tag	accuracy	f1 score	accuracy for unknown words	accuracy for known words	number of unknown words	number of known words
A (إسم)	98.02 %	97.31 %	NULL	98.02 %	0	1113
B (رقم)	99.89 %	83.31 %	NULL	99.89 %	0	947
C (إسم معرف)	97.0 %	68.53 %	NULL	97.0 %	0	799
D (إضافة)	95.08 %	92.72 %	NULL	95.08 %	0	792
E (منعوت)	99.73 %	99.79 %	NULL	99.73 %	0	748
F (نعت)	94.54 %	62.61 %	NULL	94.54 %	0	843
G (حرف جر)	99.54 %	49.89 %	NULL	99.54 %	0	219
H (إسم مجرور)	96.7 %	64.63 %	NULL	96.7 %	0	182
I (وحدة قيس)	99.79 %	83.28 %	NULL	99.79 %	0	469
J (واو العطف)	98.77 %	49.69 %	NULL	98.77 %	0	162
K (فعل مبني للمجهول)	99.29 %	66.55 %	NULL	99.29 %	0	140
L (المفعول المطلق)	0.0 %	0.0 %	NULL	0.0 %	0	5
M (أداةُ عَطْفٌ غير واو العطف)	94.87 %	32.46 %	NULL	94.87 %	0	39
.	99.75 %	33.29 %	NULL	99.75 %	0	3946

Table 1: Performances for each tag using our ingredient extractor for fold 0 with $\lambda = 4$ when accuracy is 100% on first layer

tag	accuracy	f1 score	accuracy for unknown words	accuracy for known words	number of unknown words	unknown words percentage
0	98.44 %	81.45 %	NULL	98.43 %	0	0.0 %
1	-	-	-	-	-	-
2	-	-	-	-	-	-
3	-	-	-	-	-	-
4	-	-	-	-	-	-
5	-	-	-	-	-	-
6	-	-	-	-	-	-
7	-	-	-	-	-	-
8	-	-	-	-	-	-
9	-	-	-	-	-	-
Avg	-	-	-	-	-	-

Table 2: Performances in predicting ingredients states for fold 0 with $\lambda = 4$ when accuracy is 100% on first layer