Table 1: Comparative analysis for the impact of cross-fitting on TMLEs and one-step estimators in conjunction with the use of random forests. RF refers to random forest with 200 trees and a minimum node size of 1, and CF denotes random forest with cross fitting using 5 folds.

	TMLEs						**One-step estimators**					
	Univariate Binary		*Univariate Continuous*				*Univariate Binary*		*Univariate Continuous*			
	$\psi_1(\hat{Q}^\star)$		$\psi_{2a}(\hat{Q}^\star)$		$\psi_{2b}(\hat{Q}^\star)$		$\psi_1^+(\hat{Q})$		$\psi_{2a}^+(\hat{Q})$		$\psi_{2b}^+(\hat{Q})$	
	RF	CF	RF	CF	RF	CF	RF	CF	RF	CF	RF	CF
n=500												
Bias	-0.406	-0.033	-0.123	0.312	-0.214	0.031	-0.114	-0.036	0.422	0.332	-0.217	0.062
SD	0.590	0.141	0.217	0.431	0.183	0.310	0.051	0.135	0.355	0.382	0.144	0.326
MSE	0.512	0.021	0.062	0.283	0.079	0.097	0.016	0.019	0.303	0.256	0.068	0.110
CI coverage	4.7%	85.7%	96.6%	72.3%	46.6%	87.5%	21.8%	86.8%	59.3%	71.9%	47.5%	85.1%
CI width	0.275	0.424	1.010	1.073	0.408	0.956	0.147	0.421	1.018	1.072	0.409	0.959
n=1e+03												
Bias	-0.458	-0.030	-0.165	0.160	-0.207	0.019	-0.111	-0.031	0.314	0.253	-0.217	0.045
SD	0.442	0.100	0.137	0.237	0.134	0.241	0.041	0.098	0.226	0.261	0.106	0.251
MSE	0.405	0.011	0.046	0.082	0.061	0.059	0.014	0.011	0.150	0.132	0.058	0.065
CI coverage	5.6%	90%	88.3%	79.6%	32.3%	87.1%	14.5%	90%	51.6%	66%	26.2%	83.9%
CI width	0.187	0.336	0.661	0.727	0.297	0.711	0.122	0.334	0.664	0.728	0.296	0.713
n=2e+03												
Bias	-0.490	-0.024	-0.146	0.171	-0.186	0.038	-0.106	-0.024	0.288	0.255	-0.206	0.059
SD	0.328	0.076	0.090	0.164	0.091	0.170	0.035	0.076	0.143	0.180	0.074	0.175
MSE	0.348	0.006	0.030	0.056	0.043	0.030	0.012	0.006	0.104	0.097	0.048	0.034
CI coverage	4.3%	90.1%	76%	71.7%	18.1%	87.7%	9.3%	90.1%	25.5%	50.1%	10.1%	85.7%
CI width	0.136	0.260	0.416	0.539	0.215	0.532	0.100	0.258	0.418	0.539	0.215	0.533