Naïve Bayes

With scikit-learn GaussianNB

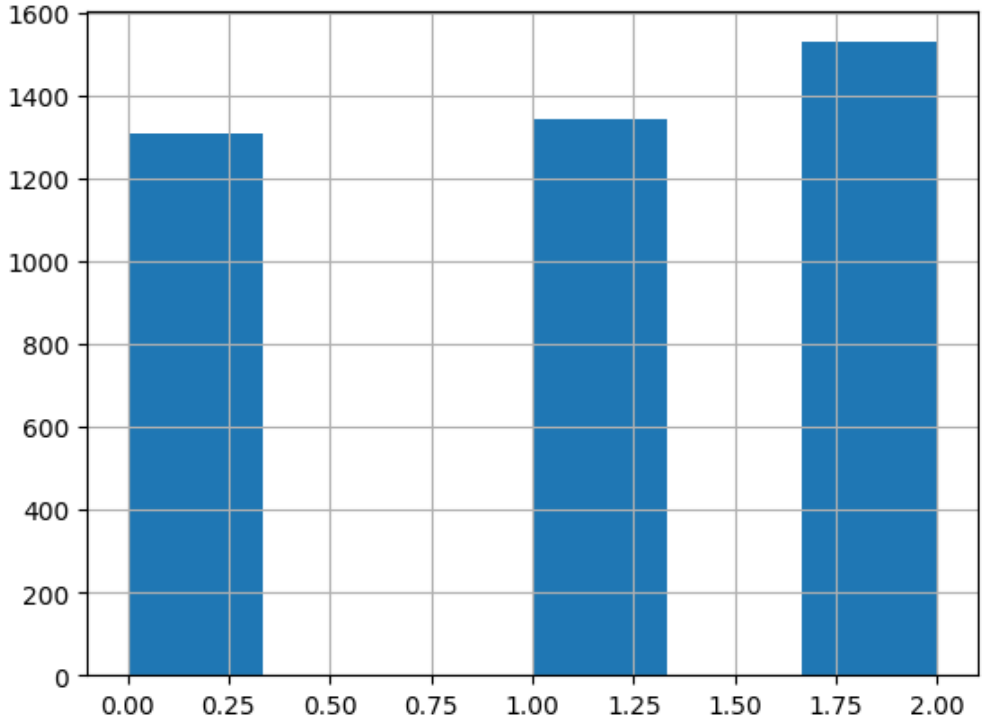
Data

- 4177 samples
- 9 feature columns
- Task 1 : Sex
- Task 2 : Rings
- Splitted Data
- 80% train & 20% test

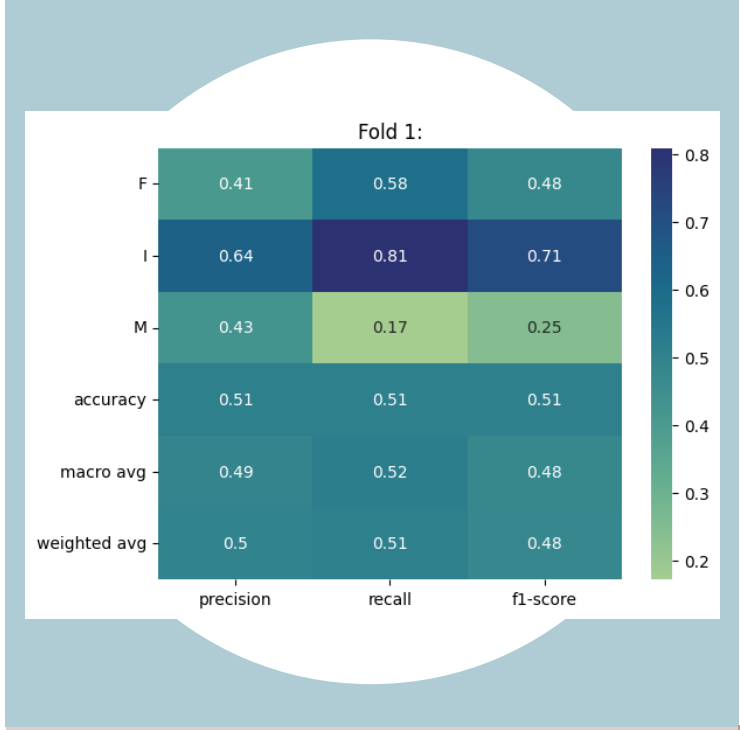
Task 1 : Sex

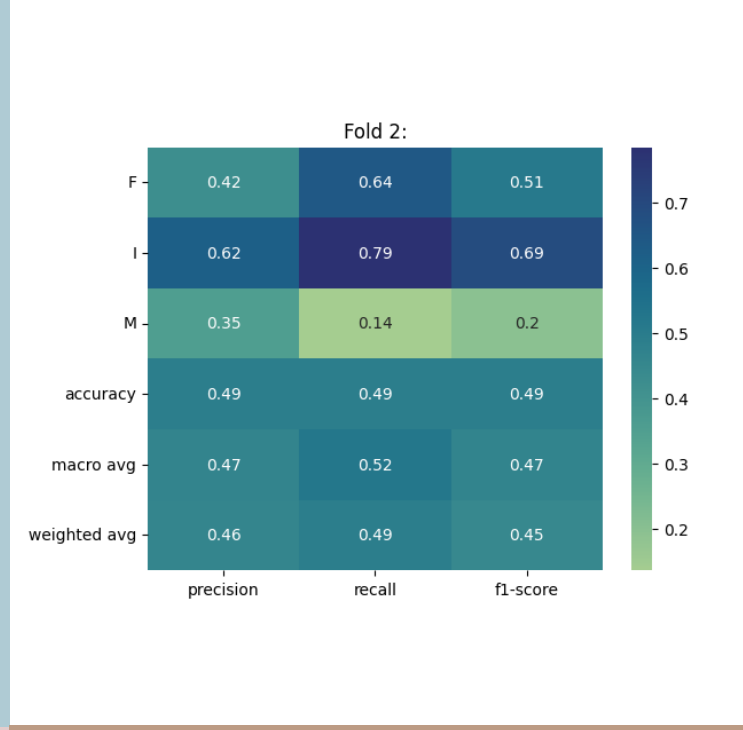
- Classes : F, I and M
- Distribution
- Correlation

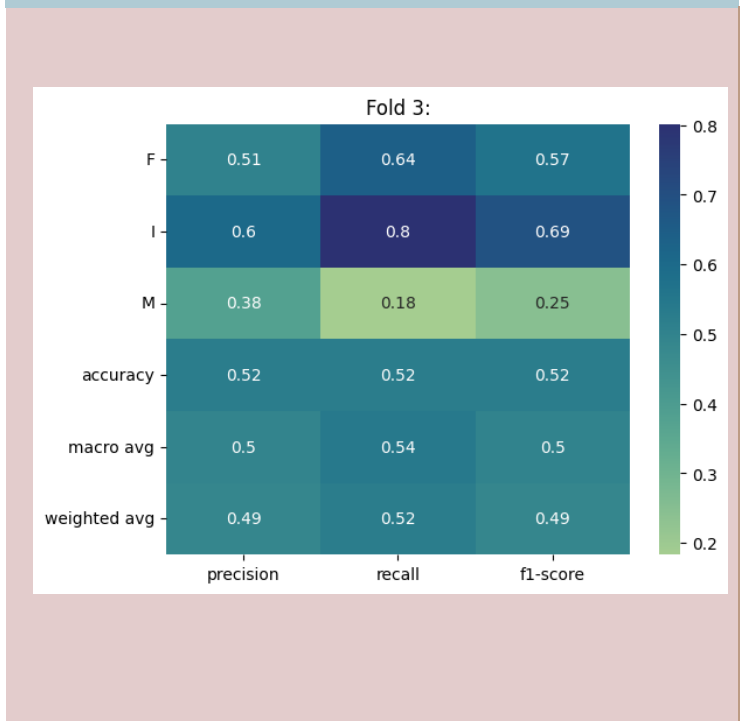
Length	-0.036066
Diameter	-0.038874
Height	-0.042077
Whole weight	-0.021391
Shucked weight	-0.001373
Viscera weight	-0.032067
Shell weight	-0.034854
Rings	-0.034627

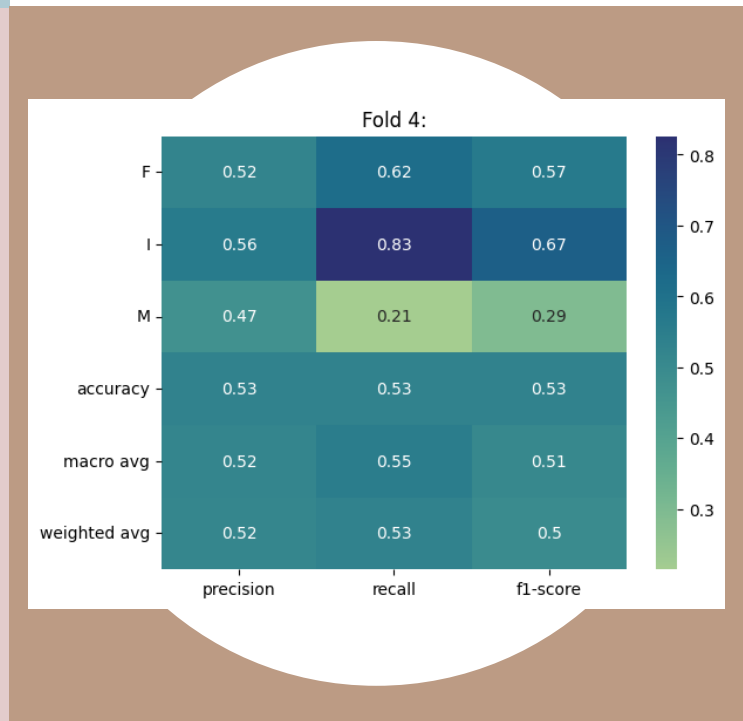


10-Fold Cross Validation

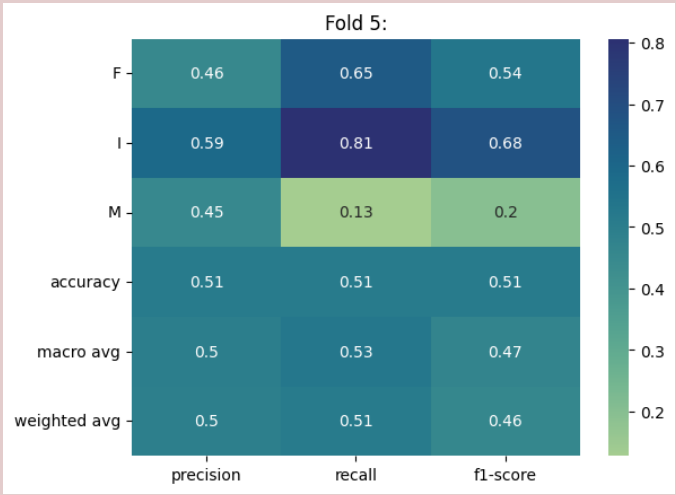


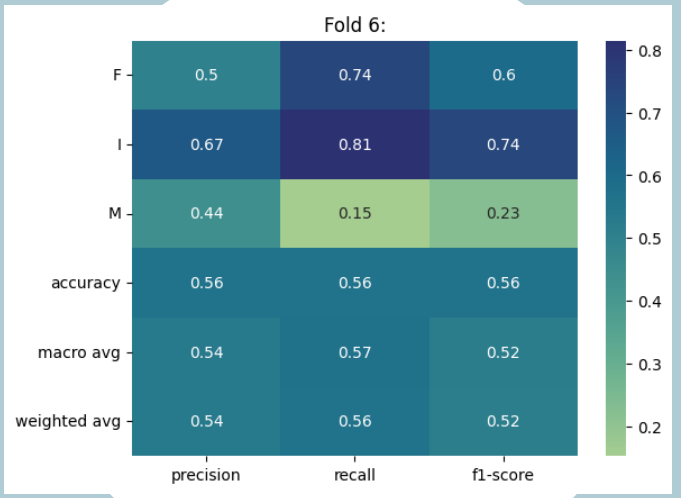


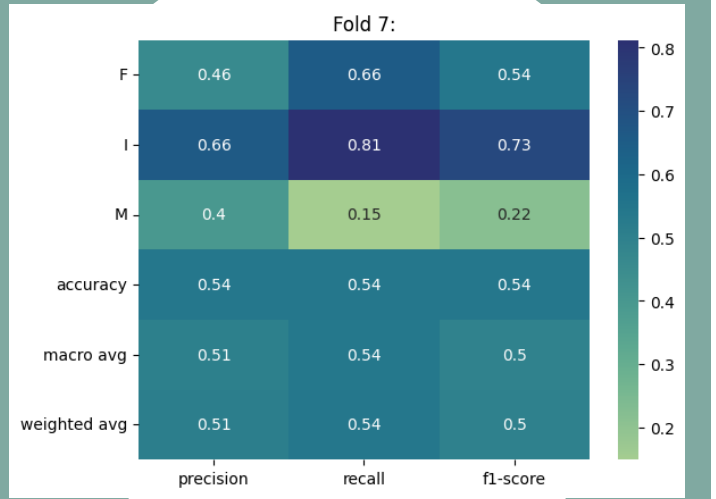


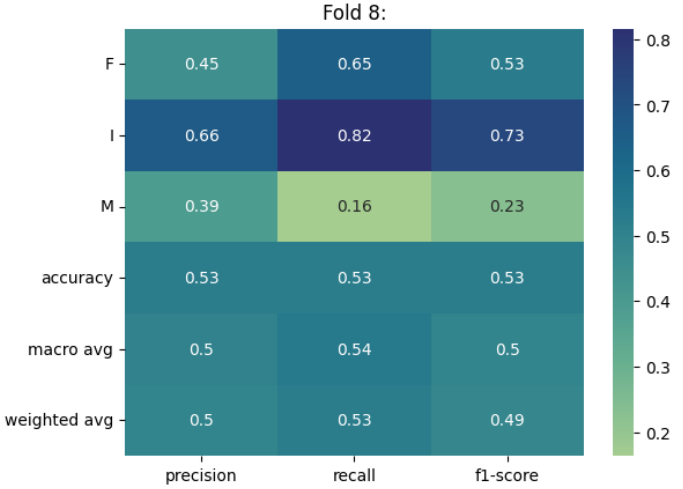


10-Fold Cross Validation



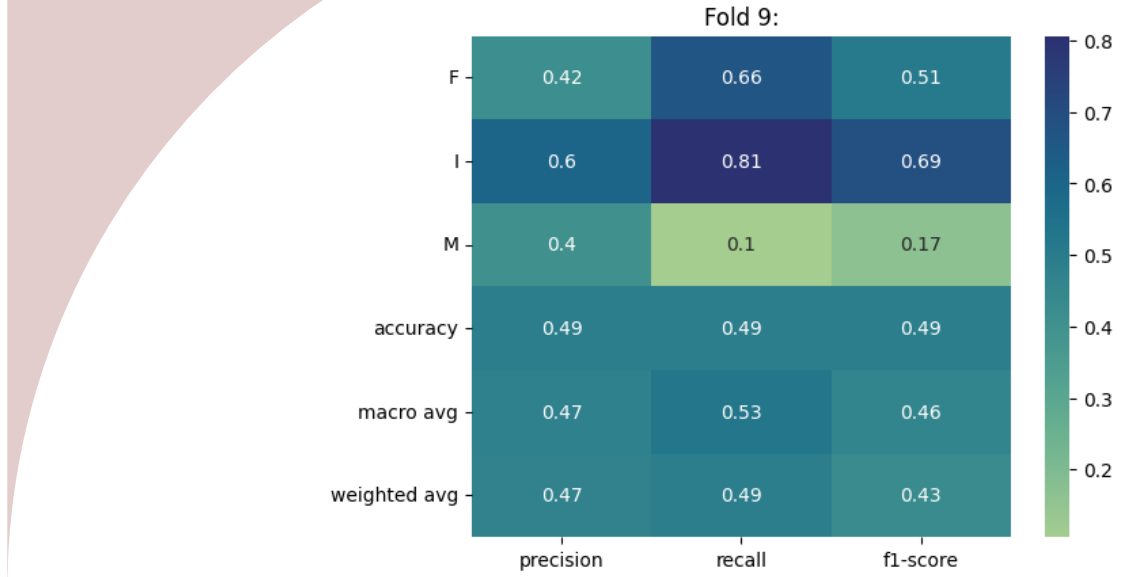


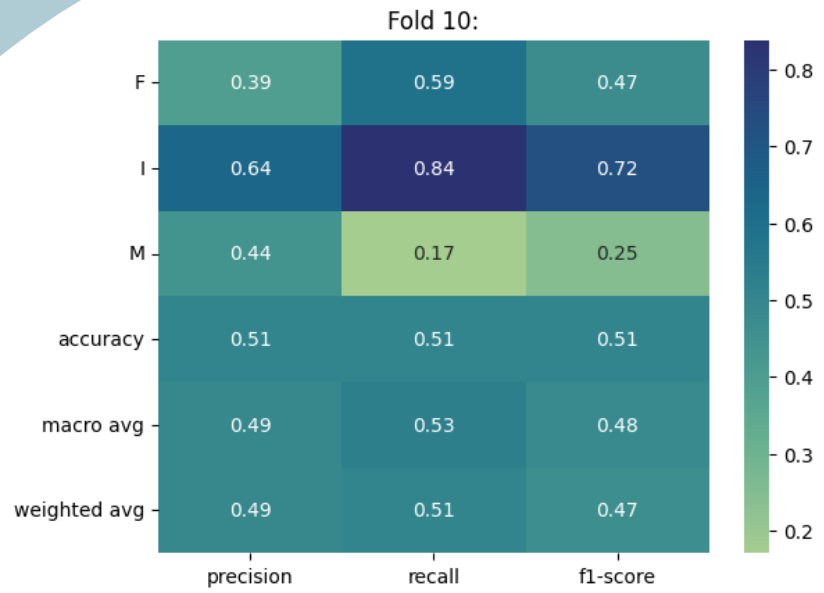


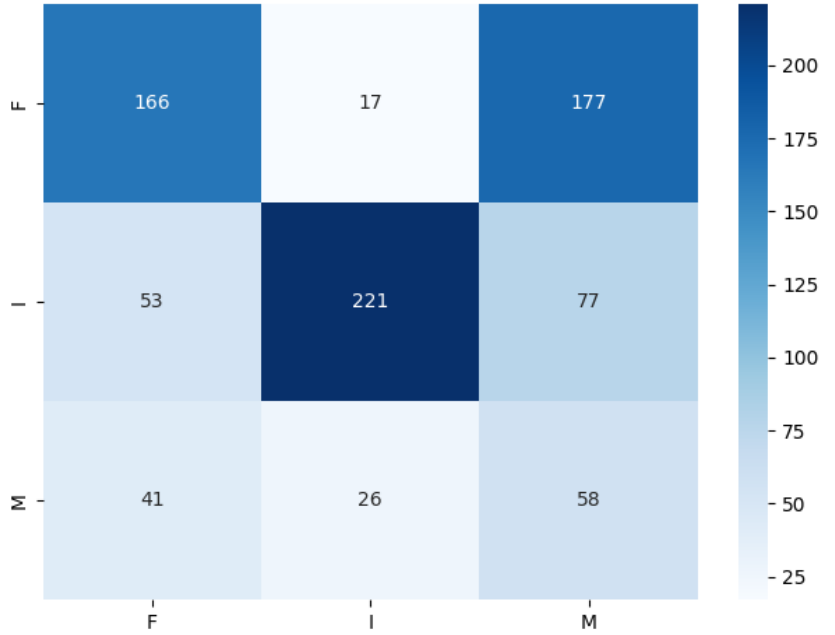


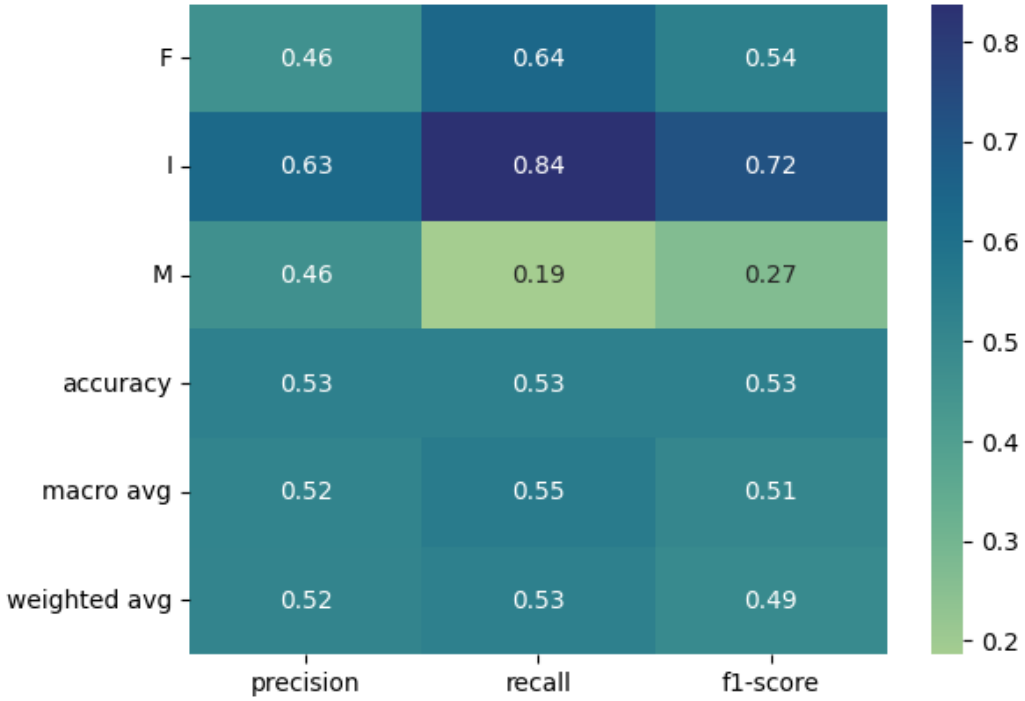
10-Fold Cross Validation

- average accuracy = 0.5197
- average precision = 0.4963
- average recall = 0.5197
- average f1-score = 0.4768







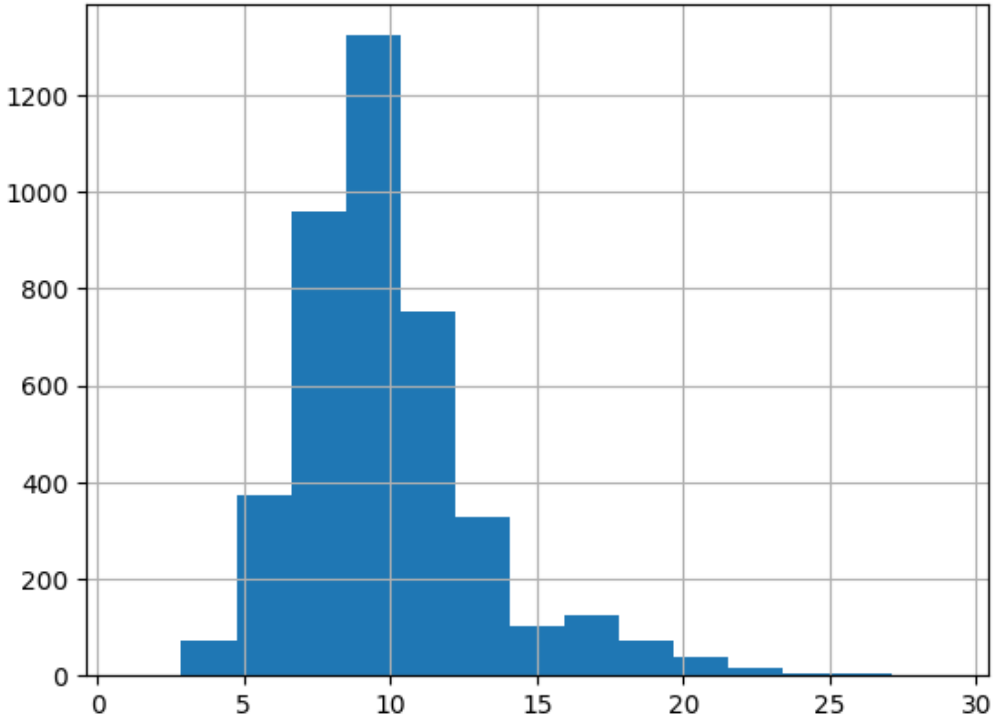


Model Evaluation

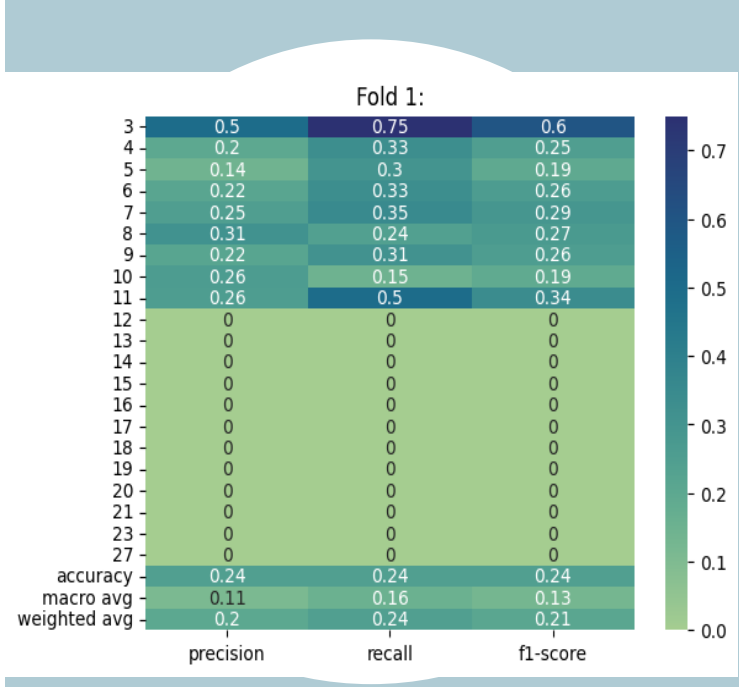
Task 2 : Rings

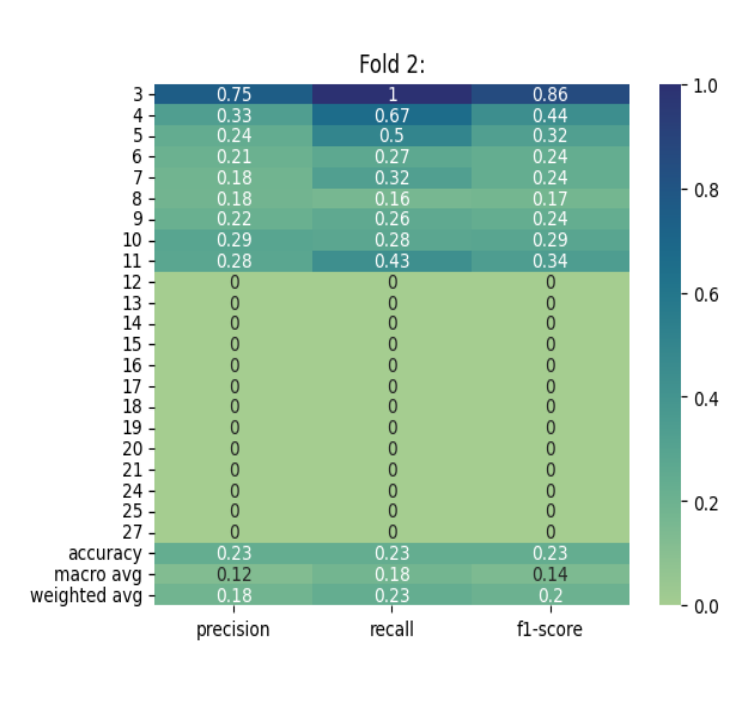
- Classes : 1-29
- Distribution
- Correlation

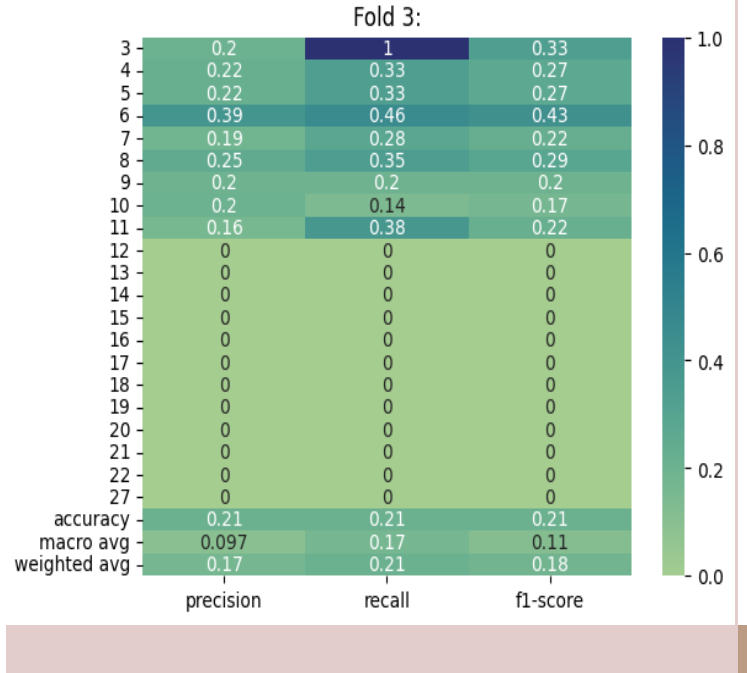
Sex	-0.034627
Length	0.556720
Diameter	0.574660
Height	0.557467
Whole weight	0.540390
Shucked weight	0.420884
Viscera weight	0.503819
Shell weight	0.627574

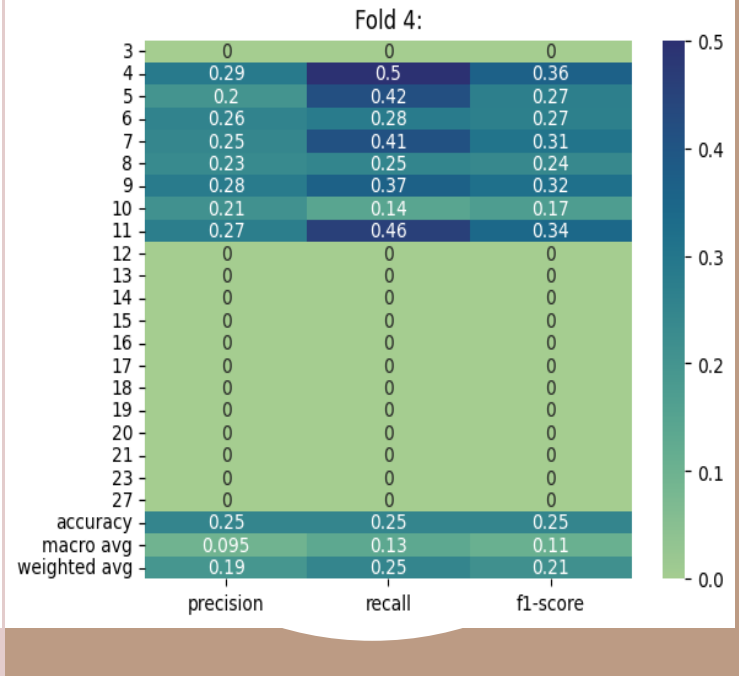


10-Fold Cross Validation

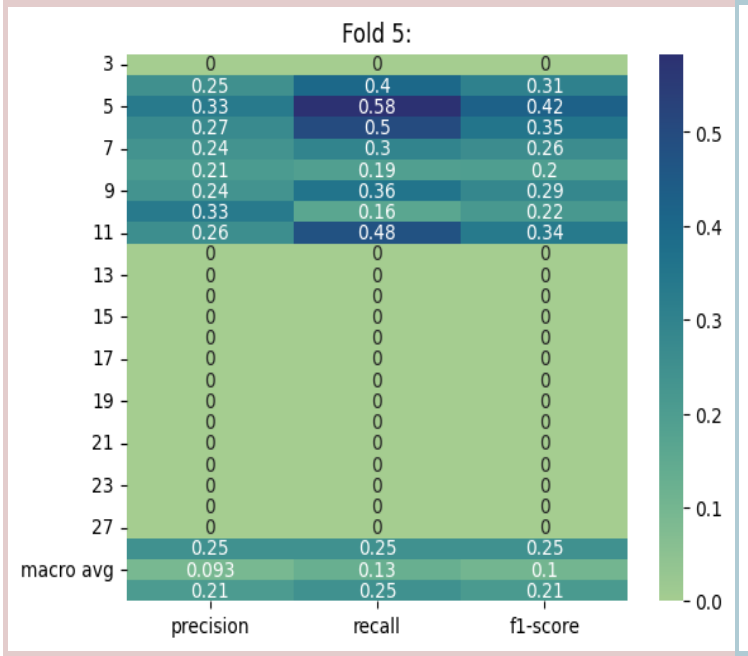


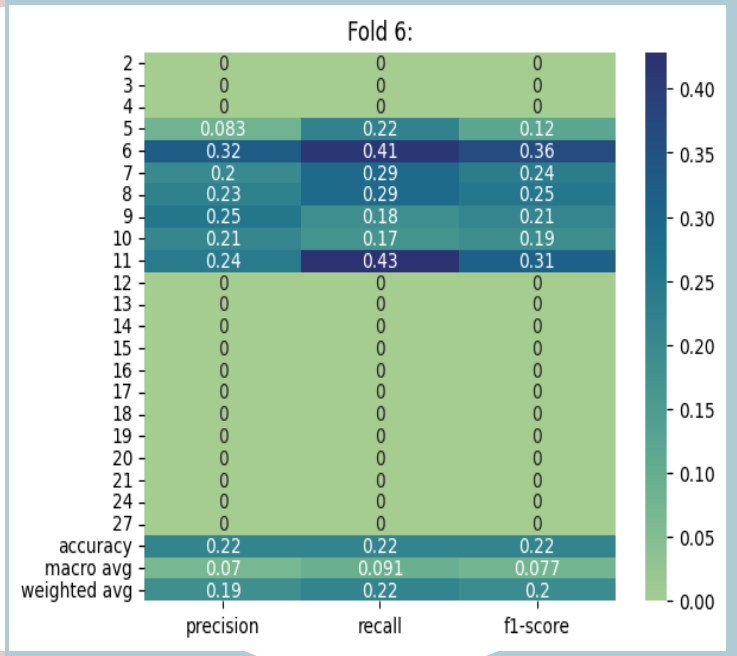


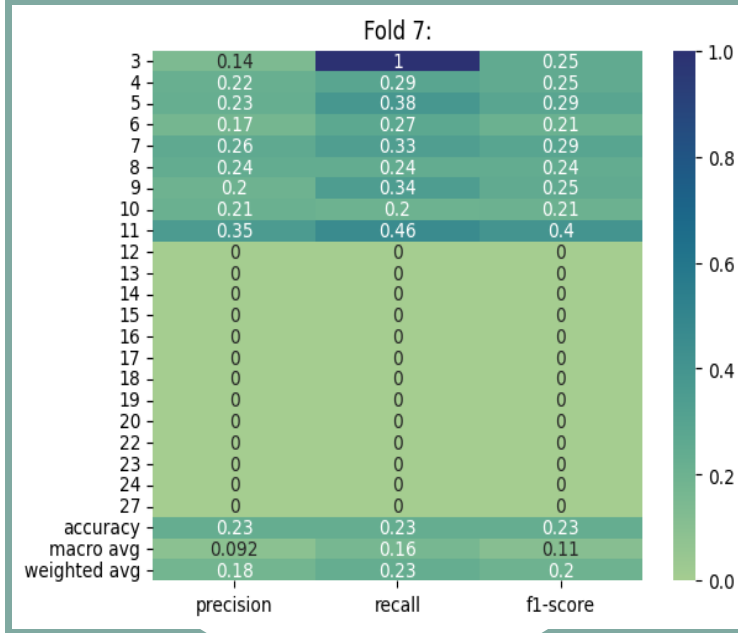


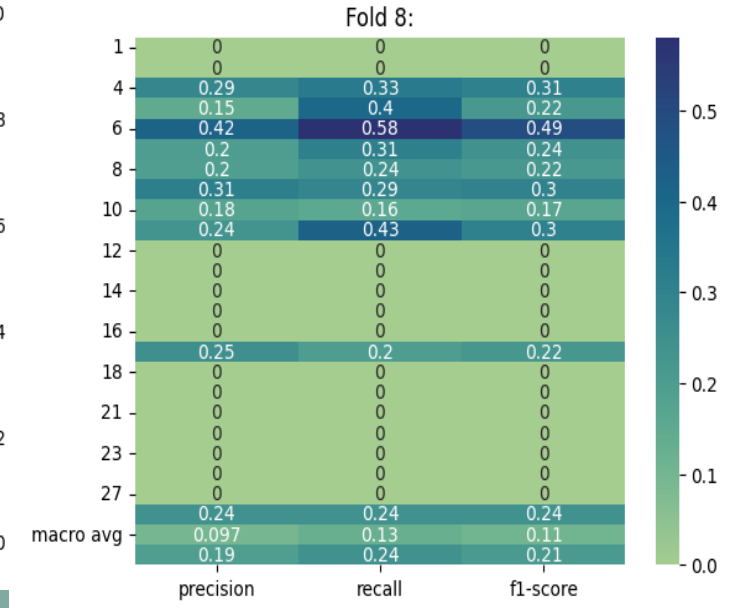


10-Fold Cross Validation



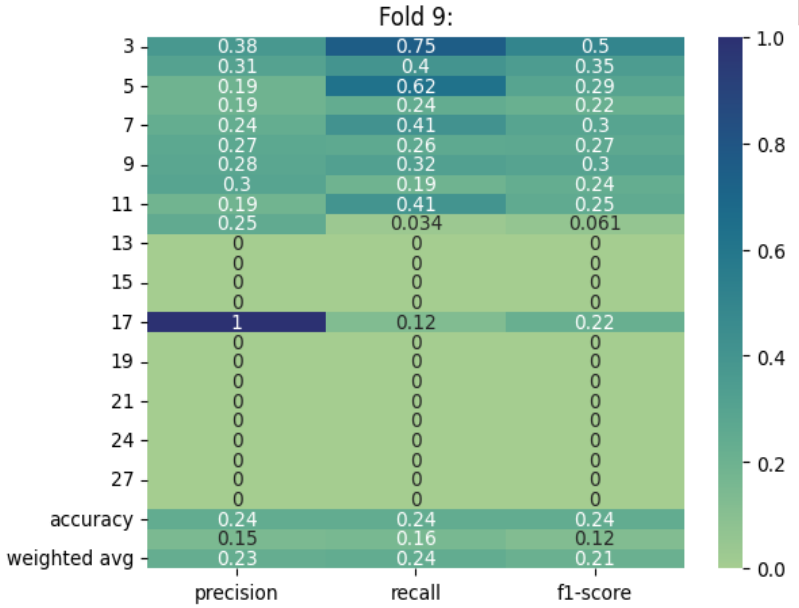


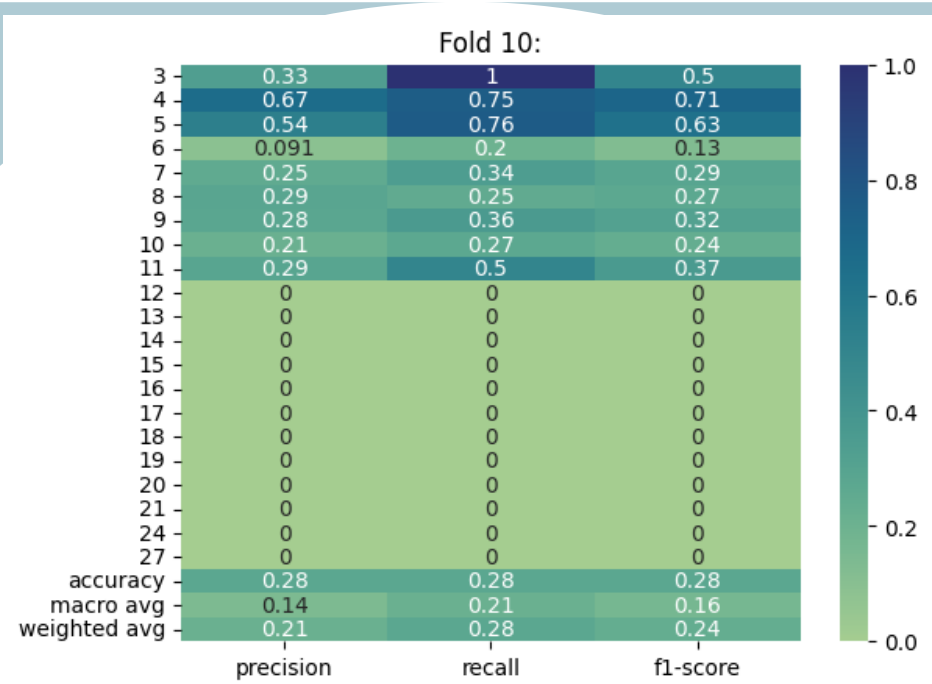




10-Fold Cross Validation

- average accuracy = 0.2394
- average precision = 0.1961
- average recall = 0.2394
- average f1-score = 0.2078





Model Evaluation