

TABLE XIII. COMPARISON OF THE CRACKING RATE OF FOUR DIFFERENT ATTACK METHODS OF CROSS-SITE SCENARIOS.

Experimental setup		RANKGUESS-PII	RFGuess-PII [84]	Targuess-I [81]	TarMarkov-3order [79]	TarMarkov-4order [79]
Attacking scenario	Number of guesses					
#1: 1M PII-000Webhost $\rightarrow$ PII-000Webhost_test	10	<b>8.36%</b>	5.78%	8.12%	1.95%	1.98%
	$10^5$	13.99%	<b>18.18%</b>	14.32%	13.08%	13.53%
	$10^8$	<b>23.38%</b>	23.22%	20.59%	22.16%	22.20%
	$10^{14}$	<b>73.06%</b>	62.52%	36.43%	51.46%	53.32%
#2: 1M PII-CSDN $\rightarrow$ PII-CSDN_test	10	14.36%	<b>24.20%</b>	14.55%	16.47%	15.55%
	$10^5$	<b>34.51%</b>	33.45%	34.11%	34.08%	34.48%
	$10^8$	<b>58.69%</b>	58.06%	34.08%	47.18%	48.92%
	$10^{14}$	<b>96.55%</b>	91.44%	43.67%	77.29%	79.99%
#3: 1M PII-12306 $\rightarrow$ PII-12306_test	10	12.53%	<b>16.32%</b>	11.28%	8.53%	8.54%
	$10^5$	<b>33.29%</b>	33.21%	29.88%	31.70%	31.56%
	$10^8$	57.92%	<b>59.97%</b>	34.11%	49.82%	46.07%
	$10^{14}$	<b>96.68%</b>	82.40%	44.86%	88.01%	83.43%
#4: 1M PII-Rootkit $\rightarrow$ PII-Rootkit_test	10	5.57%	<b>7.24%</b>	6.18%	4.91%	4.92%
	$10^5$	<b>33.22%</b>	23.21%	22.05%	20.21%	20.21%
	$10^8$	<b>42.78%</b>	42.54%	28.66%	29.98%	30.01%
	$10^{14}$	<b>89.37%</b>	82.40%	31.34%	69.89%	70.12%
#5: 1M PII-ClixSense $\rightarrow$ PII-ClixSense_test	10	8.36%	7.14%	<b>9.14%</b>	8.16%	8.11%
	$10^5$	<b>35.16%</b>	31.79%	27.55%	29.23%	30.25%
	$10^8$	<b>60.73%</b>	57.21%	31.63%	51.32%	52.43%
	$10^{14}$	<b>96.36%</b>	86.16%	56.93%	79.90%	84.21%
#6: PII-Mixed <sup>†</sup> : 90% $\rightarrow$ 10%	10	<b>18.07%</b>	15.36%	17.13%	16.97%	17.73%
	$10^5$	<b>31.91%</b>	29.50%	26.32%	27.89%	28.66%
	$10^8$	67.86%	<b>68.32%</b>	66.62%	63.69%	61.88%
	$10^{14}$	<b>99.28%</b>	96.36%	93.19%	91.82%	92.96%
#7: PII-Mixed: 70% $\rightarrow$ 30%	10	<b>16.55%</b>	15.36%	14.1%	13.94%	14.72%
	$10^5$	28.70%	27.60%	<b>29.31%</b>	26.63%	27.47%
	$10^8$	<b>62.67%</b>	60.17%	61.43%	57.58%	58.85%
	$10^{14}$	<b>93.60%</b>	91.25%	65.66%	88.23%	89.15%
#8: PII-Mixed: 50% $\rightarrow$ 50%	10	<b>16.17%</b>	15.16%	14.32%	12.86%	13.48%
	$10^5$	27.41%	26.78%	<b>28.76%</b>	26.90%	27.57%
	$10^8$	<b>57.16%</b>	56.44%	58.91%	49.77%	50.87%
	$10^{14}$	<b>91.73%</b>	89.23%	61.27%	85.50%	86.79%
#3A: $\frac{1}{2}$ PII-12306 $\rightarrow$ PII-CSDN	10	<b>11.88%</b>	11.28%	12.66%	10.28%	10.30%
	$10^5$	<b>24.69%</b>	23.56%	22.13%	20.78%	21.53%
	$10^8$	<b>47.19%</b>	45.48%	46.16%	41.36%	40.19%
	$10^{14}$	<b>81.50%</b>	78.13%	62.64%	75.66%	76.96%
#3B: $\frac{1}{4}$ PII-12306 $\rightarrow$ PII-CSDN	10	<b>10.31%</b>	9.73%	9.87%	8.52%	7.61%
	$10^5$	<b>18.68%</b>	17.35%	18.39%	17.10%	15.39%
	$10^8$	<b>41.92%</b>	38.34%	40.32%	38.61%	36.53%
	$10^{14}$	<b>72.36%</b>	69.63%	58.98%	61.94%	60.73%
#3C: $\frac{1}{8}$ PII-12306 $\rightarrow$ PII-CSDN	10	<b>7.12%</b>	7.46%	7.65%	5.27%	6.71%
	$10^5$	<b>14.66%</b>	14.58%	13.79%	12.13%	12.78%
	$10^8$	<b>26.77%</b>	26.16%	24.11%	23.33%	22.66%
	$10^{14}$	<b>58.02%</b>	56.21%	49.66%	55.44%	51.14%
#3A: $\frac{1}{2}$ PII-ClixSense $\rightarrow$ PII-000Webhost	10	<b>9.47%</b>	9.13%	8.56%	8.18%	7.93%
	$10^5$	<b>18.01%</b>	17.49%	16.60%	16.30%	15.85%
	$10^8$	<b>23.89%</b>	23.12%	24.45%	22.40%	21.75%
	$10^{14}$	<b>62.50%</b>	58.88%	53.56%	55.05%	59.62%
#3B: $\frac{1}{4}$ PII-ClixSense $\rightarrow$ PII-000Webhost	10	8.51%	7.28%	<b>8.98%</b>	6.24%	7.18%
	$10^5$	<b>16.07%</b>	15.65%	15.39%	12.38%	14.90%
	$10^8$	<b>23.92%</b>	22.48%	22.59%	20.70%	23.07%
	$10^{14}$	<b>58.36%</b>	55.67%	52.09%	50.01%	51.48%
#3C: $\frac{1}{8}$ PII-ClixSense $\rightarrow$ PII-000Webhost	10	<b>8.48%</b>	7.39%	8.12%	8.01%	8.31%
	$10^5$	<b>14.66%</b>	13.76%	12.91%	13.20%	14.63%
	$10^8$	<b>25.21%</b>	24.94%	24.16%	21.03%	23.38%
	$10^{14}$	<b>57.02%</b>	55.20%	48.93%	52.23%	52.54%

<sup>†</sup> We mix three English datasets (*i.e.*, 000Webhost, Rootkit, and ClixSense) and three Chinese datasets (*i.e.*, CSDN, 12306, and Dodonew) and use 90%, 70% and 50% for training and the test 10%, 30% and 50% all of them. Further, elucidates the stability of our approach in the case of a larger training dataset.