******* Condition *******

Accuracy (TP+TN)/(TP+FP+TN+FN)

Random Forest (10x 5−fold CV)

Mean of accuracy = 0.89 ± 0.03

	Fold 1	Fold 2	Fold 3	Fold 4	Fold 5
Run 1	0.71	0.75	0.89	0.86	0.89
Run 2	1	0.88	0.86	0.78	0.89
Run 3	0.86	1	0.78	1	1
Run 4	0.86	1	0.89	1	0.89
Run 5	0.62	1	1	1	0.89
Run 6	1	0.75	0.75	0.88	1
Run 7	0.86	1	1	0.78	0.75
Run 8	0.89	0.88	1	0.86	0.67
Run 9	1	0.78	0.89	0.88	0.86
Run 10	0.86	1	0.89	0.89	0.88

Sensitivity TP/(TP+FN)

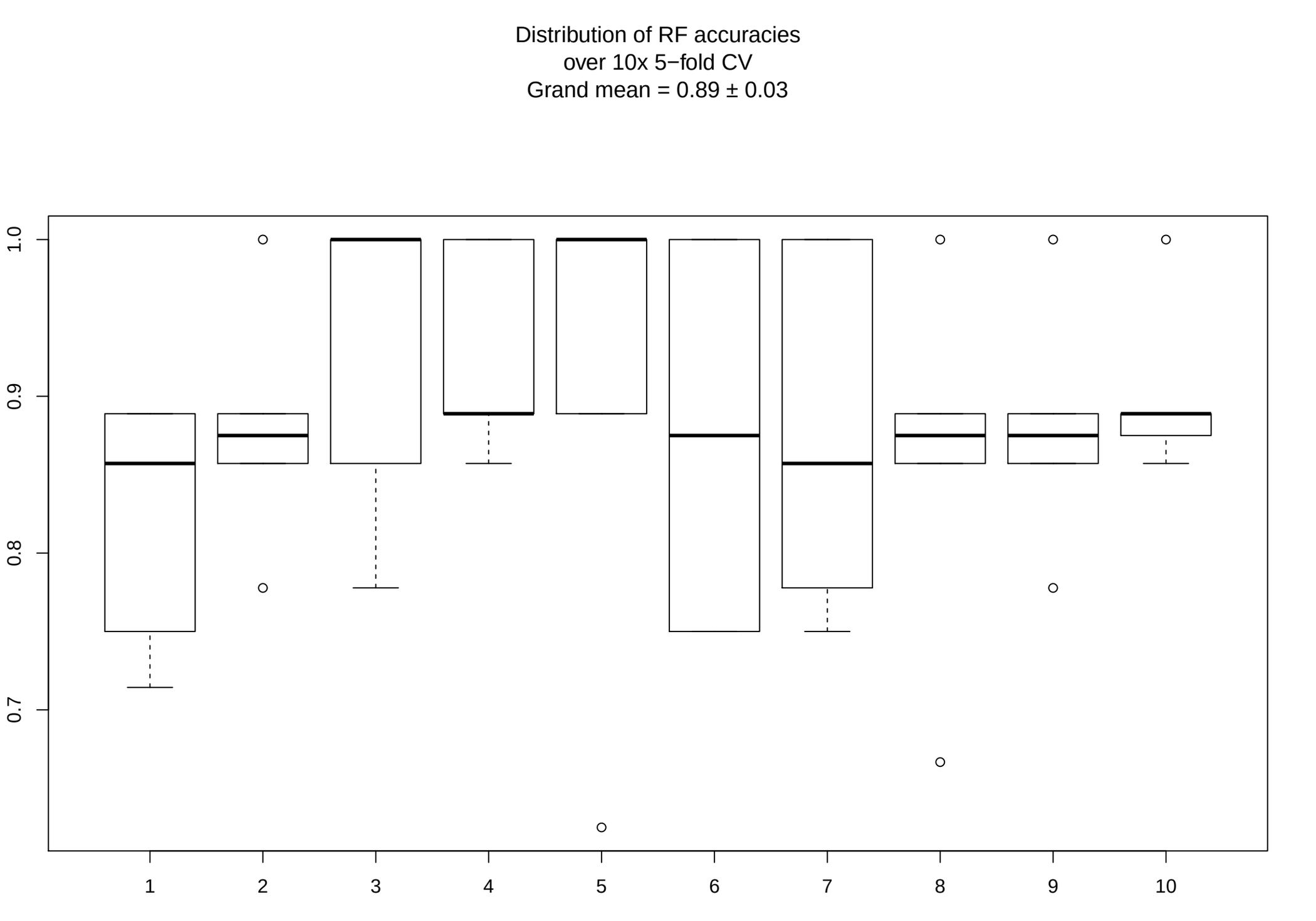
Random Forest (10x 5−fold CV)
Mean of sensitivity = 0.82 ± 0.06

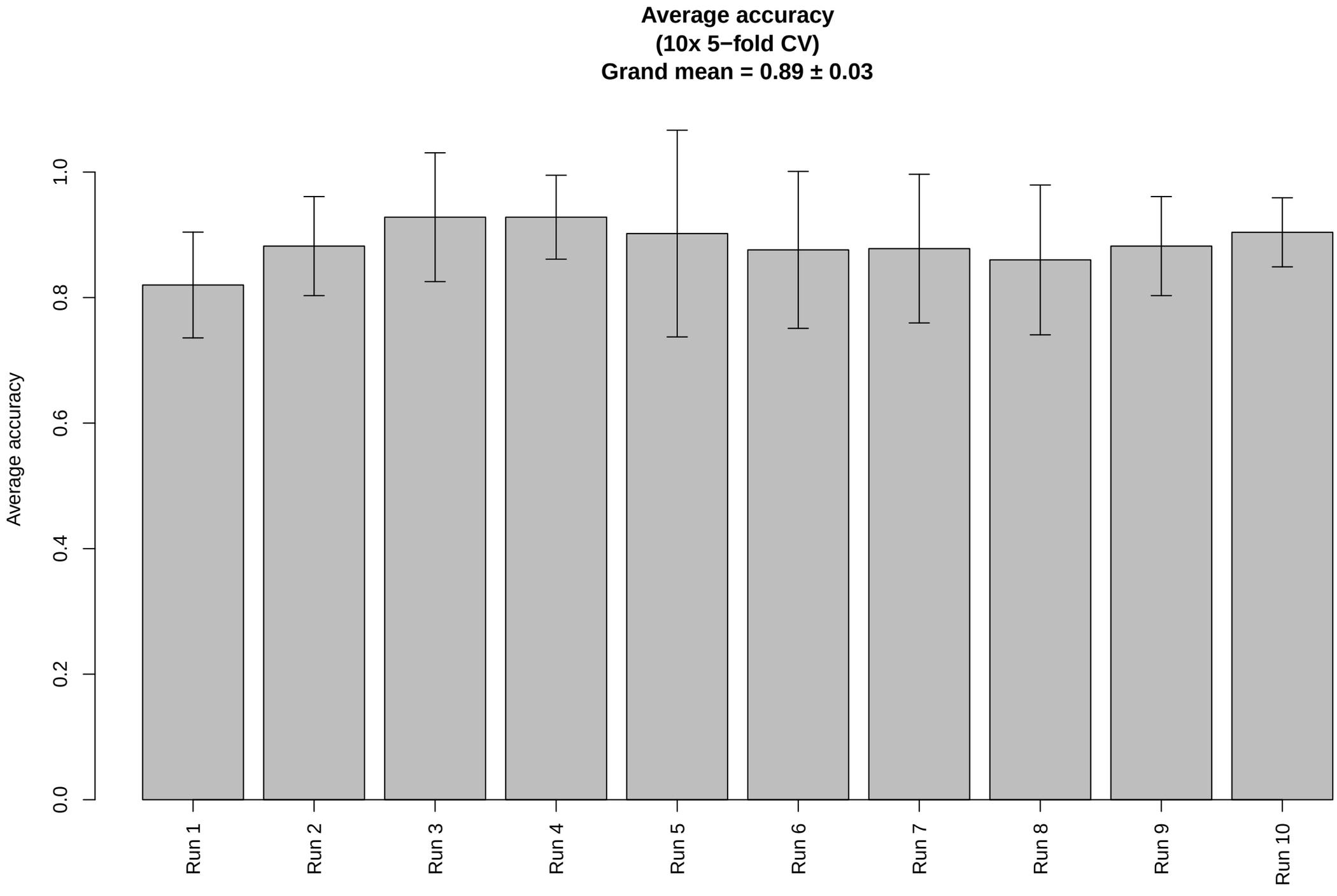
	Fold 1	Fold 2	Fold 3	Fold 4	Fold 5
Run 1	0.33	0.67	0.75	1	0.75
Run 2	1	1	0.67	0.5	0.75
Run 3	1	1	0.5	1	1
Run 4	0.67	1	1	1	0.75
Run 5	0.33	1	1	1	1
Run 6	1	0.67	0.5	1	1
Run 7	1	1	1	0.5	0.67
Run 8	0.75	0.67	1	0.67	0.75
Run 9	1	0.5	1	0.67	0.67
Run 10	0.67	1	0.75	0.75	1

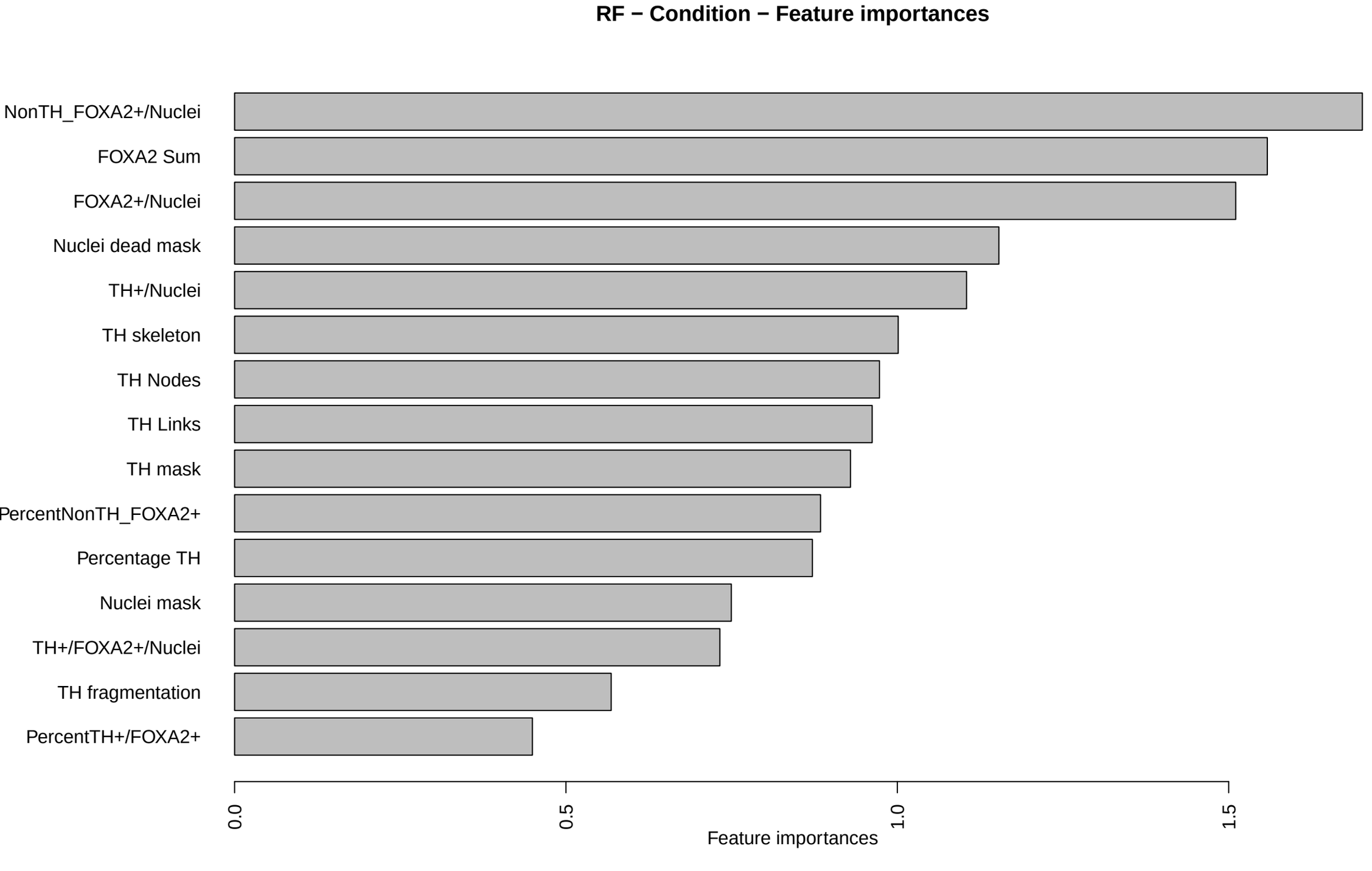
Specificity TN/(TN+FP)

Random Forest (10x 5−fold CV)
Mean of specificity = 0.94 ± 0.02

	Fold 1	Fold 2	Fold 3	Fold 4	Fold 5
Run 1	1	0.8	1	0.75	1
Run 2	1	0.8	1	1	1
Run 3	0.75	1	1	1	1
Run 4	1	1	0.8	1	1
Run 5	0.8	1	1	1	0.8
Run 6	1	0.8	1	0.75	1
Run 7	0.75	1	1	1	0.8
Run 8	1	1	1	1	0.6
Run 9	1	1	0.8	1	1
Run 10	1	1	1	1	0.8


Distribution of RF accuracies
over 10x 5−fold CV
Grand mean = 0.89 ± 0.03
1.0
0.9
0.8
0.7
1
2
3
4
5
6
7
8
9
10


Average accuracy
(10x 5−fold CV)
Grand mean = 0.89 ± 0.03
Average accuracy
0.0
0.2
0.4
0.6
0.8
1.0
Run 1
Run 2
Run 3
Run 4
Run 5
Run 6
Run 7
Run 8
Run 9
Run 10


RF − Condition − Feature importances
NonTH_FOXA2+/Nuclei
FOXA2 Sum
FOXA2+/Nuclei
Nuclei dead mask
TH+/Nuclei
TH skeleton
TH Nodes
TH Links
TH mask
PercentNonTH_FOXA2+
Percentage TH
Nuclei mask
TH+/FOXA2+/Nuclei
TH fragmentation
PercentTH+/FOXA2+
0.0
0.5
1.0
1.5
Feature importances