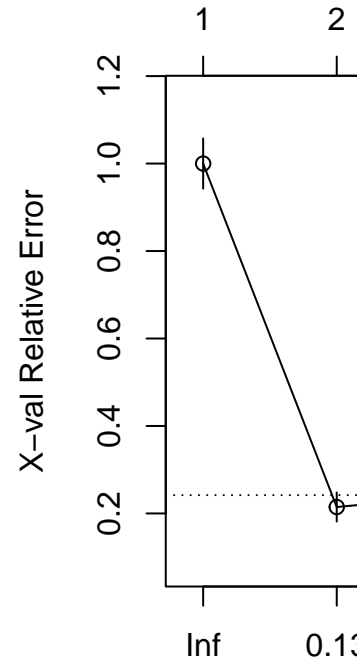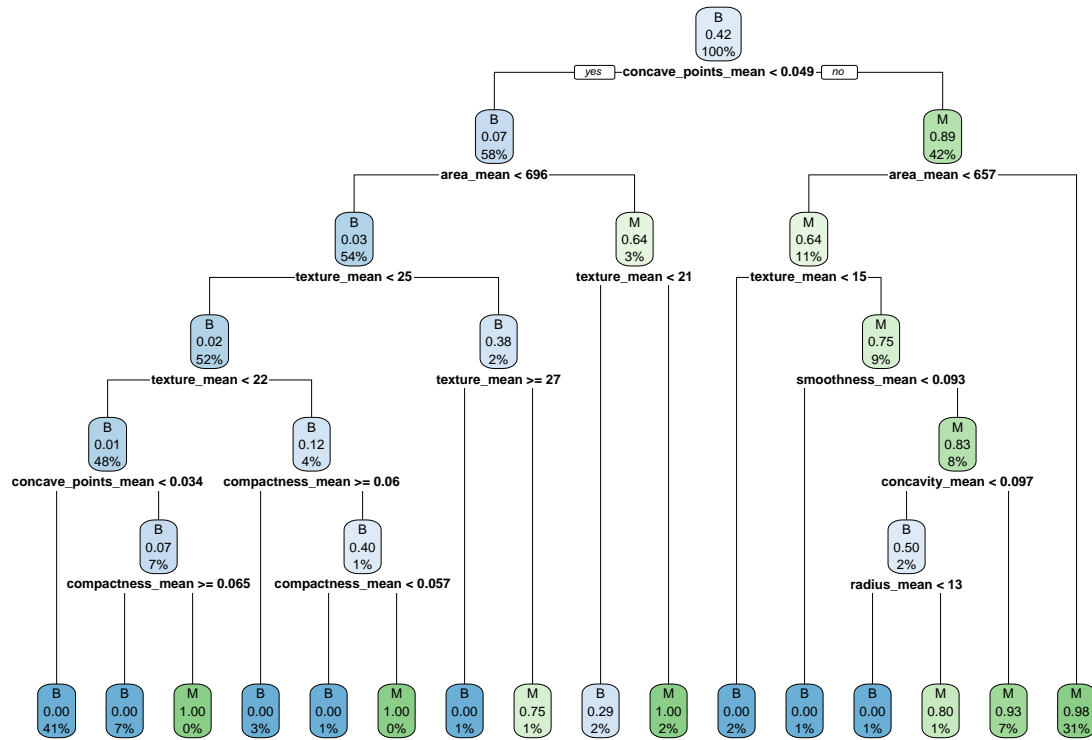# Projet final brouillon 3

2023-04-26

R Markdown
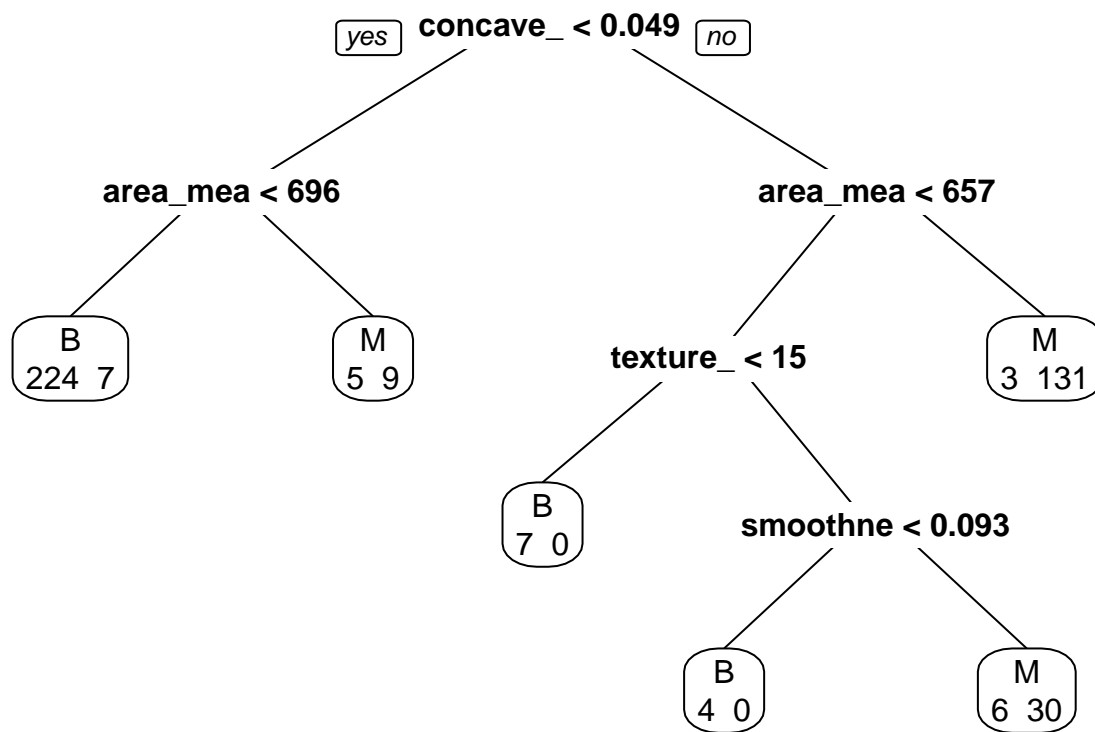
```
## -- Attaching core tidyverse packages ---------------------- tidyverse 2.0.0 --
## v dplyr     1.1.1      v purrr     1.0.1
## v forcats   1.0.0      v stringr   1.5.0
## v ggplot2   3.4.2      v tibble    3.2.1
## v lubridate 1.9.2      v tidyr     1.3.0
## -- Conflicts ------------------------------------------- tidyverse_conflicts() --
## x dplyr::filter() masks stats::filter()
## x dplyr::lag()    masks stats::lag()
## i Use the conflicted package (<http://conflicted.r-lib.org/>) to force all conflicts to become errors
## Welcome! Want to learn more? See two factoextra-related books at https://goo.gl/ve3WBa
##
## Rows: 569 Columns: 32
## -- Column specification -----------------------------------------------------
## Delimiter: ","
## chr  (1): Diagnosis
## dbl (31): ID number, radius_mean, texture_mean, perimeter_mean, area_mean, s...
##
## i Use `spec()` to retrieve the full column specification for this data.
## i Specify the column types or set `show_col_types = FALSE` to quiet this message.
```

```
##
## Classification tree:
## rpart(formula = Diagnosis ~ ., data = dataset.train, method = "class",
##     control = rpart.control(minsplit = 5, cp = 0))
##
## Variables actually used in tree construction:
## [1] area_mean            compactness_mean     concave_points_mean
## [4] concavity_mean       radius_mean          smoothness_mean
## [7] texture_mean
##
## Root node error: 177/426 = 0.41549
##
## n= 426
##
##           CP nsplit rel error   xerror      xstd
## 1 0.7966102      0  1.000000  1.00000  0.057466
## 2 0.0225989      1  0.203390  0.21469  0.033238
## 3 0.0197740      2  0.180791  0.24294  0.035128
## 4 0.0169492      5  0.118644  0.20904  0.032840
## 5 0.0084746      6  0.101695  0.20904  0.032840
## 6 0.0056497      8  0.084746  0.21469  0.033238
## 7 0.0045198     10  0.073446  0.23164  0.034391
## 8 0.0000000     15  0.050847  0.23729  0.034763

## [1] 0.01694915
```

2

```
##    dataset.test_Predict
##       B   M
##   B 100   8
##   M   0  35

## [1] 0.05594406

## [1] 1
```