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Harmonisation of a large-scale historical database with the actual Czech soil classification system

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Electronic Supplementary Material (ESM)

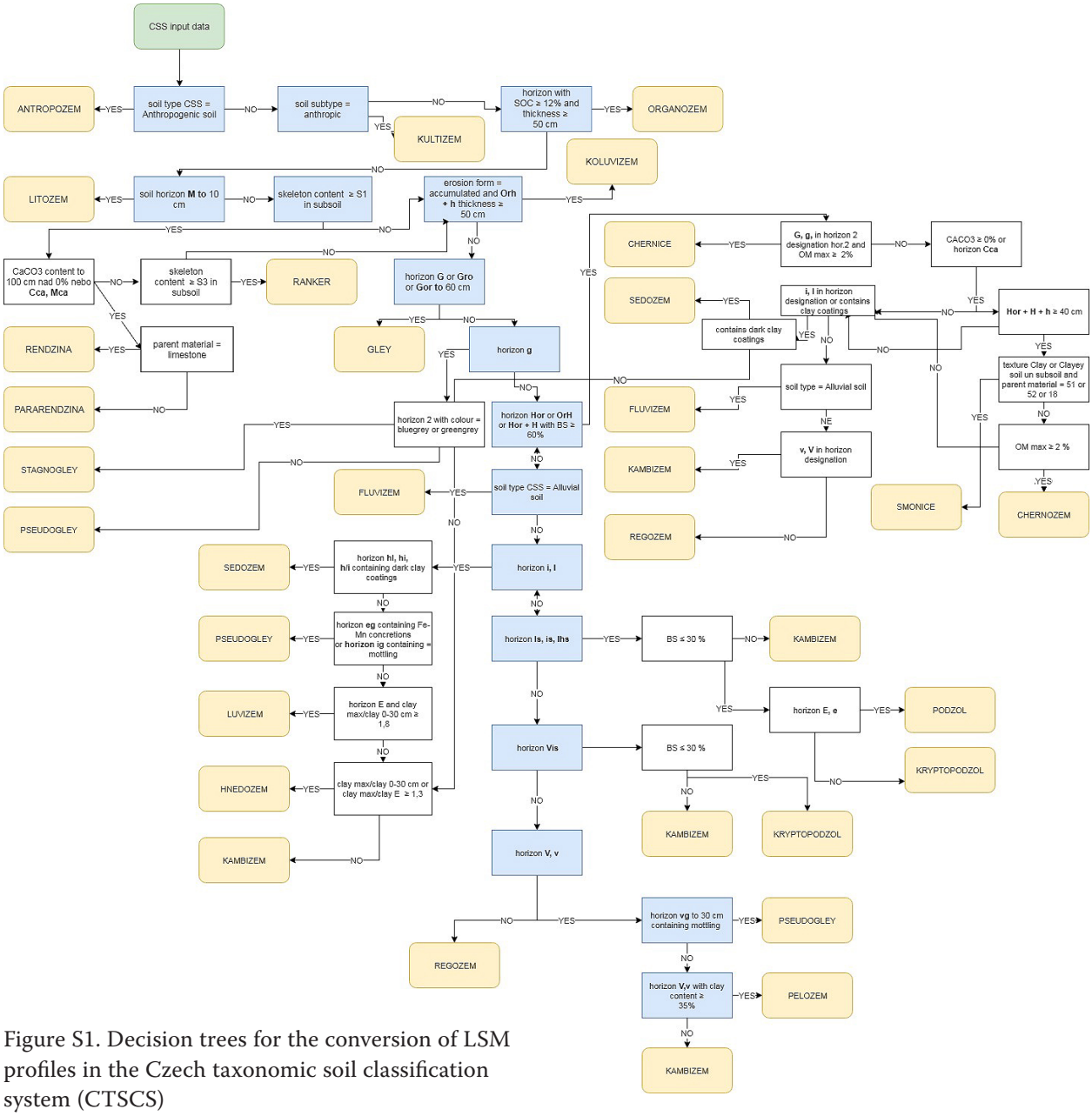

Figure S1. Decision trees for the conversion of LSM profiles in the Czech taxonomic soil classification system (CTSCS)

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Table S1. GSRs converted in CTSCS nomenclature, number of relevant soil profiles according to their reclassification and converison accuracy

Genetic soil representative	Soil profiles																																	conversion accuracy (%)
	Chernice calcareous	Chernice gleyic	Chernice modal	Chernozem calcareous	Chernozem chernic	Chernozem luvic	Chernozem modal	Chernozem pelic	Fluvizem calcareous	Fluvizem gleyic	Fluvizem modal	Fluvizem stagnic	Hnedozem luvic	Hnedozem modal	Kambizem decalcified	Kambizem luvic	Kambizem modal	Koluvizem calcareous	Koluvizem modal	koluvizem pelic	Kultizem trenched	Luvizem modal	Luvizem stagnic	Pararendzina cambic	Pararendzina decalcified	Pararendzina melanic	Pararendzina modal	Regozem arenic	Regozem calcareous	Regozem modal	Regozem psefitic	Regozem stagnic	Sedozem modal	
Antropozem				1					1												23						7	0	1	1				0
Chernice gleyic			2										1																					0
Chernice modal	1	1	9	4	21																							2	2					22.5
Chernozem calcareous				67			8												4										17	4	3		6	61.5
Chernozem luvic						7																											7	50
Chernozem modal				8		1	74	1										1	5	1									3	4	2		1	73.3
Chernozem calcareous/ Koluvizem modal				1															4										1					83.3
Chernozem calcareous/ Regozem calcareous				2																									8					100
Chernozem luvic/ Regozem calcareous																													12				5	70.6
Fluvizem calcareous									1		1																							50
Fluvizem gleyic										8																								100
Fluvizem modal										2	186	16		1					1															90.2
Kambizem modal																	2																	100
Pararendzina cambic/ Kambizem decalcified															20		4		1			2		106	1		4	1	1					90
Pararendzina modal																					1			1		1	19		1					82.6
Regozem arenic															1							46		2				19		6	1			25.3
Regozem calcareous/ Pararendzina modal													1											1		2	35	3	8	2				82.7
Regozem modal										1	2				1							25	9	1				9		17	18		2	20
Regozem psefitic				2			2																					1	1	2	15			65.2

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Table S1 to be continued

Genetic soil representative	Soil profiles																																	conversion accuracy (%)
	Chernice calcareous	Chernice gleyic	Chernice modal	Chernozem calcareous	Chernozem chernic	Chernozem luvic	Chernozem modal	Chernozem pelic	Fluvizem calcareous	Fluvizem gleyic	Fluvizem modal	Fluvizem stagnic	Hnedozem luvic	Hnedozem modal	Kambizem decalcified	Kambizem luvic	Kambizem modal	Koluvizem calcareous	Koluvizem modal	koluvizem pelic	Kultizem trenched	Luvizem modal	Luvizem stagnic	Pararendzina cambic	Pararendzina decalcified	Pararendzina melanic	Pararendzina modal	Regozem arenic	Regozem calcareous	Regozem modal	Regozem psefitic	Regozem stagnic	Sedozem modal	
Regozem stagnic																														1		3		75
Sedozem modal/ Chernozem luvic																																	2	100
Sedozem modal/ Sedozem luvic						9	1							2					1														88	87.1
Hnedozem luvic/ Luvizem modal				1							1		29	26		1						1											1	48.3
Hnedozem luvic/ Regozem calcareous													1	4															2					42.8
Hnedozem modal				1									4	45		1													16				29	46.9
Hnedozem modal/ Regozem calcareous														6															11					100

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Table S2. BSRs converted in CTSCS nomenclature, number of relevant soil profiles according to their reclassification and converison accuracy

Basic soil representative	Soil profiles																																	converison accuracy (%)
	Chernice calcareous	Chernice gleyic	Chernice modal	Chernozem calcareous	Chernozem chernic	Chernozem luvic	Chernozem modal	Chernozem pelic	Fluvizem calcareous	Fluvizem gleyic	Fluvizem modal	Fluvizem stagnic	Hnedozem luvic	Hnedozem modal	Kambizem decalcified	Kambizem luvic	Kambizem modal	Koluvizem calcareous	Koluvizem modal	koluvizem pelic	Kultizem trenched	Luvizem modal	Luvizem stagnic	Pararendzina cambic	Pararendzina decalcified	Pararendzina melanic	Pararendzina modal	Regozem arenic	Regozem calcareous	Regozem modal	Regozem psefitic	Regozem stagnic	Sedozem modal	
Antropozem				1				1	1												6						19	1	1	4				0
Chernice gleyic			2										1																					0
Chernice modal	1	1	9	4	21																							2	2					22.5
Chernozem calcareous				58			8												4										12	3	4		6	61.1
Chernozem calcareous/ Koluvizem modal				1															2										1					75
Chernozem luvic						7																											7	50
Chernozem luvic/ Regozem calcareous																													12				5	70.6
Chernozem modal				19		1	76	1										1	5	1									9	7	16		1	55.4
Chernozem modal/ Koluvizem modal																			2															100
Chernozem modal/ Regozem calcareous				2																									8					80
Fluvizem gleyic										8																								100
Fluvizem modal/ Fluvizem calcareous									1	2	187	16		1					1															90.4
Kambizem modal																	2																	100
Pararendzina cambic/ Rendzina cambic/ Kambizem decalcified															20		4		1			2		106	1		4	1	1					90
Regozem arenic/ Regozem modal										1	2				2							71	9	3				29		23	19		2	32.3
Regozem stagnic																														1		3		75

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Table S2 to be continued

Basic soil representative	Soil profiles																															converison accuracy (%)
	Chernice calcareous	Chernice gleyic	Chernice modal	Chernozem calcareous	Chernozem chernic	Chernozem luvic	Chernozem modal	Chernozem pelic	Fluvizem calcareous	Fluvizem gleyic	Fluvizem modal	Fluvizem stagnic	Hnedozem luvic	Hnedozem modal	Kambizem decalcified	Kambizem luvic	Kambizem modal	Koluvizem calcareous	Koluvizem modal	koluvizem pelic	Kultizem trenched	Luvizem modal	Luvizem stagnic	Pararendzina cambic	Pararendzina decalcified	Pararendzina melanic	Pararendzina modal	Regozem arenic	Regozem calcareous	Regozem modal	Regozem psefitic	Regozem stagnic	Sedozem modal	
Rendzina modal/ Pararendzina modal/ Regozem calcareous													1								1			2		3	54	3	9	2				84
Sedozem modal/ Chernozem luvic																																	2	100
Sedozem modal/ Sedozem luvic						9	1							2					1														88	87.1
Hnedozem luvic/ Luvizem modal				1							1		29	26		1						1											1	48.3
Hnedozem luvic/ Regozem calcareous													1	4															2					42.9
Hnedozem modal				1									4	45		1													16				29	46.9
Hnedozem modal/ Regozem calcareous														6															11					100