

Supplementary Information

Simple GFAAS Method for Determination of Pb, As, and Cd in Cannabidiol Extracts Used for Therapeutic Purposes

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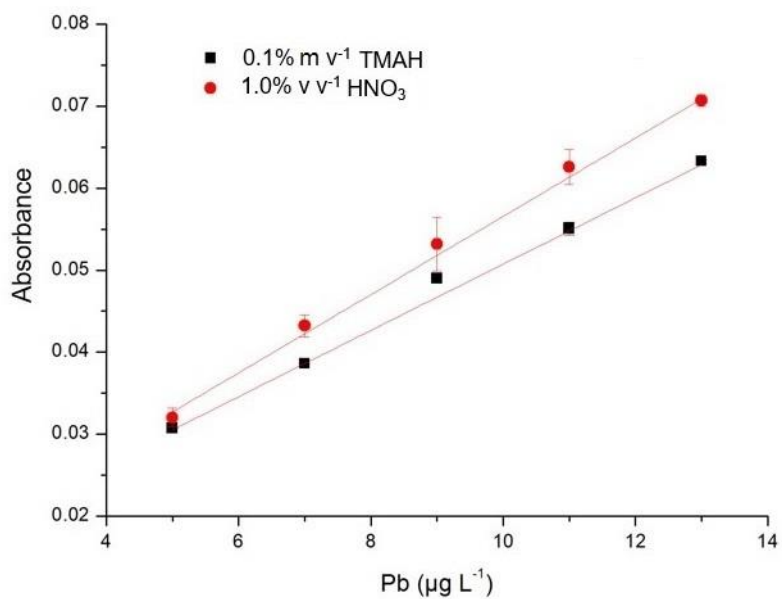
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Table S1. Pb recovery values using different reaction conditions, according to the 2³ full factorial design. The sample mass was fixed at 0.1000 g

Experiment	Replicate	[TMAH] / (m v ⁻¹)	time / min	Temperature / °C	Recovery / %
1	1	0.2	5	25	44
2	1	5.0	5	25	74
3	1	0.2	10	25	51
4	1	5.0	10	25	74
5	1	0.2	5	80	68
6	1	5.0	5	80	89
7	1	0.2	10	80	90
8	1	5.0	10	80	83
9	2	0.2	5	25	61
10	2	5.0	5	25	70
11	2	0.2	10	25	49
12	2	5.0	10	25	73
13	2	0.2	5	80	84
14	2	5.0	5	80	76
15	2	0.2	10	80	105
16	2	5.0	10	80	79

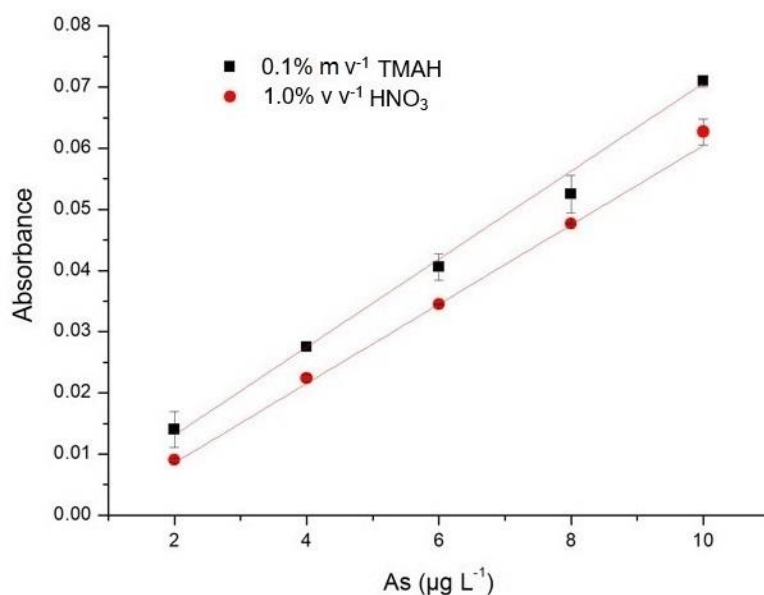
The values in bold represent the best reactional sample treatment conditions.

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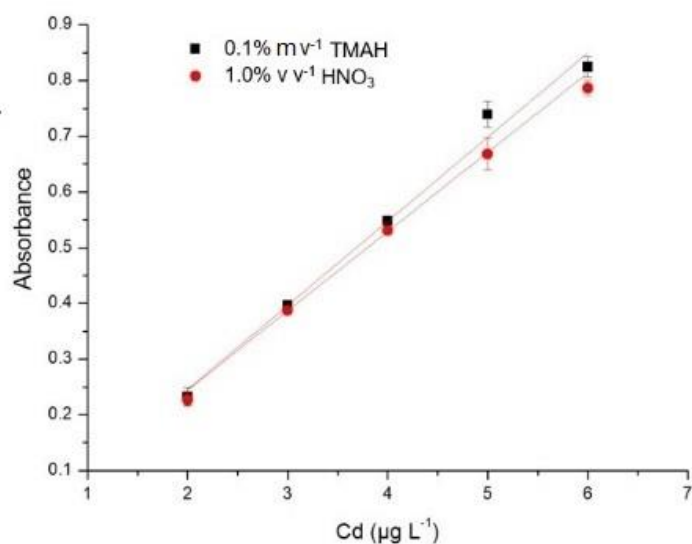
Equation	y = a + b*x		
Adj. R-Square	0.99714	0.99794	
		Value	Standard Error
0.1% m v ⁻¹ TMAH	Intercept	0.01028	7.57192E-4
0.1% m v ⁻¹ TMAH	Slope	0.00405	1.08217E-4
1.0% v v ⁻¹ HNO ₃	Intercept	0.00881	0.00117
1.0% v v ⁻¹ HNO ₃	Slope	0.00478	1.08386E-4

Figure S1. Analytical curves constructed for Pb in acidic medium (1.0% (v v⁻¹) HNO₃) and in alkaline medium (0.1% (m v⁻¹) TMAH). Calibration range: 5.0-13 µg L⁻¹; chemical modifier: 5 µg Pd / 3 µg Mg; standard solution volume: 20 µL; chemical modifier volume: 5 µL.



Equation	y = a + b*x		
Adj. R-Square	0.99877	0.99934	
		Value	Standard Error
0.1% m v ⁻¹ TMAH	Intercept	-0.00128	5.25689E-4
0.1% m v ⁻¹ TMAH	Slope	0.00719	1.2595E-4
1.0% v v ⁻¹ HNO ₃	Intercept	-0.00442	5.01275E-4
1.0% v v ⁻¹ HNO ₃	Slope	0.00649	8.34432E-5

Figure S2. Analytical curves constructed for As in acidic medium (1.0% (v v⁻¹) HNO₃) and in alkaline medium (0.1% (m v⁻¹) TMAH). Calibration range: 2.0-10 $\mu\text{g L}^{-1}$; chemical modifier: 2.5 $\mu\text{g Pd}$; standard solution volume: 20 μL ; chemical modifier volume: 5 μL .



Equation	y = a + b*x		
Adj. R-Square	0.99706	0.99548	
		Value	Standard Error
0.1% m v ⁻¹ TMAH	Intercept	-0.05614	0.01295
0.1% m v ⁻¹ TMAH	Slope	0.1509	0.0041
1.0% v v ⁻¹ HNO ₃	Intercept	-0.03979	0.01786
1.0% v v ⁻¹ HNO ₃	Slope	0.14222	0.00479

Figure S3. Analytical curves constructed for Cd in acidic medium (1.0% (v v⁻¹) HNO₃) and in alkaline medium (0.1% (m v⁻¹) TMAH). Calibration range: 2.0-6.0 µg L⁻¹; chemical modifier: 2.5 µg Pd; standard solution volume: 20 µL; chemical modifier volume: 5 µL.