

**Pre-treatment serum uric acid as an efficient predictor of prognosis in men with laryngeal squamous cell cancer: a retrospective cohort study**

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Table S1. Comparison of UA, UA/Cr ratio, and Cr between LSCC group and control group

	LSCC group	Control group	t value	P value
Age (years)	60.66±9.81	60.66±9.81	0.000	1.000
Gender (male)	814	814		
BMI (kg/m <sup>2</sup> )	22.94±3.22	22.86±3.10	0.431	0.667
UA (mmol/l)	0.330±0.075	0.356±0.078	6.850	<0.001
Cr (umol/l)	83.80±19.37	79.08±18.10	5.083	<0.001
UA/Cr ratio	4.04±1.04	4.62±1.12	10.847	<0.001
Logistic regression	OR	P value		95%CI
Cr	1.003	0.664		0.989-1.017
UA	0.671	0.002		0.018-2.165
UA/Cr ratio	0.584	<0.001		0.439-0.778

Data are expressed as mean±standard deviation (SD). Independent student's t-test and Logistic regression analyze was used. UA: uric acid. Cr: creatinine, BMI: body mass index.

Table S2. Comparison of demographics and clinical characteristic in patients with LSCC, stratified according to UA and UA/Cr ratio

	UA			UA/Cr ratio		
	UA	UA	P	UA/Cr	UA/Cr	P
	>0.315	≤0.315		ratio >3.98	ratio ≤3.98	
TNM stage						
I (n=195)	104	91		87	108	
II (n=302)	183	119		156	146	
III(n=216)	121	95		52	164	
IV(n=101)	33	68	<0.001	37	64	<0.001
T stage						
T <sub>1</sub> (n=195)	104	91		87	108	
T <sub>2</sub> (n=328)	199	129		168	160	
T <sub>3</sub> (n=239)	114	115		113	126	
T <sub>4</sub> (n =52)	14	38	<0.001	14	38	0.011
N stage						
N <sub>0</sub> (n=722)	453	269		341	381	
N <sub>1</sub> (n=31)	16	15		13	18	
N <sub>2</sub> (n=52)	22	30		25	27	
N <sub>3</sub> (n=9)	4	5	0.012	3	6	0.801
Age						
<60 (n=399)	243	156		188	211	
≥60(n=415)	198	217	0.087	194	221	0.916
BMI						
<22.94 (413)	216	197		189	224	
≥22.94 (401)	225	176	0.275	193	208	0.499
Hypertension						
No (n=585)	335	253		268	317	
Yes (n=229)	109	120	0.016	114	115	0.308
Smoking history						
No (n=244)	148	96		112	132	
Yes (n=570)	293	277	0.015	270	300	0.701
Drinking history						
No (n=505)	290	215		227	278	
Yes (n=309)	151	158	0.017	155	154	0.148
Tumor subsite						
Supraglottic (n=179)	89	90		85	94	
Glottis(n=624)	348	276		297	327	
Subglottic(n=11)	4	7	0.176	3	8	0.408

UA: uric acid. UA/Cr ratio: uric acid/creatinine, BMI: body mass index.

Table S3. The number of subjects in different group, according to UA and UA/Cr ratio

	I stage	II stage	III stage	IV stage	LSCC group	Control group	P value
UA							
UA >0.315	104	183	121	33	441	519	
UA ≤0.315	91	119	95	68	373	206	<0.05 <sup>a</sup> , 0.006 <sup>b</sup>
UA/Cr ratio							
UA/Cr ratio ≤3.98	108	146	164	64	432	202	
UA/Cr ratio >3.98	87	156	52	37	382	523	<0.001 <sup>a</sup> , <0.001 <sup>b</sup>

Chi-square test was used.

aP<0.05 for the difference between LSCC group and Control group.

bP-treuder <0.05 for the treuder among I stage, II stage, III stage, IV stage.