 03 15:38:19.350 DEBUG MachineName doDscPerms length(resultsList)= 1000
2017 10 03 15:38:19.351 DEBUG MachineName pvalueDSCwithExcerpt length(permResults)= 1000
2017 10 03 15:38:19.354 DEBUG MachineName p-value run time = 0.735363960266113
2017 10 03 15:38:19.355 DEBUG MachineName p-value is 0.37
2017 10 03 15:38:19.355 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1000
2017 10 03 15:38:19.356 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:19.357 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:19.357 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:19.358 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:19.358 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:19.739 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:19.739 DEBUG MachineName writePCAAnnotations - data PC2,PC4
2017 10 03 15:38:19.742 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:19.742 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 78
2017 10 03 15:38:19.825 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:19.833 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:19.833 DEBUG MachineName mbatchStandardLegend - theTitle Points: TSS (78)
2017 10 03 15:38:19.834 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:19.834 DEBUG MachineName mbatchStandardLegend - theFilenamePath /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
2017 10 03 15:38:19.835 DEBUG MachineName mbatchStandardLegend - theLegendNames OR - University of Michigan (72), P6 - Translational Genomics
Research Institute (2), PK - University Health
Network (4)
2017 10 03 15:38:19.835 DEBUG MachineName mbatchStandardLegend - theLegendNames 3
2017 10 03 15:38:19.837 DEBUG MachineName mbatchStandardLegend - theLegendColors 3
2017 10 03 15:38:19.837 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 3
2017 10 03 15:38:19.838 DEBUG MachineName mbatchStandardLegend - myColors #b30000,#00b300,#0000b3
2017 10 03 15:38:19.838 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: TSS (78)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:19.912 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:19.914 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:19.921 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:19.922 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:19.922 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:19.924 DEBUG MachineName mbatchStandardLegend - theFilenamePath /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png
2017 10 03 15:38:19.924 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 2, First Component FVE (%): 3.89149789287004, Second PCA Component: 4, Second Component FVE (%): 2.37127934613424, , Disp. Sep. Crit. (DSC) (2,4): 0.173583531178699, Disp. within groups (Dw) (2,4): 3.14805107416134, Disp. between groups (Db) (2,4): 0.546449821783823, DSC pvalue(2,4): 0.37, , Disp. Sep. Crit. (DSC): 0.124148841624636, Disp. within groups (Dw): 12.6701927334314, Disp. between groups (Db): 1.5729897510164, DSC pvalue: 0.921
2017 10 03 15:38:19.924 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:19.925 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:19.925 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:19.925 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:19.926 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:20.071 DEBUG MachineName mbatchStandardLegend after java

2017 10 03 15:38:20.073 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:20.089 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:20.089 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 2 4
2017 10 03 15:38:20.090 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-ALL.png
2017 10 03 15:38:20.090 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-Points.png
2017 10 03 15:38:20.091 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 2 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp2_Comp4_Legend-ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:20.320 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:20.322 DEBUG MachineName doInternalPca before filter - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:20.322 DEBUG MachineName doInternalPca before filter - length of batch ids for samples 78
2017 10 03 15:38:20.323 DEBUG MachineName doInternalPca - filtering batch size of 2
2017 10 03 15:38:20.325 DEBUG MachineName doInternalPca after filter - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:20.325 DEBUG MachineName doInternalPca after filter - length of batch ids for samples 78
2017 10 03 15:38:20.326 DEBUG MachineName doInternalPca - pvalueDSC
2017 10 03 15:38:20.326 DEBUG MachineName pvalueDSC start
2017 10 03 15:38:20.326 DEBUG MachineName pvalueDSC transpose
2017 10 03 15:38:20.327 DEBUG MachineName pvalueDSC call pvalueDSCwithExcerpt
2017 10 03 15:38:20.327 DEBUG MachineName pvalueDSCwithExcerpt start
2017 10 03 15:38:20.328 DEBUG MachineName nrow(thePcaDataExcerpt)= 2
2017 10 03 15:38:20.328 DEBUG MachineName ncol(thePcaDataExcerpt)= 78
2017 10 03 15:38:20.328 DEBUG MachineName length(theBatchIdsForSamples)= 78
2017 10 03 15:38:20.330 DEBUG MachineName getDSCwithExcerpt before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=2
matrix[0].length=78
2017 10 03 15:38:20.335 DEBUG MachineName getDSCwithExcerpt after java
2017 10 03 15:38:20.337 DEBUG MachineName pvalueDSCwithExcerpt after getDSCwithExcerpt
2017 10 03 15:38:20.338 DEBUG MachineName pvalueDSCwithExcerpt length(unique(theBatchIdsForSamples))= 3
2017 10 03 15:38:20.338 DEBUG MachineName pvalueDSCwithExcerpt call doDscPerms
2017 10 03 15:38:20.339 DEBUG MachineName doDscPerms before java
DscJava 2015-08-31-1400
Number of Components/Genes theDim[0]=2
Number of Samples theDim[1]=78
theBatchIds.length=78
matrix.length=2
matrix[0].length=78
perms=1000
threads=1
Perm::compute - mPerms=1000
Perm::compute - mThreads=1
Perm::compute - fork
Perm::compute - do joins
Thread 15 is starting perm # 0
Thread 15 is starting perm # 100
Thread 15 is starting perm # 200
Thread 15 is starting perm # 300
Thread 15 is starting perm # 400
Thread 15 is starting perm # 500
Thread 15 is starting perm # 600
Thread 15 is starting perm # 700
Thread 15 is starting perm # 800
Thread 15 is starting perm # 900
after joins
2017 10 03 15:38:20.524 DEBUG MachineName doDscPerms after java
2017 10 03 15:38:21.011 DEBUG MachineName doDscPerms length(resultsList)= 1000
2017 10 03 15:38:21.012 DEBUG MachineName pvalueDSCwithExcerpt length(permResults)= 1000
2017 10 03 15:38:21.016 DEBUG MachineName p-value run time = 0.677391767501831

2017 10 03 15:38:21.017 DEBUG MachineName p-value is 0.186
2017 10 03 15:38:21.017 DEBUG MachineName pvalueDSCwithExcerpt 2222 length(permResults)= 1000
2017 10 03 15:38:21.017 DEBUG MachineName pvalueDSCwithExcerpt PCA-PVALUE-DSC
2017 10 03 15:38:21.019 DEBUG MachineName openAndWriteDscPermsFile -- start
2017 10 03 15:38:21.019 DEBUG MachineName openAndWriteDscPermsFile -- redo name
2017 10 03 15:38:21.019 DEBUG MachineName openAndWriteDscPermsFile -- check file
2017 10 03 15:38:21.020 DEBUG MachineName openAndWriteDscPermsFile -- no file, write
2017 10 03 15:38:21.394 DEBUG MachineName writePCAAnnotations
2017 10 03 15:38:21.394 DEBUG MachineName writePCAAnnotations - data PC3,PC4
2017 10 03 15:38:21.397 DEBUG MachineName writePcaAnalysis_Image - Number of rownames for pca score (sample ids) 78
2017 10 03 15:38:21.397 DEBUG MachineName writePcaAnalysis_Image - length of batch ids for samples 78
2017 10 03 15:38:21.484 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:21.492 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:21.492 DEBUG MachineName mbatchStandardLegend - theTitle Points: TSS (78)
2017 10 03 15:38:21.493 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:21.493 DEBUG MachineName mbatchStandardLegend - theFilenamePath /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
2017 10 03 15:38:21.494 DEBUG MachineName mbatchStandardLegend - theLegendNames OR - University of Michigan (72), P6 - Translational Genomics
Research Institute (2), PK - University Health
Network (4)
2017 10 03 15:38:21.494 DEBUG MachineName mbatchStandardLegend - theLegendNames 3
2017 10 03 15:38:21.494 DEBUG MachineName mbatchStandardLegend - theLegendColors 3
2017 10 03 15:38:21.495 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 3
2017 10 03 15:38:21.497 DEBUG MachineName mbatchStandardLegend - myColors #b30000,#00b300,#0000b3
2017 10 03 15:38:21.497 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Points: TSS (78)
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
Colors is non-null
Symbols is non-null
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:21.554 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:21.556 DEBUG MachineName mbatchStandardLegend - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:21.561 DEBUG MachineName mbatchStandardLegend - .jinit complete
2017 10 03 15:38:21.562 DEBUG MachineName mbatchStandardLegend - theTitle Dispersion Metrics
2017 10 03 15:38:21.562 DEBUG MachineName mbatchStandardLegend - theVersion MBatch 1.4.16
2017 10 03 15:38:21.563 DEBUG MachineName mbatchStandardLegend - theFilenamePath /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png
2017 10 03 15:38:21.563 DEBUG MachineName mbatchStandardLegend - theLegendNames First PCA Component: 3, First Component FVE (%): 2.78783739194708, Second PCA Component: 4, Second Component FVE (%): 2.37127934613424, , Disp. Sep. Crit. (DSC) (3,4): 0.205599287292735, Disp. within groups (Dw) (3,4): 2.84054650177062, Disp. between groups (Db) (3,4): 0.584014336285912, DSC pvalue(3,4): 0.186, , Disp. Sep. Crit. (DSC): 0.124148841624636, Disp. within groups (Dw): 12.6701927334314, Disp. between groups (Db): 1.5729897510164, DSC pvalue: 0.921
2017 10 03 15:38:21.565 DEBUG MachineName mbatchStandardLegend - theLegendNames 14
2017 10 03 15:38:21.565 DEBUG MachineName mbatchStandardLegend - theLegendColors 0
2017 10 03 15:38:21.566 DEBUG MachineName mbatchStandardLegend - theLegendSymbols 0
2017 10 03 15:38:21.566 DEBUG MachineName mbatchStandardLegend - myColors
2017 10 03 15:38:21.566 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
writeLegendWithSymbols theTitle = Dispersion Metrics
writeLegendWithSymbols theVersion = MBatch 1.4.16
writeLegendWithSymbols theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png
writeLegendWithSymbols write
writeLegendWithSymbols done
2017 10 03 15:38:21.708 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:21.710 DEBUG MachineName mbatchStandardCombineLegends - Calling .jinit /home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/LegendJava.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jcommon-1.0.17.jar:/home/linux/R/x86_64-pc-linux-gnu-library/3.4/MBatch/LegendJava/jfreechart-1.0.14.jar
2017 10 03 15:38:21.718 DEBUG MachineName mbatchStandardCombineLegends - .jinit complete
2017 10 03 15:38:21.720 DEBUG MachineName mbatchStandardCombineLegends - theTitle Test PCA ALL 3 4

```
2017 10 03 15:38:21.720 DEBUG MachineName mbatchStandardCombineLegends - theFilenamePath
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-ALL.png
2017 10 03 15:38:21.720 DEBUG MachineName mbatchStandardCombineLegends - theListOfFiles
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-DSC.png,
/bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-Points.png
2017 10 03 15:38:21.721 DEBUG MachineName mbatchStandardLegend before java
LegendJava 2013_05_03_0823
combineLegends theTitle = Test PCA ALL 3 4
combineLegends theFilenamePath = /bea_testing/output/PCA_Regular_Structures/TSS/ManyToMany/PCA-Plus/ALL_Comp3_Comp4_Legend-
ALL.png
combineLegends write
combineLegends done
2017 10 03 15:38:21.926 DEBUG MachineName mbatchStandardLegend after java
2017 10 03 15:38:21.928 DEBUG MachineName myCompListDscFile
  run-date disease-type data-type platform data-level    correction-type
1 ""      ""       ""      ""      "bea_testing" "output"
2 ""      ""       ""      ""      "bea_testing" "output"
3 ""      ""       ""      ""      "bea_testing" "output"
4 ""      ""       ""      ""      "bea_testing" "output"
  PCA               batch-type diagram-batch Overall-DSC
1 "PCA_Regular_Structures" "BatchId" "ManyToMany" "0"
2 "PCA_Regular_Structures" "PlateId" "ManyToMany" "0"
3 "PCA_Regular_Structures" "ShipDate" "ManyToMany" "0"
4 "PCA_Regular_Structures" "TSS"     "ManyToMany" "0.124148841624636"
  Overall-DSC-pvalue DSC(1,2)        DSC-pvalue(1,2) DSC(1,3)
1 "1"          "0"           "1"          "0"
2 "1"          "0"           "1"          "0"
3 "1"          "0"           "1"          "0"
4 "0.921"       "0.0591349130022416" "0.922"      "0.064500714361263"
  DSC-pvalue(1,3) DSC(1,4)        DSC-pvalue(1,4) DSC(2,3)
1 "1"          "0"           "1"          "0"
2 "1"          "0"           "1"          "0"
3 "1"          "0"           "1"          "0"
4 "0.893"       "0.038879503032331" "0.973"      "0.218147340931971"
  DSC-pvalue(2,3) DSC(2,4)        DSC-pvalue(2,4) DSC(3,4)
1 "1"          "0"           "1"          "0"
2 "1"          "0"           "1"          "0"
3 "1"          "0"           "1"          "0"
4 "0.144"       "0.173583531178699" "0.37"       "0.205599287292735"
  DSC-pvalue(3,4)
1 "1"
2 "1"
3 "1"
4 "0.186"
>
```

The PCA-Plus directory contains the following files.

```
linux@megazone23:/bea_testing/output/PCA_Regular_Structures/BatchId/ManyToMany/PCA-
Plus$ ls -l
total 1040
-rw-r--r-- 1 linux linux 116163 Oct  3 15:37 ALL_Comp1_Comp2_Diagram.png
-rw-r--r-- 1 linux linux  36116 Oct  3 15:37 ALL_Comp1_Comp2_Legend-ALL.png
-rw-r--r-- 1 linux linux  28370 Oct  3 15:37 ALL_Comp1_Comp2_Legend-DSC.png
-rw-r--r-- 1 linux linux   3619 Oct  3 15:37 ALL_Comp1_Comp2_Legend-Points.png
-rw-r--r-- 1 linux linux 112600 Oct  3 15:37 ALL_Comp1_Comp3_Diagram.png
-rw-r--r-- 1 linux linux  36238 Oct  3 15:37 ALL_Comp1_Comp3_Legend-ALL.png
-rw-r--r-- 1 linux linux  28484 Oct  3 15:37 ALL_Comp1_Comp3_Legend-DSC.png
-rw-r--r-- 1 linux linux   3619 Oct  3 15:37 ALL_Comp1_Comp3_Legend-Points.png
-rw-r--r-- 1 linux linux 100443 Oct  3 15:37 ALL_Comp1_Comp4_Diagram.png
-rw-r--r-- 1 linux linux  35978 Oct  3 15:37 ALL_Comp1_Comp4_Legend-ALL.png
-rw-r--r-- 1 linux linux  28129 Oct  3 15:37 ALL_Comp1_Comp4_Legend-DSC.png
-rw-r--r-- 1 linux linux   3619 Oct  3 15:37 ALL_Comp1_Comp4_Legend-Points.png
-rw-r--r-- 1 linux linux 103580 Oct  3 15:37 ALL_Comp2_Comp3_Diagram.png
-rw-r--r-- 1 linux linux  36990 Oct  3 15:38 ALL_Comp2_Comp3_Legend-ALL.png
-rw-r--r-- 1 linux linux  29164 Oct  3 15:38 ALL_Comp2_Comp3_Legend-DSC.png
-rw-r--r-- 1 linux linux   3619 Oct  3 15:37 ALL_Comp2_Comp3_Legend-Points.png
-rw-r--r-- 1 linux linux  93032 Oct  3 15:38 ALL_Comp2_Comp4_Diagram.png
-rw-r--r-- 1 linux linux  36837 Oct  3 15:38 ALL_Comp2_Comp4_Legend-ALL.png
-rw-r--r-- 1 linux linux  28978 Oct  3 15:38 ALL_Comp2_Comp4_Legend-DSC.png
-rw-r--r-- 1 linux linux   3619 Oct  3 15:38 ALL_Comp2_Comp4_Legend-Points.png
-rw-r--r-- 1 linux linux  90464 Oct  3 15:38 ALL_Comp3_Comp4_Diagram.png
-rw-r--r-- 1 linux linux  36752 Oct  3 15:38 ALL_Comp3_Comp4_Legend-ALL.png
-rw-r--r-- 1 linux linux  28764 Oct  3 15:38 ALL_Comp3_Comp4_Legend-DSC.png
-rw-r--r-- 1 linux linux   3619 Oct  3 15:38 ALL_Comp3_Comp4_Legend-Points.png
```

The naming conventions used are

ALL_Comp<X>_Comp<Y>_Diagram.png   A PCA-Plus diagram with component X versus component Y.

ALL_Comp<X>_Comp<Y>_Legend-DSC.png   The legend containing the DSC and related PCA values.

ALL_Comp<X>_Comp<Y>_Legend-Points.png   The legend showing the batches represented by each color.

ALL_Comp<X>_Comp<Y>_Legend-ALL.png   A legend showing the other two legends in one diagram.