

SURNAMES IN ALBANIA

A study of the population of Albania through isonymy

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Table S1. Distribution of isonymy parameters (number of surnames N ; number of different surnames S ; Fisher's α ; Karlin-McGregor ν ; isonymy I ; F_{ST}) and geographical coordinates (latitude LAT and longitude LON) in 321 communes and Bashkias of Albania. Surnames of the electors in the 2009 elections.

Prefecture	District	Commune	N	S	α	ν	I	F_{ST}	LAT	LON
BERAT	BERAT	Berat	48,094	3,159	636	0.01306	0.00157	0.000398	40.42	19.57
BERAT	BERAT	Ura Vajgurorë	8,471	750	206	0.02370	0.00484	0.001240	40.46	19.53
BERAT	BERAT	Kutalli	8,647	282	38	0.00437	0.02572	0.006461	40.47	19.47
BERAT	BERAT	Lumas	4,803	194	40	0.00812	0.02482	0.006255	40.50	20.00
BERAT	BERAT	Otlak	10,130	667	153	0.01486	0.00650	0.001651	40.45	19.56
BERAT	BERAT	Poshnjë	6,961	343	73	0.01025	0.01369	0.003457	40.48	19.50
BERAT	BERAT	Roshnik	2,849	160	57	0.01935	0.01748	0.004458	40.44	20.02
BERAT	BERAT	Sinjë	3,799	245	82	0.02107	0.01209	0.003087	40.39	19.52
BERAT	BERAT	Tërpan	2,028	185	78	0.03675	0.01276	0.003313	40.33	20.02
BERAT	BERAT	Velabisht	8,140	556	196	0.02348	0.00509	0.001302	40.40	19.56
BERAT	BERAT	Vertop	5,187	361	105	0.01969	0.00951	0.002425	40.38	20.03
BERAT	BERAT	Cukalat	2,975	119	25	0.00824	0.03891	0.009810	40.44	19.47
BERAT	KUCOVE	Kuçovë	22,939	1,872	427	0.01827	0.00234	0.000596	40.48	19.55
BERAT	KUCOVE	Kozare	5,501	236	33	0.00587	0.02990	0.007521	40.50	19.54
BERAT	KUCOVE	Perondi	7,454	536	90	0.01191	0.01102	0.002788	40.47	19.56
BERAT	SKRAPA	Çorovodë	5,058	550	175	0.03337	0.00570	0.001474	40.30	20.13
BERAT	SKRAPA	Polican	6,357	731	234	0.03550	0.00426	0.001104	40.37	20.06
BERAT	SKRAPA	Bogovë	2,479	222	82	0.03200	0.01205	0.003114	40.34	20.09
BERAT	SKRAPA	Çepan	865	124	52	0.05589	0.01914	0.005073	40.25	20.16
BERAT	SKRAPA	Gjerbës	1,947	189	92	0.04480	0.01083	0.002836	40.38	20.15
BERAT	SKRAPA	Potom	837	73	33	0.03706	0.03008	0.007818	40.29	20.22
BERAT	SKRAPA	Qendër	3,856	326	103	0.02586	0.00968	0.002484	40.31	20.12
DIBER	DIBER	Peshkopi	12,384	734	220	0.01746	0.00452	0.001152	41.41	20.26
DIBER	DIBER	Arras	2,594	108	40	0.01505	0.02462	0.006251	41.44	20.20
DIBER	DIBER	Fushë Çidhen	2,373	95	34	0.01385	0.02915	0.007393	41.45	20.20
DIBER	DIBER	Fushe Muhurr	2,324	77	30	0.01264	0.03253	0.008239	41.41	20.20
DIBER	DIBER	Kala e Dodës	2,120	99	34	0.01543	0.02922	0.007424	41.49	20.26
DIBER	DIBER	Kastriot	5,010	203	47	0.00912	0.02125	0.005361	41.43	20.23
DIBER	DIBER	Lurë	972	46	16	0.01550	0.06125	0.015570	41.49	20.13
DIBER	DIBER	Luzni	1,906	84	33	0.01656	0.03021	0.007684	41.39	20.23
DIBER	DIBER	Maqellarë	8,603	335	95	0.01087	0.01047	0.002648	41.35	20.30
DIBER	DIBER	Melan	3,112	145	55	0.01728	0.01796	0.004569	41.39	20.28
DIBER	DIBER	Qendër Tomin	5,835	251	85	0.01422	0.01174	0.002979	41.42	20.25
DIBER	DIBER	Sllovë	2,149	102	43	0.01958	0.02277	0.005808	41.49	20.25
DIBER	DIBER	Zall Dardhë	1,484	73	31	0.02009	0.03182	0.008124	41.48	20.20
DIBER	MAT	Burrel	12,116	826	207	0.01677	0.00482	0.001226	41.36	20.01
DIBER	MAT	Klos	7,138	397	117	0.01608	0.00850	0.002161	41.30	20.06
DIBER	MAT	Derjan	2,666	164	71	0.02580	0.01396	0.003585	41.41	20.02
DIBER	MAT	Gurrë	2,703	107	35	0.01269	0.02799	0.007090	41.32	20.02
DIBER	MAT	Baz	2,281	113	24	0.01011	0.04118	0.010405	41.38	19.56
DIBER	MAT	Komsi	3,643	216	61	0.01634	0.01627	0.004136	41.35	19.59
DIBER	MAT	Lis	3,340	205	92	0.02671	0.01079	0.002698	41.38	20.05
DIBER	MAT	Rukaj	2,580	135	46	0.01741	0.02141	0.005450	41.39	20.03
DIBER	MAT	Suç	2,408	180	79	0.03174	0.01251	0.003232	41.34	20.04
DIBER	MAT	Ulëz	1,441	97	24	0.01594	0.04108	0.010443	41.41	19.54
DIBER	MAT	Xibër	2,353	143	54	0.02240	0.01821	0.004659	41.27	20.02
DIBER	BULKIZE	Bulqizë	8,340	564	158	0.01851	0.00632	0.001610	41.29	20.13
DIBER	BULKIZE	Gjoricë	3,241	127	34	0.01014	0.02926	0.007393	41.32	20.27
DIBER	BULKIZE	Martanesh	1,772	150	55	0.02992	0.01796	0.004632	41.23	20.14
DIBER	BULKIZE	Ostren	3,690	204	34	0.00903	0.02889	0.007291	41.25	20.28
DIBER	BULKIZE	Shupenzë	4,266	187	61	0.01408	0.01615	0.004097	41.32	20.25
DIBER	BULKIZE	Zerqan	3,559	189	77	0.02096	0.01296	0.003309	41.30	20.21
DIBER	BULKIZE	Fushë Bulqizë	2,591	128	61	0.02272	0.01633	0.004180	41.31	20.18
DURRES	DURRES	Durrës	147,179	7,977	990	0.00669	0.00101	0.000254	41.19	19.27
DURRES	DURRES	Manëz	7,475	420	54	0.00715	0.01827	0.004602	41.26	19.35
DURRES	DURRES	Sukth	17,053	1,512	486	0.02768	0.00206	0.000529	41.23	19.32
DURRES	DURRES	Shijak	9,538	814	80	0.00832	0.01236	0.003117	41.21	19.34
DURRES	DURRES	Gjepalaj	4,089	176	33	0.07940	0.02968	0.007481	41.20	19.35
DURRES	DURRES	Ishëm	5,630	268	97	0.01677	0.01031	0.002622	41.32	19.36
DURRES	DURRES	Katund i Ri	10,319	696	179	0.01700	0.00557	0.001418	41.24	19.31
DURRES	DURRES	Maminas	5,079	208	31	0.00598	0.03173	0.007981	41.23	19.36
DURRES	DURRES	Rrashbull	18,521	1,537	321	0.01702	0.00310	0.000791	41.20	19.30
DURRES	DURRES	Xhafzotaj	11,779	787	126	0.01059	0.00787	0.001990	41.21	19.33

DURRES	KRUJE	Krujë	11,775	735	181	0.01509	0.00551	0.001400	41.30	19.48
DURRES	KRUJE	Fushë Krujë	16,318	1,007	192	0.01162	0.00519	0.001313	41.29	19.43
DURRES	KRUJE	Bubq	5,725	233	57	0.00987	0.01724	0.004355	41.28	19.39
DURRES	KRUJE	Cudhi	2,258	122	51	0.02195	0.01935	0.004948	41.30	19.52
DURRES	KRUJE	Kodër Thumanë	10,401	578	139	0.01312	0.00718	0.001820	41.33	19.41
DURRES	KRUJE	Nikël	6,373	338	73	0.01353	0.01353	0.003422	41.27	19.45
ELBASAN	ELBASAN	Elbasan	91,507	4,854	714	0.00774	0.00140	0.000353	41.06	20.04
ELBASAN	ELBASAN	Cërrik	10,721	1,010	319	0.02885	0.00313	0.000783	41.02	19.59
ELBASAN	ELBASAN	Belsh+Rrase	11,063	239	27	0.00242	0.03607	0.009041	40.59	19.53
ELBASAN	ELBASAN	Bradashesh+Gracam	10,322	479	133	0.01266	0.00750	0.001900	41.06	20.01
ELBASAN	ELBASAN	Fierzë	2,661	153	31	0.01124	0.03202	0.008098	40.55	19.51
ELBASAN	ELBASAN	Funarë	2,220	80	41	0.01782	0.02430	0.006170	41.12	20.04
ELBASAN	ELBASAN	Gostimë	8,327	282	51	0.00609	0.01926	0.004845	41.00	20.01
ELBASAN	ELBASAN	Grekan	3,387	133	34	0.00985	0.02884	0.007283	40.56	19.57
ELBASAN	ELBASAN	Gjinar + Zavalin	4,850	97	34	0.00286	0.02904	0.007311	41.02	20.11
ELBASAN	ELBASAN	Gjergjan	5,145	250	58	0.01107	0.01708	0.004318	41.03	20.02
ELBASAN	ELBASAN	Kajan	4,405	168	31	0.00684	0.03197	0.008048	40.55	19.53
ELBASAN	ELBASAN	Klos	2,694	114	25	0.00914	0.03870	0.009767	40.57	20.01
ELBASAN	ELBASAN	Labinot Mal	3,613	143	75	0.02023	0.01323	0.003377	41.11	20.09
ELBASAN	ELBASAN	Labinot Fushë	4,099	174	48	0.01153	0.02050	0.005187	41.08	20.08
ELBASAN	ELBASAN	Mollas	5,020	153	32	0.00634	0.03031	0.007628	40.56	20.00
ELBASAN	ELBASAN	Papër	6,061	292	48	0.00785	0.02046	0.005157	41.04	19.57
ELBASAN	ELBASAN	Shalës	4,622	164	29	0.00606	0.03430	0.008629	41.00	19.57
ELBASAN	ELBASAN	Shirgjan	6,606	317	92	0.01368	0.01081	0.002739	41.03	20.03
ELBASAN	ELBASAN	Shushicë	6,952	310	92	0.01303	0.01078	0.002732	41.06	20.09
ELBASAN	ELBASAN	Tregan	2,910	122	30	0.00988	0.03300	0.008337	41.02	20.04
ELBASAN	GRAMSH	Gramsh+Kushovë+Skend	11,950	674	149	0.01228	0.00669	0.001694	40.52	20.11
ELBASAN	GRAMSH	Kodovjat	2,893	191	75	0.02496	0.01332	0.003417	40.48	20.15
ELBASAN	GRAMSH	Kukur	2,194	100	35	0.01568	0.02782	0.007070	40.52	20.22
ELBASAN	GRAMSH	Pishaj+Porokan+Sult	6,513	286	76	0.01153	0.01300	0.003289	40.50	20.13
ELBASAN	GRAMSH	Tunjë	1,512	82	33	0.02133	0.02944	0.007526	40.50	20.07
ELBASAN	PEQIN	Peqin+Karine	8,358	886	177	0.02071	0.00563	0.001437	41.03	19.45
ELBASAN	PEQIN	Gjocaj	4,679	179	51	0.01936	0.01936	0.004894	41.02	19.43
ELBASAN	PEQIN	Pajovë	5,767	184	29	0.00491	0.03402	0.008548	41.04	19.50
ELBASAN	PEQIN	Përparim	3,810	150	32	0.00824	0.03063	0.007724	41.03	19.48
ELBASAN	PEQIN	Shezë	3,571	64	7	0.00194	0.12623	0.031629	41.01	19.49
ELBASAN	LIBRAZHD	Librazhd+Strebleve	7,772	664	150	0.01890	0.00664	0.001692	41.11	20.19
ELBASAN	LIBRAZHD	Perrenjas	5,796	500	67	0.01127	0.01493	0.003775	41.04	20.33
ELBASAN	LIBRAZHD	Hotolisht	4,562	136	37	0.00791	0.02678	0.006750	41.09	20.24
ELBASAN	LIBRAZHD	Lunik	2,559	104	35	0.01334	0.02810	0.007122	41.17	20.19
ELBASAN	LIBRAZHD	Orenjë	3,493	152	63	0.01770	0.01565	0.003983	41.17	20.12
ELBASAN	LIBRAZHD	Polis	3,443	112	32	0.00911	0.03654	0.007736	41.09	20.14
ELBASAN	LIBRAZHD	Qendër Librazhd	7,561	216	60	0.00784	0.01647	0.004151	41.12	20.19
ELBASAN	LIBRAZHD	Qukës	7,114	222	50	0.00692	0.01981	0.004986	41.05	20.26
ELBASAN	LIBRAZHD	Rrajcë	6,873	160	33	0.00468	0.03009	0.007559	41.06	20.35
ELBASAN	LIBRAZHD	Stravaj	1,995	95	28	0.01384	0.03448	0.008747	41.00	20.25
FIER	FIER	Fier	65,355	3,745	576	0.00874	0.00174	0.000438	40.43	19.33
FIER	FIER	Patos	23,220	1,616	296	0.01259	0.00337	0.000853	40.41	19.37
FIER	FIER	Roskovec	6,110	387	24	0.00387	0.04052	0.010170	40.44	19.42
FIER	FIER	Cakran	11,190	283	71	0.00631	0.01390	0.003496	40.36	19.37
FIER	FIER	Darmernas	8,779	630	100	0.01126	0.00992	0.002507	40.45	19.30
FIER	FIER	Frakull	7,088	277	25	0.00351	0.03865	0.009697	40.39	19.30
FIER	FIER	Kuman	5,644	300	57	0.00998	0.01728	0.004365	40.44	19.41
FIER	FIER	Kurjan	3,690	207	52	0.01387	0.01891	0.004795	40.43	19.46
FIER	FIER	Libofshe	7,636	344	89	0.01150	0.01114	0.002818	40.50	19.33
FIER	FIER	Levan	12,002	823	154	0.01266	0.00646	0.001636	40.41	19.29
FIER	FIER	Mbrostar Ura	7,142	387	37	0.00504	0.02697	0.006776	40.45	19.35
FIER	FIER	Portez	7,829	521	81	0.01014	0.01233	0.003115	40.42	19.35
FIER	FIER	Qender	8,339	702	175	0.02054	0.00569	0.001452	40.44	19.32
FIER	FIER	Ruzhdie	2,210	121	37	0.01621	0.02672	0.006794	40.40	19.42
FIER	FIER	Strum	6,055	191	34	0.00553	0.02887	0.007260	40.45	19.44
FIER	FIER	Topoje	5,626	323	101	0.01759	0.00983	0.002503	40.46	19.26
FIER	FIER	Zharres	5,789	299	37	0.00629	0.02662	0.006698	40.43	19.39
FIER	LUSHNJE	Lushnjë	40,478	2,364	305	0.00751	0.00326	0.000817	40.56	19.42
FIER	LUSHNJE	Divjakë	9,710	507	100	0.01013	0.00998	0.002520	41.00	19.32
FIER	LUSHNJE	Allkaj	4,328	144	40	0.00906	0.02467	0.006224	40.51	19.45
FIER	LUSHNJE	Ballagat	2,511	67	11	0.00422	0.08603	0.021607	41.00	19.46
FIER	LUSHNJE	Bubullimë	5,218	223	56	0.01047	0.01780	0.004499	40.49	19.39
FIER	LUSHNJE	Dushk	7,698	594	64	0.00814	0.01559	0.003930	41.00	19.40

FIER	LUSHNJE	Fier-Shegan	6,495	297	47	0.00708	0.02116	0.005329	40.52	19.47
FIER	LUSHNJE	Golem	5,277	483	103	0.01910	0.00964	0.002458	40.58	19.41
FIER	LUSHNJE	Grabian	4,274	388	99	0.02247	0.01008	0.002578	40.57	19.35
FIER	LUSHNJE	Gradishtë	7,712	390	107	0.01360	0.00933	0.002364	40.53	19.35
FIER	LUSHNJE	Hysgjokaj	2,357	53	10	0.00392	0.09745	0.024469	40.58	19.47
FIER	LUSHNJE	Karbunarë	3,778	170	26	0.00678	0.03735	0.009403	40.55	19.43
FIER	LUSHNJE	Kolonjë	6,111	385	114	0.01827	0.00872	0.002221	40.50	19.36
FIER	LUSHNJE	Krutje	7,454	242	54	0.00710	0.01844	0.004644	40.52	19.41
FIER	LUSHNJE	Rremas	4,532	298	87	0.01864	0.01190	0.002928	40.53	19.31
FIER	LUSHNJE	Terbuf	10,473	626	70	0.00657	0.01425	0.003586	41.02	19.37
FIER	MALLAKASTER	Ballsh	8,486	634	149	0.01716	0.00671	0.001707	40.36	19.44
FIER	MALLAKASTER	Aranitas+Ngracam	3,839	219	62	0.01575	0.01602	0.004071	40.36	19.48
FIER	MALLAKASTER	Fratar+Selite	4,621	210	64	0.01365	0.01540	0.003905	40.31	19.49
FIER	MALLAKASTER	Greshicë	1,414	105	34	0.02296	0.02921	0.007480	40.33	19.47
FIER	MALLAKASTER	Hekal	3,343	170	53	0.01549	0.01867	0.004742	40.33	19.44
FIER	MALLAKASTER	Kutë	2,391	138	49	0.01982	0.02026	0.005170	40.28	19.46
FIER	MALLAKASTER	Qendër	6,148	251	73	0.01167	0.01360	0.003442	40.37	19.43
GJIROKASTER	GJIROKASTER	Gjirokaster	26,676	2,181	629	0.02302	0.00159	0.000407	40.04	20.08
GJIROKASTER	GJIROKASTER	Libohovë+Zagori+Qend	5,697	564	153	0.02601	0.00653	0.001677	40.02	20.16
GJIROKASTER	GJIROKASTER	Cepo+Picar	5,004	392	148	0.02871	0.00672	0.001729	40.07	20.05
GJIROKASTER	GJIROKASTER	Dropull i Poshtëm	8,035	589	185	0.02240	0.00540	0.001382	40.01	20.11
GJIROKASTER	GJIROKASTER	Dropull i Sipërm	9,496	576	134	0.01384	0.00745	0.001889	39.55	20.18
GJIROKASTER	GJIROKASTER	Lazarat	2,445	98	39	0.01555	0.02525	0.006415	40.03	20.09
GJIROKASTER	GJIROKASTER	Lunxhëri+Antigon+Odr	6,783	606	191	0.02736	0.00521	0.001341	40.07	20.11
GJIROKASTER	GJIROKASTER	Pogon	2,833	325	138	0.04638	0.00720	0.001889	40.08	20.21
GJIROKASTER	TEPELENE	Tepelenë	6,428	836	218	0.03276	0.00457	0.001182	40.18	20.01
GJIROKASTER	TEPELENE	Memaliaj	5,698	753	225	0.03785	0.00444	0.001154	40.21	19.59
GJIROKASTER	TEPELENE	Memaliaj Fshat	2,015	207	76	0.03605	0.01309	0.003397	40.20	19.59
GJIROKASTER	TEPELENE	Krahës+Qesarat	4,806	274	76	0.01557	0.01299	0.003300	40.26	19.51
GJIROKASTER	TEPELENE	Luftinjë+Buz	4,027	288	107	0.02585	0.00952	0.002381	40.27	19.57
GJIROKASTER	TEPELENE	Qendër Tepelenë+Kur+	5,972	522	210	0.03382	0.00476	0.001232	40.16	20.02
GJIROKASTER	PERMET	Përmet	8,155	930	396	0.04623	0.00252	0.000662	40.14	20.21
GJIROKASTER	PERMET	Këlcyrë	3,706	421	151	0.03899	0.00661	0.001719	40.19	20.12
GJIROKASTER	PERMET	Ballaban	1,718	202	78	0.04299	0.01279	0.003342	40.25	20.08
GJIROKASTER	PERMET	Çarshovë	2,419	220	64	0.02552	0.01554	0.003988	40.07	20.32
GJIROKASTER	PERMET	Petran	2,354	250	76	0.03111	0.01306	0.003371	40.12	20.24
GJIROKASTER	PERMET	Qendër Piskovë+Frash	3,363	383	146	0.04157	0.00681	0.001777	40.17	20.16
GJIROKASTER	PERMET	Suke	1,961	188	76	0.03715	0.01304	0.003388	40.22	20.09
GJIROKASTER	PERMET	Dishnicë	2,037	242	90	0.04223	0.01101	0.002875	40.20	20.09
KORCE	KORCE	Korçë	69,285	4,600	1245	0.01765	0.00080	0.000204	40.37	20.46
KORCE	KORCE	Maliq	5,874	763	267	0.04333	0.00375	0.000979	40.42	20.42
KORCE	KORCE	Drenovë	8,510	1,046	242	0.02759	0.00413	0.001061	40.35	20.47
KORCE	KORCE	Gore	1,951	185	44	0.02177	0.02252	0.005757	40.46	20.33
KORCE	KORCE	Libonik	10,060	819	162	0.01580	0.00616	0.001567	40.45	20.43
KORCE	KORCE	Liqenas	4,260	190	65	0.01488	0.01531	0.003887	40.47	20.54
KORCE	KORCE	Mollaj	6,838	630	183	0.02606	0.00544	0.001396	40.34	20.44
KORCE	KORCE	Pirg	6,725	490	137	0.01986	0.00729	0.001859	40.47	20.42
KORCE	KORCE	Pojan	12,712	954	213	0.01648	0.00467	0.001188	40.44	20.50
KORCE	KORCE	Qender-Korce	10,273	789	185	0.01862	0.00511	0.001301	40.39	20.45
KORCE	KORCE	Voskop	4,471	414	132	0.02859	0.00754	0.001942	40.37	20.41
KORCE	KORCE	Voskopojë+Lekas+Mogl	3,821	351	110	0.02787	0.00905	0.002327	40.38	20.35
KORCE	KORCE	Vreshtas	7,334	578	103	0.01384	0.00963	0.002408	40.48	20.47
KORCE	KOLONJE	Ersekë	5,583	710	313	0.05308	0.00319	0.000798	40.20	20.41
KORCE	KOLONJE	Leskovik Barmash Qen	3,400	402	154	0.04319	0.00647	0.001692	40.09	20.36
KORCE	KOLONJE	Mollas	3,186	404	168	0.04995	0.00593	0.001562	40.26	20.41
KORCE	KOLONJE	Qendër Ersekë+ Novos	3,644	431	203	0.05262	0.00492	0.001298	40.23	20.42
KORCE	POGRADEC	Pogradec	28,870	2,031	462	0.01575	0.00216	0.000549	40.54	20.39
KORCE	POGRADEC	Buçimas	11,837	670	127	0.01056	0.00786	0.001986	40.53	20.41
KORCE	POGRADEC	Çërravë	6,779	322	60	0.00869	0.01656	0.004177	40.51	20.44
KORCE	POGRADEC	Dardhas	2,381	174	27	0.01090	0.03672	0.009285	40.51	20.40
KORCE	POGRADEC	Udenisht	5,092	375	84	0.01614	0.01184	0.003008	40.58	20.38
KORCE	POGRADEC	Proptisht	4,596	172	41	0.00880	0.02395	0.006043	40.59	20.30
KORCE	POGRADEC	Trebinjë	2,462	171	52	0.02054	0.01900	0.004852	40.55	20.33
KORCE	POGRADEC	Velçan	2,435	92	22	0.00881	0.04421	0.011156	40.57	20.28
KORCE	DEVOLL	Bilisht	7,345	673	184	0.02434	0.00543	0.001391	40.38	20.59
KORCE	DEVOLL	Qender-Bilisht	6,755	378	90	0.01305	0.01108	0.002806	40.36	21.00
KORCE	DEVOLL	Miras	7,922	442	87	0.01085	0.01139	0.002879	40.31	20.56
KORCE	DEVOLL	Hoçisht	5,450	341	78	0.01403	0.01274	0.003231	40.36	20.55
KORCE	DEVOLL	Progër	4,598	285	63	0.01343	0.01573	0.003986	40.42	20.56

KUKES	KUKES	Kukes+Kolsh	16,007	842	140	0.00865	0.00712	0.001795	42.04	20.25
KUKES	KUKES	Bicaj+Ujmisht	5,586	136	38	0.00673	0.02578	0.006491	42.00	20.25
KUKES	KUKES	Bushtricë+Gryke+Kali	2,520	115	54	0.02074	0.01840	0.004698	41.53	20.24
KUKES	KUKES	Malzi	2,520	157	51	0.01976	0.01931	0.004927	42.06	20.17
KUKES	KUKES	Terthorë	2,070	77	15	0.00720	0.06253	0.015754	42.07	20.30
KUKES	KUKES	Shtiqen	2,350	74	12	0.00483	0.08070	0.020281	42.02	20.26
KUKES	KUKES	Zapod	1,912	98	36	0.01839	0.02715	0.006919	42.03	20.33
KUKES	KUKES	Shishtavec	3,564	162	53	0.01456	0.01893	0.004733	41.59	20.36
KUKES	KUKES	Topojan	1,565	73	15	0.00894	0.06620	0.016709	41.59	20.31
KUKES	KUKES	Surroj+Arren	1,416	71	13	0.00877	0.07391	0.018653	41.59	20.21
KUKES	HAS	Krumë	5,534	195	45	0.00802	0.02189	0.005518	42.12	20.25
KUKES	HAS	Golaj	5,115	140	43	0.00824	0.02300	0.005800	42.15	20.22
KUKES	HAS	Fajza	2,598	57	18	0.00665	0.05440	0.013695	42.10	20.21
KUKES	TROPOJE	Bajram Curri	5,646	465	146	0.02508	0.00684	0.001754	42.21	20.05
KUKES	TROPOJE	Bujan	2,276	211	53	0.02273	0.01854	0.004745	42.20	20.05
KUKES	TROPOJE	Bytyç	1,435	136	37	0.02453	0.02695	0.006913	42.18	20.12
KUKES	TROPOJE	Fierzë	1,737	179	28	0.01572	0.03479	0.008841	42.17	20.02
KUKES	TROPOJE	Lekbibaj	1,399	125	50	0.03396	0.01992	0.005158	42.18	19.56
KUKES	TROPOJE	Llugaj	1,594	185	70	0.04194	0.01412	0.003688	42.20	20.07
KUKES	TROPOJE	Margegal	2,129	173	38	0.01752	0.02567	0.006535	42.23	20.04
KUKES	TROPOJE	Fshat Tropojë	3,902	245	58	0.01455	0.01707	0.004331	42.24	20.10
LEZHE	LEZHE	Lezhe	19,415	1,577	183	0.00932	0.00545	0.001375	41.47	19.38
LEZHE	LEZHE	Balltren i Ri	7,225	605	162	0.02187	0.00615	0.001573	41.49	19.38
LEZHE	LEZHE	Blinisht	3,979	139	41	0.01003	0.02423	0.006122	41.53	19.38
LEZHE	LEZHE	Dajç	4,930	222	52	0.01040	0.01895	0.004788	41.55	19.36
LEZHE	LEZHE	Kallmet	4,900	149	36	0.00725	0.02722	0.006857	41.51	19.41
LEZHE	LEZHE	Kolsh	4,560	253	59	0.01267	0.01681	0.004257	41.47	19.40
LEZHE	LEZHE	Shëngjin	8,058	693	159	0.01935	0.00625	0.001594	41.49	19.36
LEZHE	LEZHE	Ungrej	2,159	98	32	0.01452	0.03049	0.007738	41.52	19.47
LEZHE	LEZHE	Shënkoll	10,766	797	98	0.00896	0.01018	0.002568	41.42	19.39
LEZHE	LEZHE	Zejmen	6,265	332	83	0.01305	0.01193	0.003023	41.43	19.41
LEZHE	MIRDITE	Rrëshen+Kacinar	11,463	515	73	0.00627	0.01366	0.003437	41.46	19.55
LEZHE	MIRDITE	Rubik	5,814	288	45	0.00760	0.02200	0.005543	41.46	19.47
LEZHE	MIRDITE	Fan	3,265	137	25	0.00744	0.03929	0.009900	41.56	20.09
LEZHE	MIRDITE	Kthellë+ Selite	3,862	151	23	0.00577	0.04276	0.010754	41.44	19.58
LEZHE	MIRDITE	Orosh	2,346	135	30	0.01222	0.03331	0.008434	41.51	20.04
LEZHE	KURBIN	Laç	20,590	1,490	261	0.01249	0.00383	0.000969	41.38	19.43
LEZHE	KURBIN	Mamurras	15,020	934	192	0.01262	0.00519	0.001313	41.35	19.42
LEZHE	KURBIN	Fushë-Kuqe	5,798	444	136	0.02286	0.00732	0.001873	41.38	19.37
LEZHE	KURBIN	Milot	7,981	406	88	0.01086	0.01129	0.002854	41.41	19.43
SHKODER	SHKODER	Shkodër	85,053	5,167	720	0.00840	0.00139	0.000350	41.04	19.30
SHKODER	SHKODER	Vau-Dejë+Temal	10,056	611	131	0.01278	0.00763	0.001907	42.00	19.38
SHKODER	SHKODER	Ana e Malit	4,308	368	120	0.02698	0.00830	0.002134	42.01	19.26
SHKODER	SHKODER	Bushat	16,354	864	171	0.01032	0.00583	0.001474	41.58	19.32
SHKODER	SHKODER	Berdicë	6,395	368	88	0.01351	0.01130	0.002864	42.01	19.29
SHKODER	SHKODER	Dajç	6,484	347	95	0.01439	0.01046	0.002654	42.00	19.25
SHKODER	SHKODER	Gur i Zi	7,823	295	64	0.00805	0.01553	0.003914	42.03	19.34
SHKODER	SHKODER	Hajmel+Vig Mnele	6,322	313	78	0.01213	0.01273	0.003221	41.57	19.38
SHKODER	SHKODER	Postribë	7,295	207	45	0.00603	0.02211	0.005563	42.07	19.36
SHKODER	SHKODER	Pult+Shosh	2,090	266	122	0.05471	0.00820	0.002169	42.14	19.42
SHKODER	SHKODER	Rrethina	15,772	1,271	433	0.02669	0.00231	0.000593	42.07	19.31
SHKODER	SHKODER	Shalë	3,781	421	144	0.03657	0.00692	0.001796	42.18	19.48
SHKODER	SHKODER	Velipojë	6,277	509	118	0.01833	0.00846	0.002155	41.52	19.26
SHKODER	SHKODER	Shllak	1,054	91	43	0.03860	0.02307	0.006005	42.06	19.44
SHKODER	PUKE	Pukë+Rrape	5,222	416	115	0.02138	0.00869	0.002221	42.03	19.54
SHKODER	PUKE	Fushe Arez+Qafe Mali	6,222	439	109	0.01712	0.00914	0.002327	42.04	20.02
SHKODER	PUKE	Iballë	1,644	160	47	0.02727	0.02123	0.005460	42.11	20.00
SHKODER	PUKE	Fierze	1,574	151	60	0.03670	0.01640	0.004258	42.15	20.01
SHKODER	PUKE	Gjegjan	3,102	115	27	0.00862	0.03577	0.009023	41.56	20.01
SHKODER	PUKE	Qerret+Qelez	3,946	271	87	0.02145	0.01143	0.002921	42.03	19.50
SHKODER	MALESI	Koplik	8,016	497	122	0.01494	0.00816	0.002072	42.13	19.26
SHKODER	MALESI	Gruemirë	8,745	610	153	0.01717	0.00651	0.001655	42.12	19.28
SHKODER	MALESI	Kastrat	8,768	412	110	0.01240	0.00901	0.002282	42.17	19.26
SHKODER	MALESI	Kelmend	4,861	156	38	0.00762	0.02611	0.006580	42.28	19.34
SHKODER	MALESI	Qendër Koplik	4,086	248	71	0.01697	0.01398	0.003557	42.14	19.23
SHKODER	MALESI	Shkrel	4,059	231	91	0.02191	0.01088	0.002782	42.18	19.32
TIRANE	TIRANE	Tiranë	469,578	17,396	1222	0.00260	0.00082	0.000205	41.20	19.49
TIRANE	TIRANE	Kamëz	50,536	2,620	520	0.01019	0.00192	0.000485	41.23	19.46
TIRANE	TIRANE	Vorë	1,370	284	124	0.08281	0.00802	0.002186	41.24	19.39

TIRANE	TIRANE	Baldushk	3,749	151	58	0.01503	0.01746	0.004365	41.13	19.48
TIRANE	TIRANE	Bërzhitë	3,988	293	83	0.02030	0.01196	0.003052	41.15	19.54
TIRANE	TIRANE	Bërxullë	6,579	388	100	0.01494	0.00993	0.002720	41.23	19.42
TIRANE	TIRANE	Dajt	7,694	816	160	0.02035	0.00622	0.001588	41.24	19.55
TIRANE	TIRANE	Farkë	7,531	665	183	0.02373	0.00544	0.001392	41.17	19.51
TIRANE	TIRANE	Kashar	13,830	1,109	147	0.01046	0.00680	0.001718	41.21	19.43
TIRANE	TIRANE	Ndroq	6,456	262	70	0.01072	0.01410	0.003563	41.16	19.39
TIRANE	TIRANE	Paskuqan	25,942	1,910	421	0.01595	0.00237	0.000603	41.22	19.49
TIRANE	TIRANE	Petrelë	4,498	283	78	0.01704	0.01267	0.003222	41.15	19.51
TIRANE	TIRANE	Pezë	3,940	254	71	0.01749	0.01406	0.003579	41.13	19.42
TIRANE	TIRANE	Prezë	4,621	259	67	0.01427	0.01474	0.003739	41.26	19.40
TIRANE	TIRANE	Shëngjergj	2,058	161	64	0.02993	0.01550	0.003997	41.20	20.06
TIRANE	TIRANE	Vaqarr	6,128	486	68	0.01094	0.01455	0.003679	41.18	19.45
TIRANE	TIRANE	Zall Bastar	3,602	176	75	0.02027	0.01325	0.003381	41.26	19.56
TIRANE	TIRANE	Zall Herr	6,840	496	111	0.01597	0.00893	0.002270	41.23	19.50
TIRANE	TIRANE	Krrabë	2,090	206	47	0.02198	0.02085	0.005332	41.13	19.58
TIRANE	KAVAJE	Kavajë	28,264	1,806	419	0.01460	0.00238	0.000605	41.11	19.34
TIRANE	KAVAJE	Rrogzohinë+Sinaballa	9,437	766	92	0.00965	0.01077	0.002719	41.05	19.40
TIRANE	KAVAJE	Golem	8,000	499	78	0.00966	0.01266	0.003197	41.14	19.35
TIRANE	KAVAJE	Gosë	5,612	355	54	0.00947	0.01832	0.004624	41.05	19.37
TIRANE	KAVAJE	Helmes	3,259	196	52	0.01558	0.01902	0.004832	41.12	19.37
TIRANE	KAVAJE	Kryevidh	6,045	213	48	0.00782	0.02057	0.005184	41.06	19.31
TIRANE	KAVAJE	Lekaj	6,323	234	32	0.00502	0.03042	0.007645	41.07	19.37
TIRANE	KAVAJE	Luz i Vogël	6,832	173	21	0.00294	0.04744	0.011896	41.08	19.34
TIRANE	KAVAJE	Synej	7,269	228	34	0.00455	0.02931	0.007361	41.11	19.32
VLORE	VLORE	Valona	100,429	4,504	748	0.00740	0.00134	0.000336	40.27	19.29
VLORE	VLORE	Himara	10,650	566	118	0.01096	0.00841	0.002127	40.07	19.44
VLORE	VLORE	Orikum	7,983	690	243	0.02947	0.00411	0.001059	40.20	19.28
VLORE	VLORE	Selenicë	5,161	458	97	0.01842	0.01022	0.002604	40.32	19.38
VLORE	VLORE	Armen	4,938	340	119	0.02350	0.00835	0.002138	40.32	19.36
VLORE	VLORE	Brataj	3,682	293	113	0.02977	0.00877	0.002261	40.16	19.40
VLORE	VLORE	Hore Vranisht	2,993	288	104	0.03337	0.00959	0.002480	40.13	19.41
VLORE	VLORE	Kotë	4,834	339	102	0.02066	0.00971	0.002480	40.23	19.36
VLORE	VLORE	Novoselë	11,584	532	104	0.00886	0.00957	0.002415	40.37	19.28
VLORE	VLORE	Qendër	13,120	818	196	0.01470	0.00509	0.001291	40.32	19.28
VLORE	VLORE	Sevaster	2,374	177	75	0.03036	0.01327	0.003423	40.24	19.44
VLORE	VLORE	Shushicë	6,691	486	130	0.01893	0.00769	0.001959	40.32	19.32
VLORE	VLORE	Vllahinë	4,695	341	81	0.01688	0.01226	0.003117	40.27	19.39
VLORE	SARANDE	Saranda	30,548	2,526	645	0.02068	0.00155	0.000395	39.52	20.00
VLORE	SARANDE	Konispol	2,287	218	86	0.03591	0.01160	0.003009	39.40	20.11
VLORE	SARANDE	Aliko	6,919	422	66	0.00937	0.01507	0.003804	39.52	20.05
VLORE	SARANDE	Dhivër	5,508	365	86	0.01524	0.01160	0.002946	39.50	20.10
VLORE	SARANDE	Ksamil	6,287	991	378	0.05659	0.00264	0.000701	39.46	20.00
VLORE	SARANDE	Livadhja	8,227	387	97	0.01164	0.01022	0.002585	39.47	20.07
VLORE	SARANDE	Lukovë	7,350	782	259	0.03401	0.00385	0.000997	39.59	19.55
VLORE	SARANDE	Markat	2,326	231	103	0.04236	0.00962	0.002513	39.44	20.12
VLORE	SARANDE	Xarrë	5,511	490	164	0.02879	0.00608	0.001567	39.44	20.03
VLORE	DELVINE	Delvina	10,702	1,067	347	0.03138	0.00288	0.000743	39.57	20.06
VLORE	DELVINE	Finiq	5,094	329	64	0.01233	0.01549	0.003921	39.54	20.03
VLORE	DELVINE	Mesopotam	4,896	351	87	0.01736	0.01143	0.002909	39.55	20.06
VLORE	DELVINE	Vergo	3,096	344	108	0.03362	0.00920	0.002380	40.00	20.01

Table S2. The 100 most frequent surnames in Albania. From the Electors in the 2009 election.

DAUTI	2956	TABAKU	4680
DEMA	2956	DOMI	4687
MUKA	2966	DODA	4770
DEMIRI	2976	BUSHI	4813
NDREU	2988	ALLA	4837
HILA	2989	SINA	4917
LILA	3027	SPAHIU	4928
HALILAJ	3032	LALA	4953
ÇULLHAJ	3130	DEDA	5128
QOSJA	3188	MURATI	5207
METAJ	3199	ARAPI	5277
HYSENI	3202	BARDHI	5281
RUÇI	3231	MALAJ	5306
ISUFI	3272	BEQIRI	5342
HASANAJ	3285	BREGU	5390
KOKA	3287	HALILI	5506
ZEFI	3413	DUKA	5568
LAMAJ	3433	KARAJ	5650
GURI	3448	RAMA	5698
PLAKU	3598	GEGA	5911
SHEHAJ	3598	ALIAJ	5933
PEPA	3655	HASA	6026
SHAHINI	3655	SINANI	6237
BAJRAMI	3691	CANI	6249
NIKA	3711	TAFA	6266
NDOJ	3765	TOSKA	6822
SHEHI	3770	MEMA	6865
HYKA	3784	PAPA	7042
BASHA	3805	LIKA	7245
MEHMETI	3846	META	7414
PJETRI	3897	HOXHAJ	7775
AGOLLI	3947	BALLA	7778
BIBA	3949	GJINI	7784
GJIKA	3951	ELEZI	8155
SHABANI	3982	HYSA	8180
GJATA	3998	SULA	8311
OSMANI	4103	LEKA	8499
DOÇI	4139	PRIFTI	8727
NIKOLLI	4173	GJONI	9185
PRENDI	4183	LLESHI	9501
KASA	4238	KOÇI	9533
GJERGJI	4259	KURTI	10152
ZENELI	4323	GJOKA	10191
MUÇAJ	4368	DERVISHI	10953
BALLIU	4372	KOLA	11443
SULAJ	4386	MUÇA	12236
HASANI	4541	SHEHU	12348
XHAFI	4555	MARKU	13852
PRENGA	4604	ÇELA	14632
KODRA	4613	HOXHA	39088

Table S3. The most frequent names of Arabic origin in Albania.

BRAHIMAJ	1684
BRAHIMI	2225
BRAHJA	1098
BRAHO	2347
DERVISHAJ	2182
DERVISHI	10953
DIBRA	1647
ELEZAJ	1970
ELEZI	8155
HAMZAJ	1039
HASANI	4541
IBRAHIMI	2535
IDRIZI	1961
ISAKU	1172
ISLAMAJ	2004
ISLAMI	1751
ISMAILAJ	1549
ISMAILI	2686
ISUFAJ	2712
ISUFI	3272
LAMI	2375
LATIFI	1455
MAHMUTAJ	1130
OSMANI	4103
SELIMAJ	2089
SELIMI	2297
SELMANI	1870
SHABANI	3982
SINANI	6237
SULEJMANI	2601

Table S4. Surnames with the prefix 'Papa' of clear Greek origin. Frequencies > 20 only.

PAPA	7042
PAPADHIMA	158
PAPADHIMITRI	83
PAPADHOPULI	21
PAPADHOPULLI	47
PAPADHOPULLO	74
PAPAGJIKA	124
PAPAGJINI	27
PAPAGJONI	21
PAPAILIA	36
PAPAJ	314
PAPAJANI	554
PAPAJORGJI	128
PAPAKOSTANDINI	24
PAPAKRISTO	32
PAPAKRONI	42
PAPALILO	35
PAPAMIHALI	33
PAPANDONI	25
PAPANIKOLLA	101
PAPAPANO	34
PAPAQAKO	22
PAPARISTO	61
PAPARIZO	21
PAPAS	126
PAPASAVA	31
PAPATHANASI	55
PAPATHIMIU	55
PAPAVANGJELI	47
PAPAZISI	37

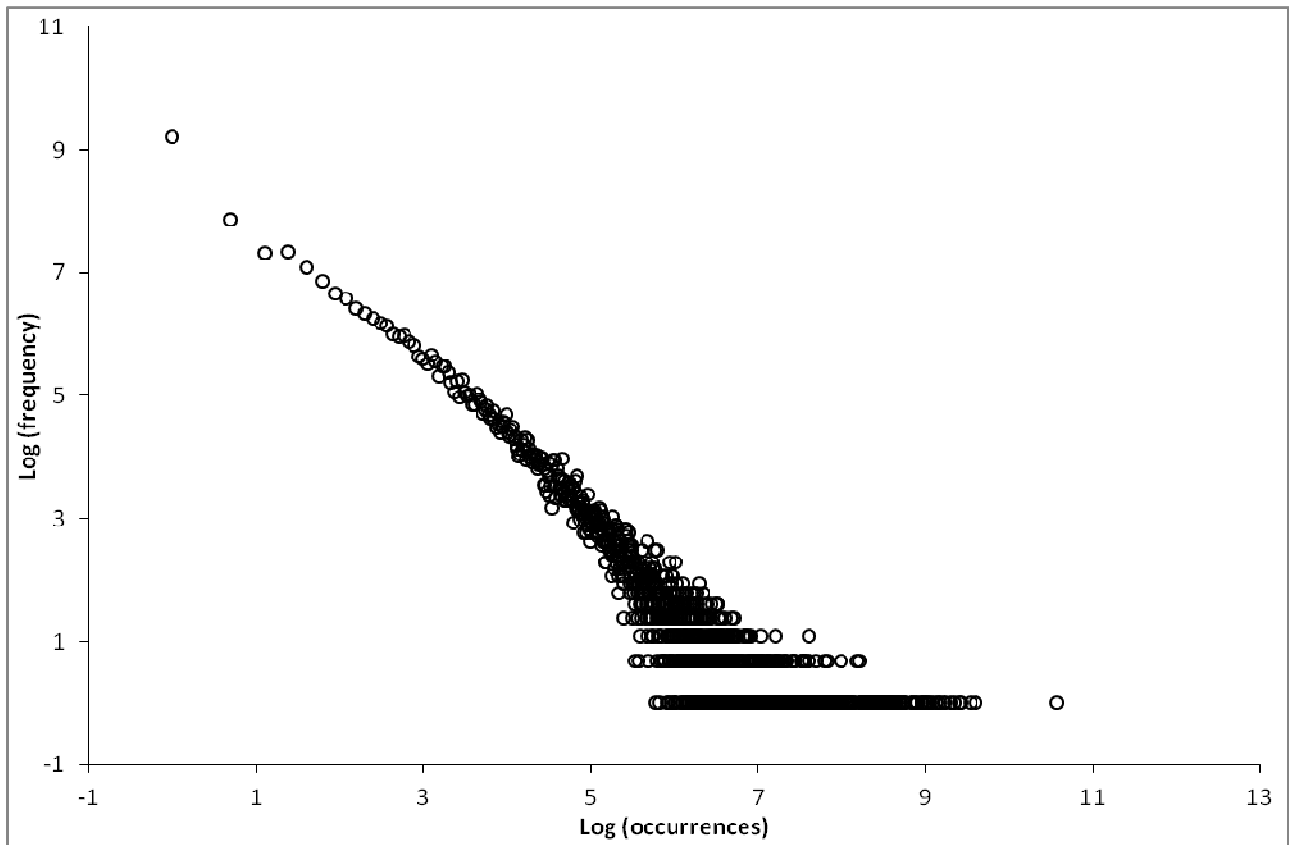


Fig. S1. Variation of the number of occurrences in 3 million surnames in Albania. Electors of 2009 general elections. Bilogarithmic scale, natural log.

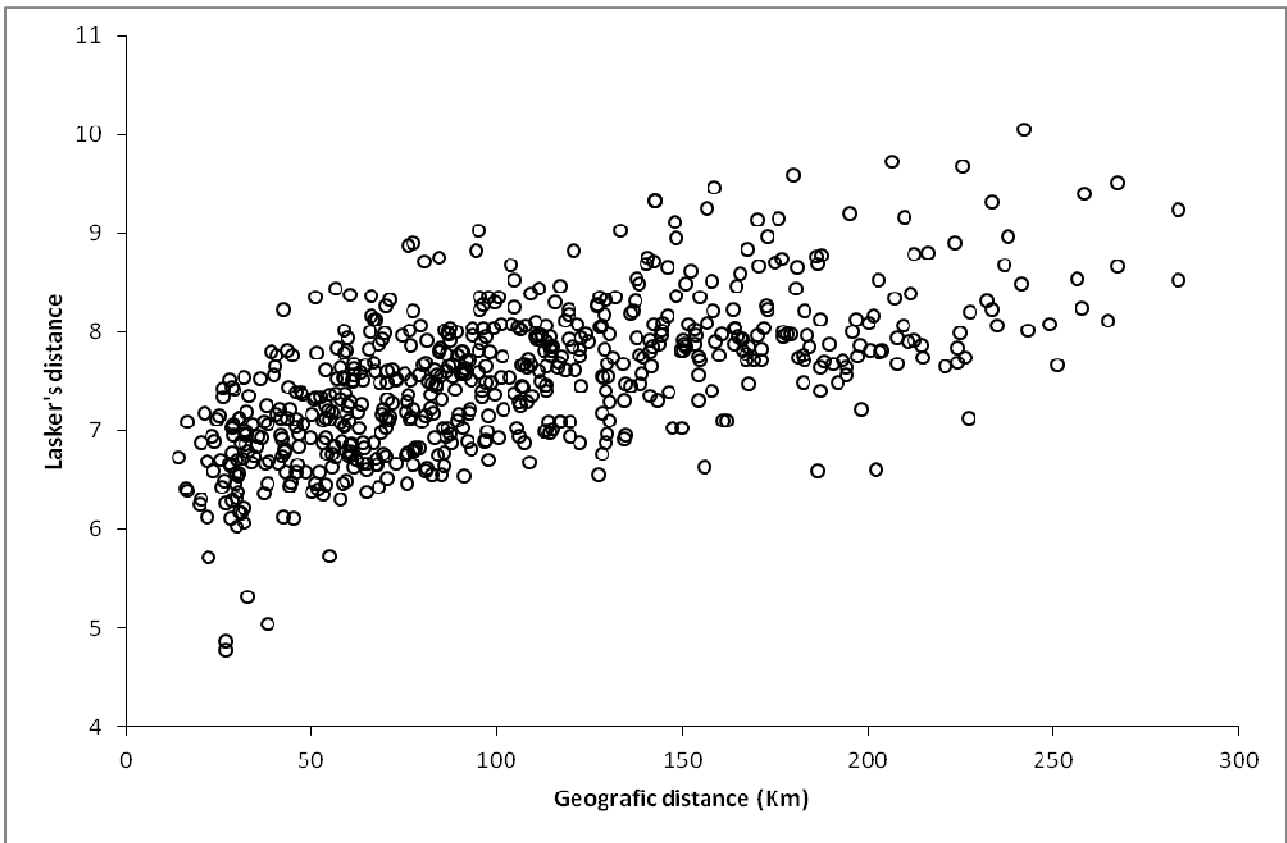


Fig. S2. Variation of Lasker's distance between 36 Districts in Albania. 3 million surnames from the electors in the 2009 general elections.

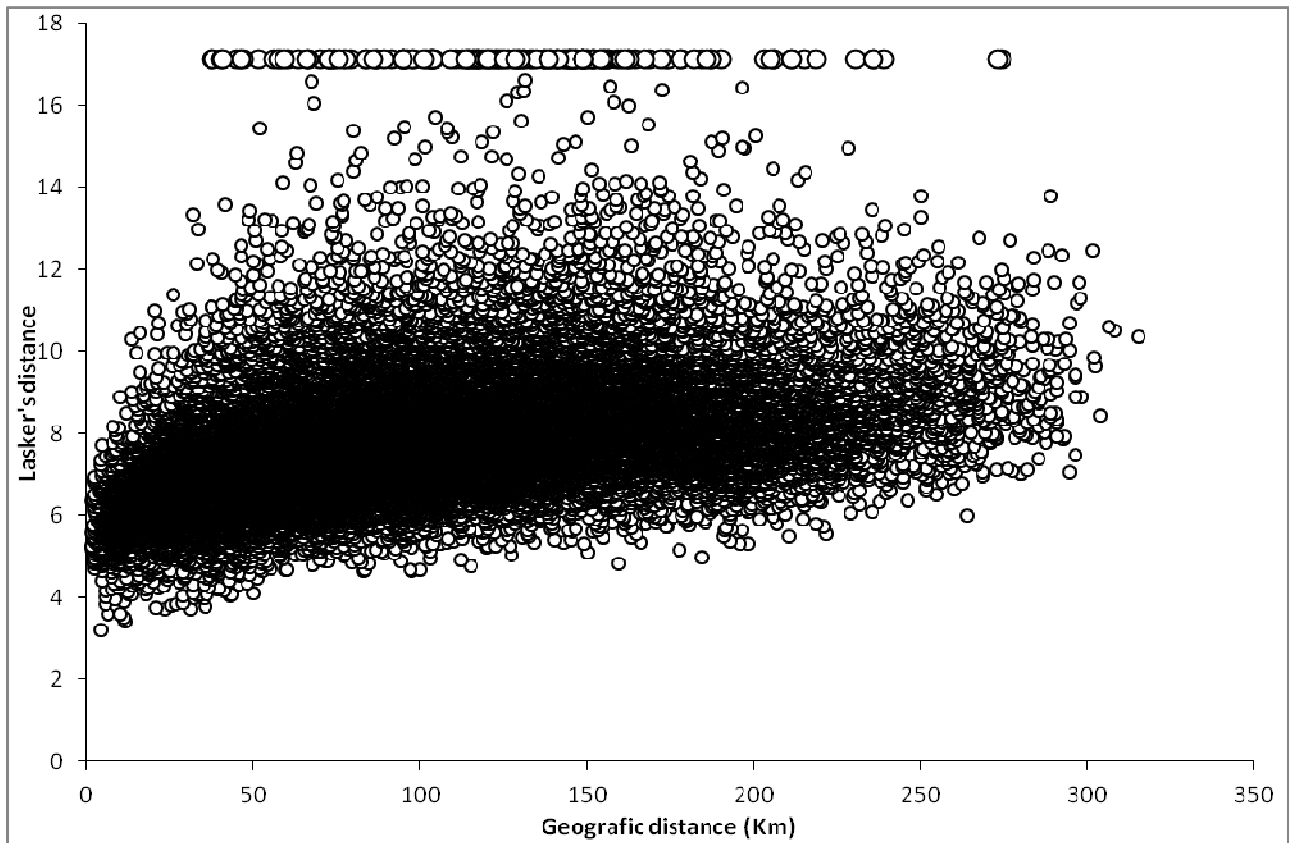


Fig. S3. Variation of Lasker's distance between 321 communes in Albania. 3 million surnames from the electors in the 2009 general elections, 51360 pairwise distances.

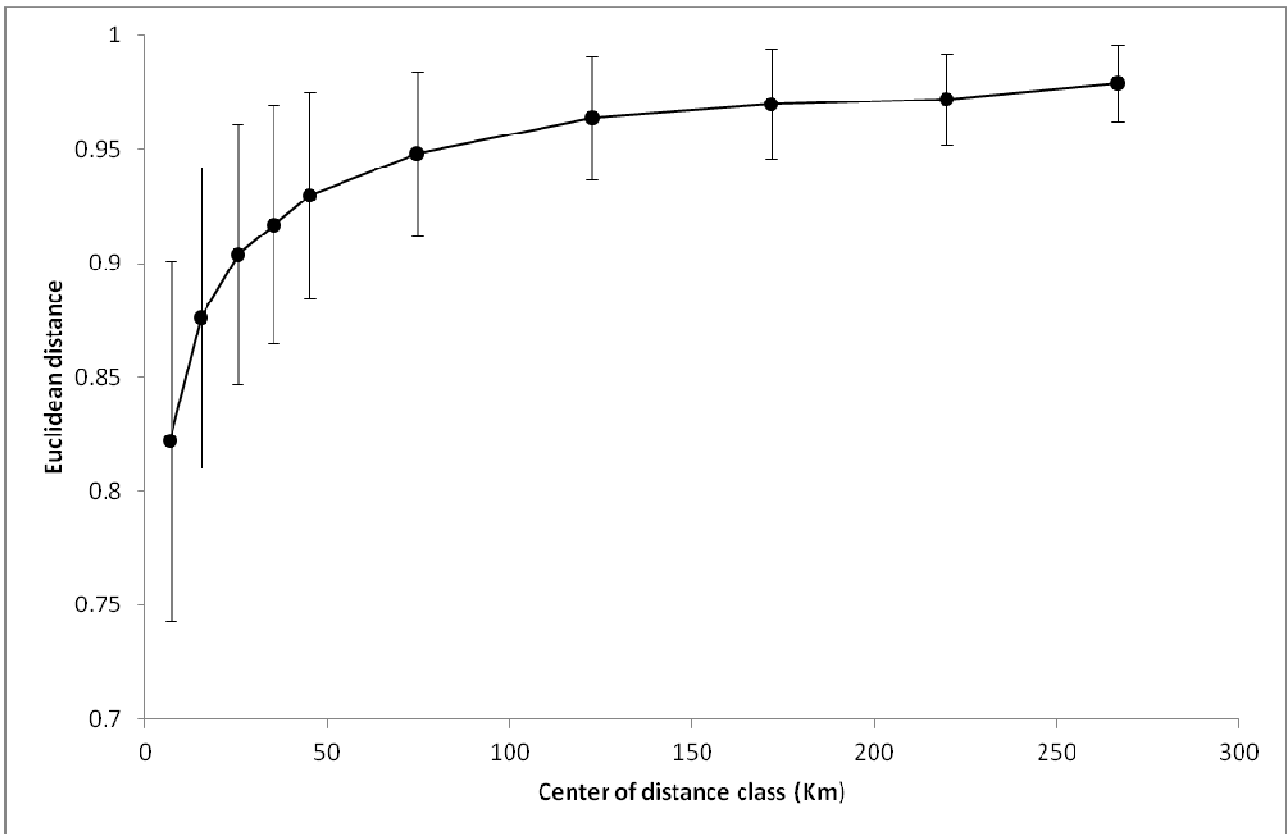


Fig. S4. Variation of Euclidean with geographic distance. Note the rapid rise of Euclidean distance toward an asymptote, due to the fact that Euclidean distance cannot exceed unity.

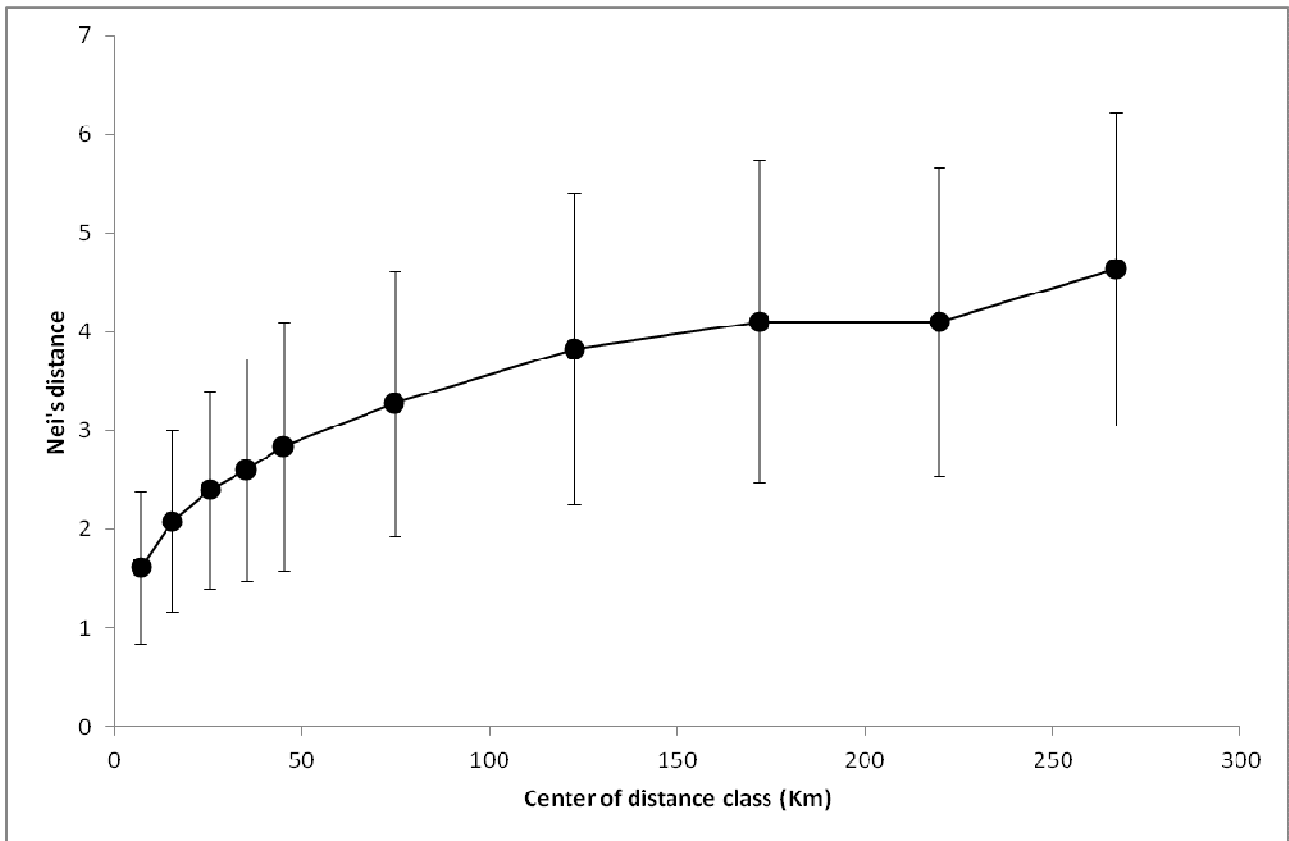


Fig. S5. Nei's distance is fairly linear. However, it rises rather sharply at small Geographic distances, giving an hint of asymptotic behaviour after 120 kilometers.

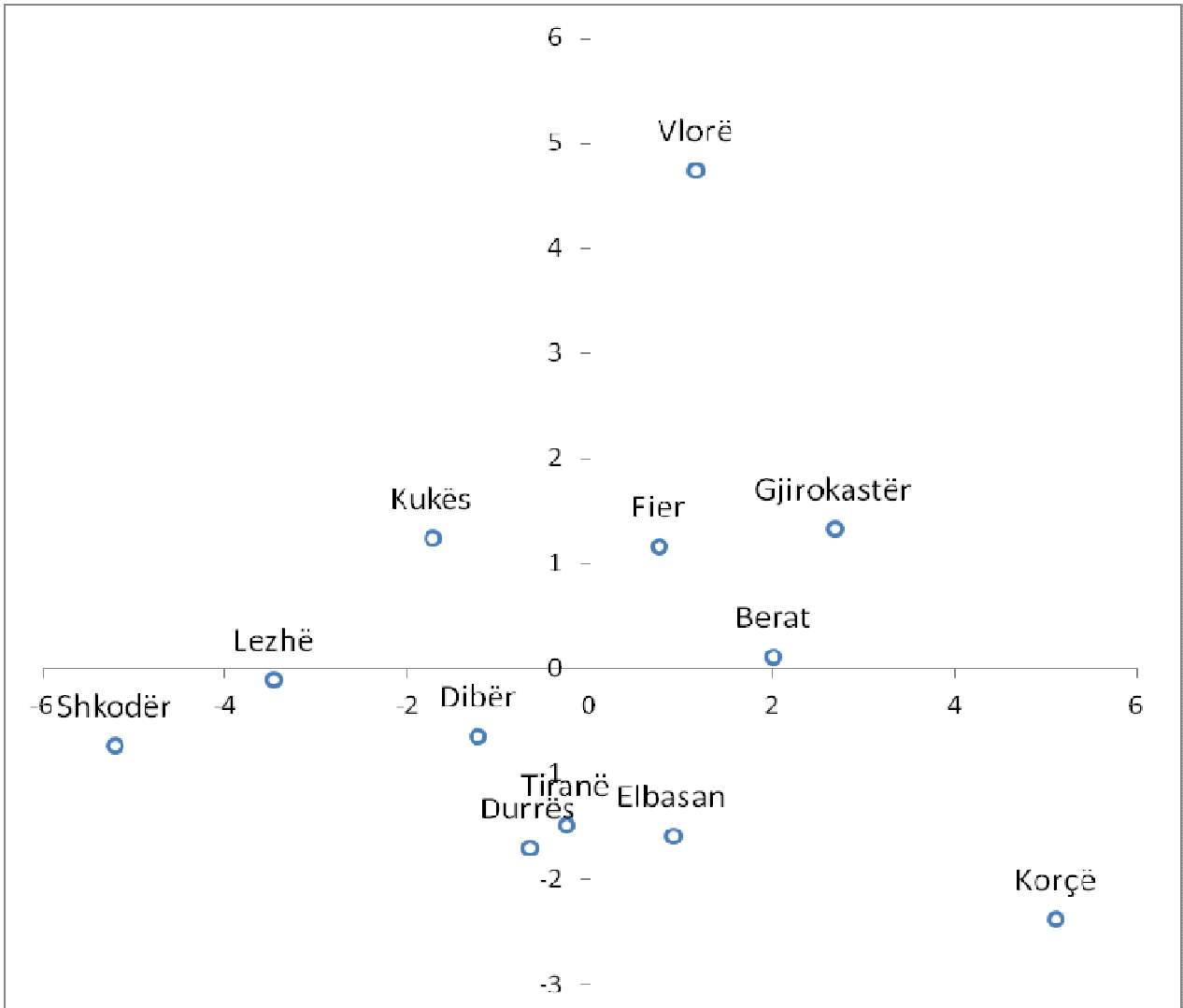


Fig. S6. MDS on the matrix of Lasker's distances between Prefectures. First two dimensions. Stress = 9.8%.

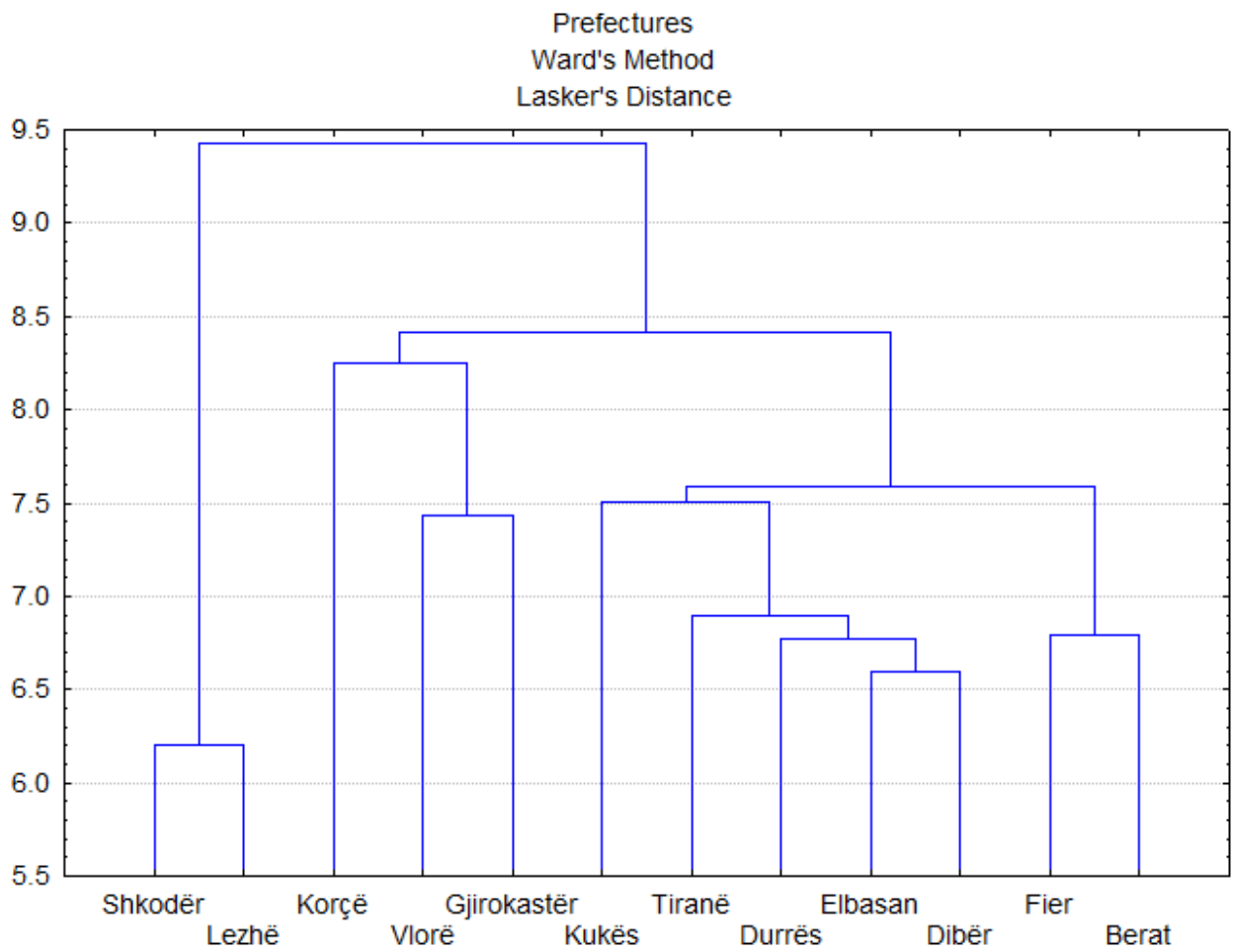


Fig. S7. Dendrogram of Albania Prefectures. Lasker's distance, Ward's agglomeration method.

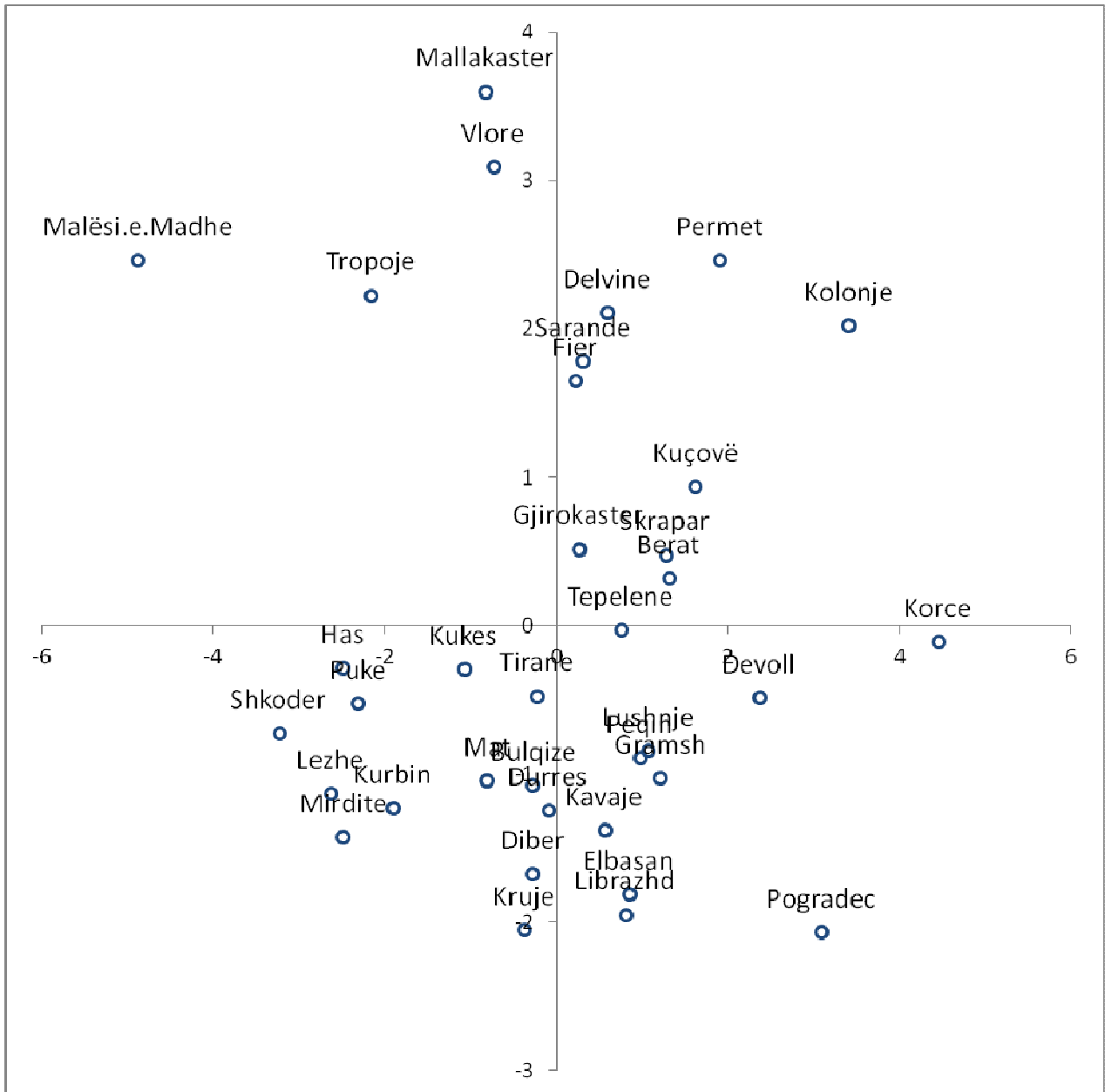


Fig. S8. MDS of Lasker's distance matrix between Districts. First two dimensions. Stress 11.16%.

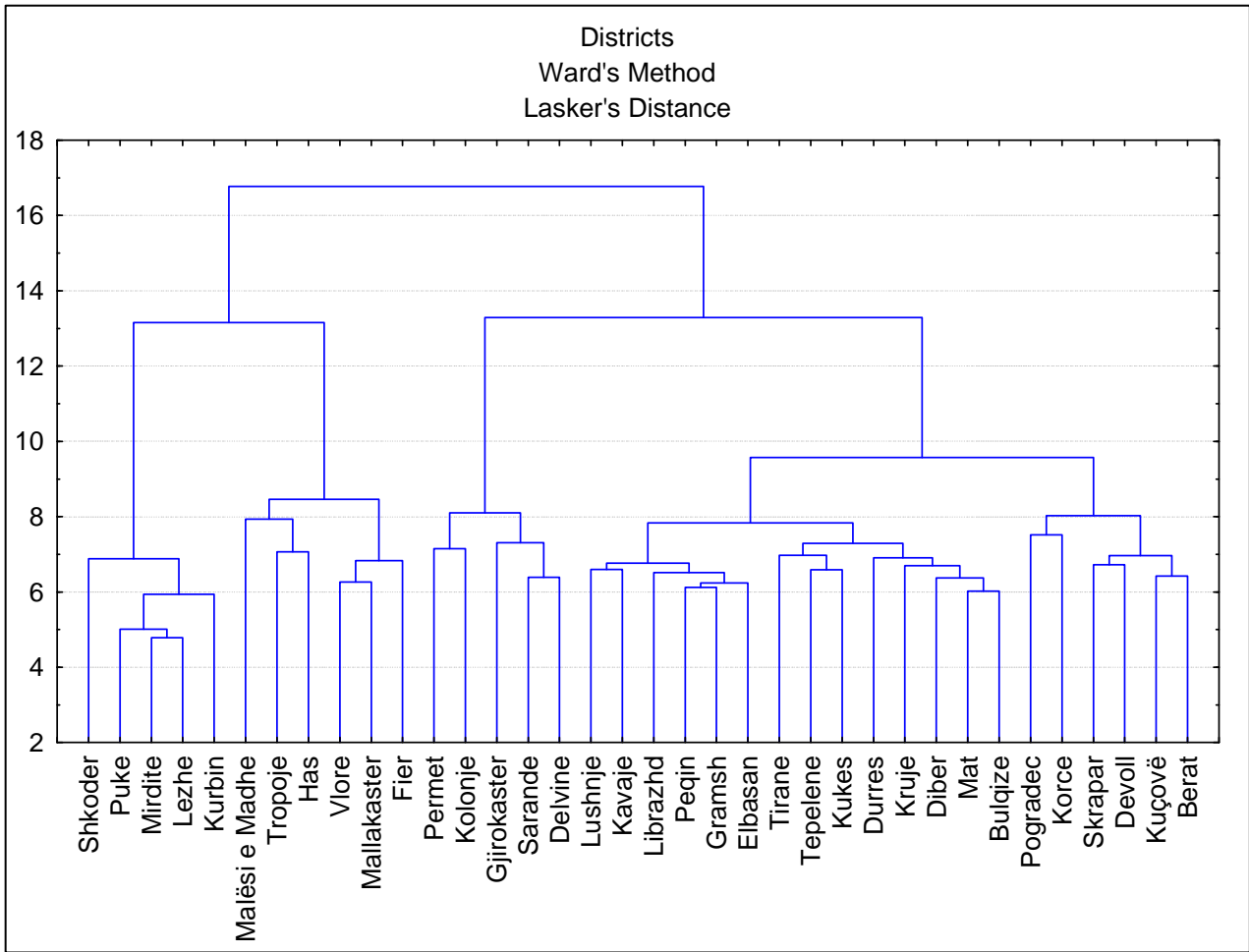


Fig. S9. Dendrogram of Districts from the matrix of Lasker's distance, Ward's agglomeration method. Note the cluster comprising Malesi e Madhe, Tropoje, and Has which are at the northern border of the Country, and Fier, Mallakaster and Vlore at the South.

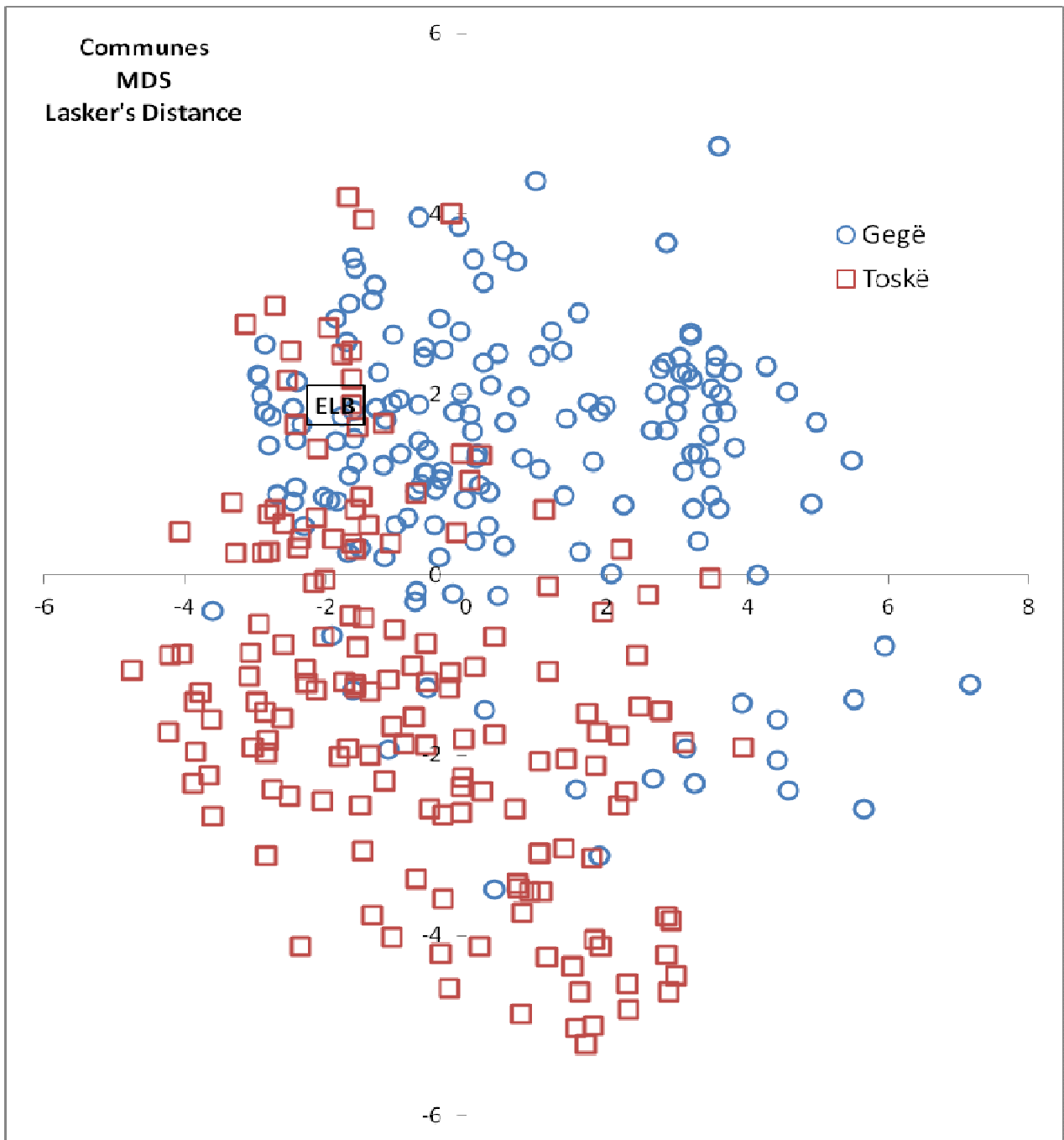


Fig. S10. Projection of the 321 communes of Albania on the first two dimensions of the matrix of Lasker's distances (label ELB means Elbasan). Stress = 20.98%.

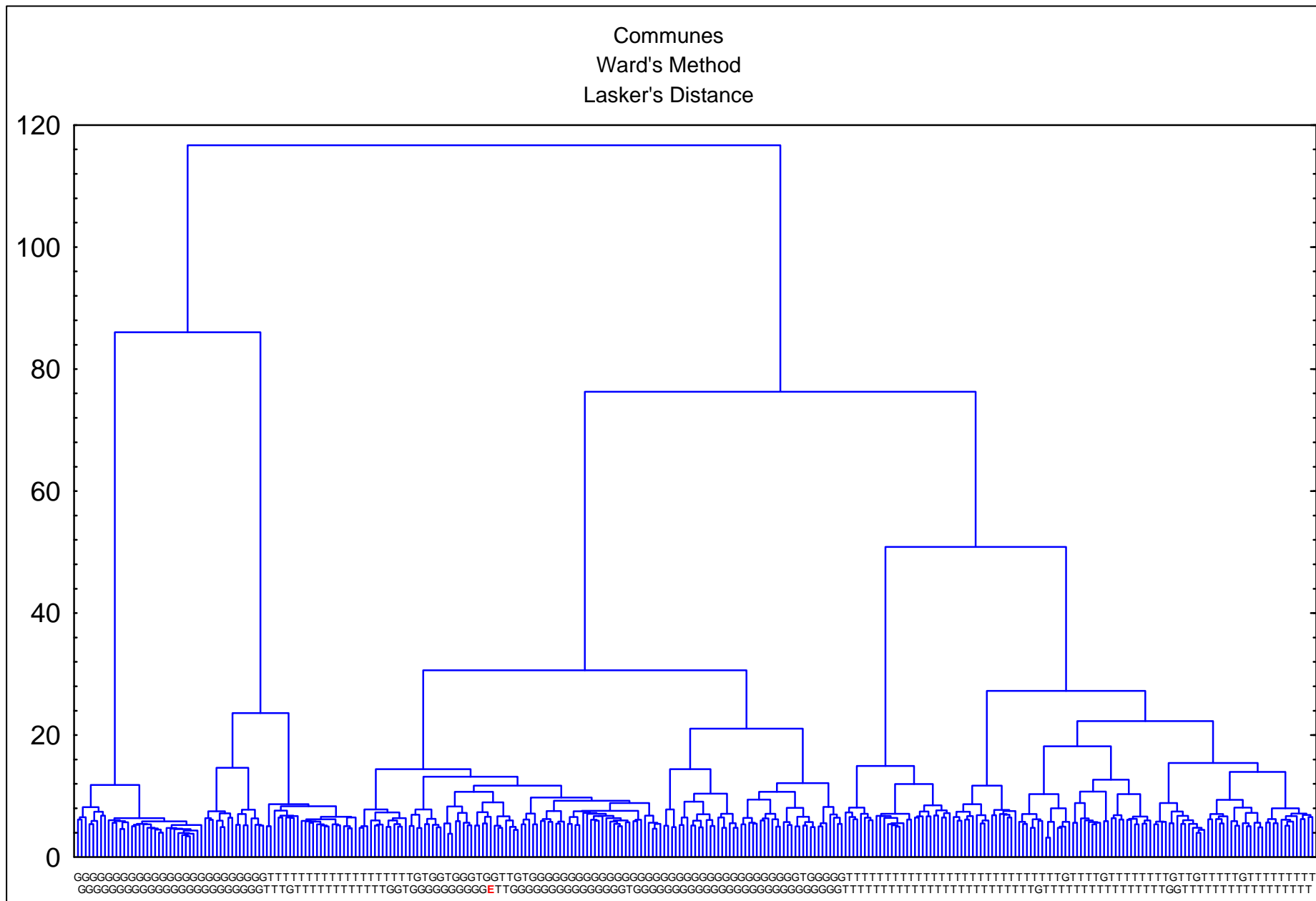


Fig. S11. Dendrogram of communes. Lasker's distance, Ward's agglomeration method. (label **E** means Elbasan).