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| --- | --- | --- | --- | --- | --- | --- |
| **Headline-based Classifier** | | | | | | |
|  |  | **KNN** | **Decision Tree** | **Random Forest** | **Extra Tree** | **XGBoost** |
| **Word2Vec**  **With TF-IDF** | Test Accuracy | 0.4574 | 0.4822 | 0.5022 | **0.5465** | 0.5325 |
| F-1 | 0.3089 | 0.5412 | 0.6038 | **0.6054** | 0.6028 |
| ROC-AUC | 0.4519 | 0.4963 | 0.5139 | 0.5175 | **0.5394** |
| MCC | -0.1073 | -0.0075 | 0.0286 | 0.036 | **0.0792** |
| **Word2Vec**  **Without TF-IDF** | Test Accuracy | 0.5241 | 0.4816 | 0.4979 | **0.5456** | 0.4774 |
| F-1 | 0.4388 | 0.5760 | 0.6237 | 0.6400 | **0.6441** |
| ROC-AUC | **0.5195** | 0.4734 | 0.5107 | 0.5127 | 0.4981 |
| MCC | **0.0411** | -0.0552 | 0.0230 | 0.0283 | -0.0044 |

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| --- | --- | --- | --- | --- | --- | --- |
| **Article-based Classifier** | | | | | | |
|  |  | **KNN** | **Decision Tree** | **Random Forest** | **Extra Tree** | **XGBoost** |
| **Word2Vec**  **With TF-IDF** | Test Accuracy | **0.5415** | 0.4629 | 0.5173 | 0.5300 | 0.5242 |
| F-1 | 0.4933 | 0.5870 | 0.6054 | **0.6117** | 0.6094 |
| ROC-AUC | **0.5242** | 0.4696 | 0.5175 | 0.5152 | 0.4993 |
| MCC | **0.0491** | -0.0645 | 0.0360 | 0.0317 | -0.0016 |
| **Word2Vec**  **Without TF-IDF** | Test Accuracy | 0.4857 | **0.4926** | 0.4888 | 0.4855 | 0.4690 |
| F-1 | 0.3774 | 0.5838 | 0.6331 | **0.6404** | 0.6219 |
| ROC-AUC | 0.4951 | 0.4915 | 0.4771 | **0.5040** | 0.4860 |
| MCC | -0.0106 | -0.0175 | -0.0547 | **0.0091** | -0.0313 |