

# Effectivess comparison report

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## Experimento

Utilizei o executável *tcpp* compilado pelo Thiago Salles que estava no pacote que ele enviou no último email.

Para cada um dos *dataset* eu rodei *cross-validation 10-folds*. Para comparação dos métodos foi utilizado test t com correção de bonferroni. Os valores em negritos representam os vencedores e são estatisticamente significantes.

## Resultados

% latex table generated in R 3.2.3 by xtable 1.8-0 package % Fri Mar 4 02:01:28 2016

V1	V2	20NG	4UNI	ACM	REUTERS90	MED
BERT	microF1	<b>89.13</b> $\pm$ <b>0.41</b>	84.53 $\pm$ 0.9	74.66 $\pm$ 0.63	67.23 $\pm$ 0.86	0 $\pm$ 0
	macroF1	<b>89.11</b> $\pm$ <b>0.48</b>	<b>75.46</b> $\pm$ <b>1.98</b>	<b>65.05</b> $\pm$ <b>1.34</b>	<b>29.93</b> $\pm$ <b>2.56</b>	0 $\pm$ 0
BROOF	microF1	87.56 $\pm$ 0.23	<b>84.42</b> $\pm$ <b>0.7</b>	73.25 $\pm$ 0.69	66.48 $\pm$ 0.9	0 $\pm$ 0
	macroF1	87.58 $\pm$ 0.22	<b>76.19</b> $\pm$ <b>0.54</b>	<b>62.55</b> $\pm$ <b>1.5</b>	<b>29.53</b> $\pm$ <b>2.95</b>	0 $\pm$ 0
COMB1	microF1	<b>89.74</b> $\pm$ <b>0.57</b>	<b>86.4</b> $\pm$ <b>0.91</b>	<b>77.05</b> $\pm$ <b>0.64</b>	<b>77.99</b> $\pm$ <b>1.33</b>	0 $\pm$ 0
	macroF1	<b>89.53</b> $\pm$ <b>0.62</b>	<b>79.04</b> $\pm$ <b>1.95</b>	<b>64.36</b> $\pm$ <b>0.78</b>	<b>35.73</b> $\pm$ <b>3.96</b>	0 $\pm$ 0
LAZY	microF1	<b>88.22</b> $\pm$ <b>0.29</b>	82.04 $\pm$ 0.83	73.41 $\pm$ 0.79	66.2 $\pm$ 1.23	0 $\pm$ 0
	macroF1	<b>88.02</b> $\pm$ <b>0.33</b>	<b>72.55</b> $\pm$ <b>1.26</b>	<b>64.6</b> $\pm$ <b>1.97</b>	<b>28.17</b> $\pm$ <b>2.77</b>	0 $\pm$ 0
LXT	microF1	<b>88.49</b> $\pm$ <b>0.43</b>	82.15 $\pm$ 0.81	71.71 $\pm$ 0.69	65.82 $\pm$ 1.25	<b>83.87</b> $\pm$ <b>0.07</b>
	macroF1	<b>88.37</b> $\pm$ <b>0.43</b>	<b>72.7</b> $\pm$ <b>1.05</b>	<b>63.44</b> $\pm$ <b>0.77</b>	<b>29.55</b> $\pm$ <b>3.13</b>	<b>71.94</b> $\pm$ <b>0.43</b>
RF1000	microF1	86.49 $\pm$ 0.46	81.37 $\pm$ 0.85	71.41 $\pm$ 0.53	63.88 $\pm$ 0.96	0 $\pm$ 0
	macroF1	86.66 $\pm$ 0.5	<b>71.92</b> $\pm$ <b>1.3</b>	59.02 $\pm$ 0.6	25.68 $\pm$ 2.5	0 $\pm$ 0
RF	microF1	84.03 $\pm$ 0.39	81.25 $\pm$ 1.13	71.06 $\pm$ 0.48	63.83 $\pm$ 1.13	0 $\pm$ 0
	macroF1	84.26 $\pm$ 0.36	72.14 $\pm$ 1.08	58.66 $\pm$ 0.79	<b>25.34</b> $\pm$ <b>2.02</b>	0 $\pm$ 0
XT1000	microF1	<b>88.71</b> $\pm$ <b>0.52</b>	82.61 $\pm$ 1	73.53 $\pm$ 0.69	64.87 $\pm$ 0.95	0 $\pm$ 0
	macroF1	<b>88.72</b> $\pm$ <b>0.57</b>	<b>72.13</b> $\pm$ <b>1.52</b>	<b>60.83</b> $\pm$ <b>0.92</b>	<b>26.47</b> $\pm$ <b>2.91</b>	0 $\pm$ 0
XT	microF1	86.83 $\pm$ 0.49	82.49 $\pm$ 1.07	73.15 $\pm$ 0.68	64.89 $\pm$ 1.01	0 $\pm$ 0
	macroF1	86.91 $\pm$ 0.52	<b>72.24</b> $\pm$ <b>1.87</b>	<b>60.6</b> $\pm$ <b>0.92</b>	<b>26.36</b> $\pm$ <b>3.13</b>	0 $\pm$ 0

Table 1: Comparação entre todos os métodos