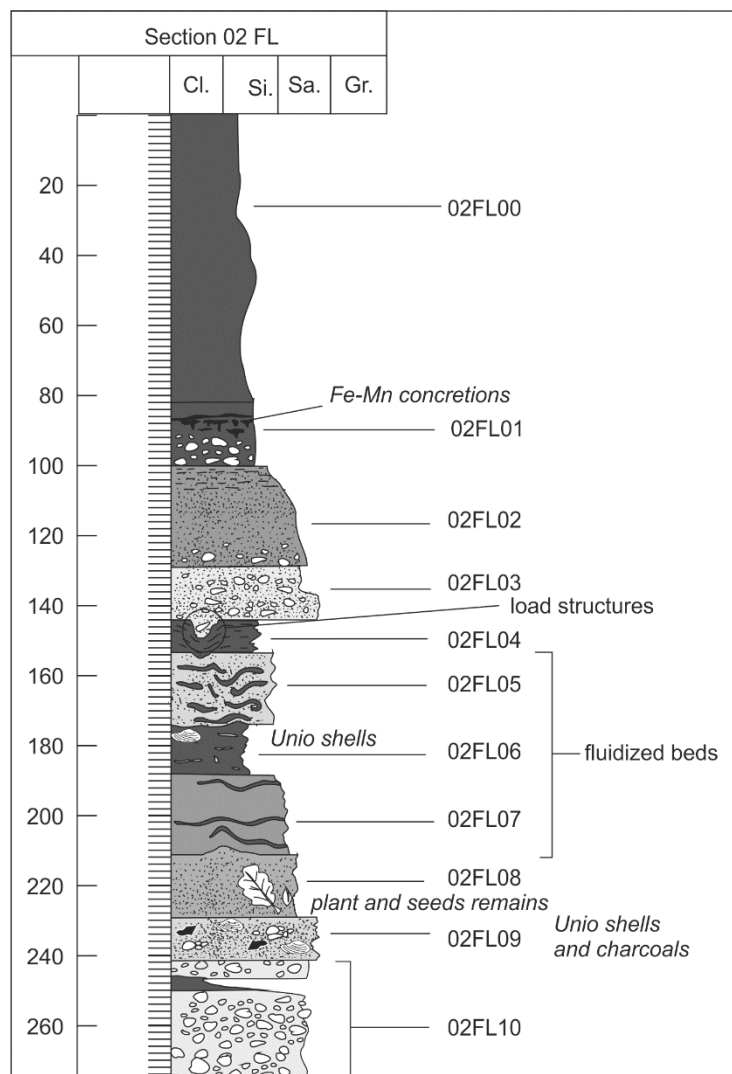
Supplementary File S1
Stratigraphy

Section 02FL

Unit	Thickness (cm)	Description
02FL00	83	Dark grey plastic clayey-silts
02FL01	17	Dark sandy silts passing downward to matrix supported gravels with abundant Fe-Mn coatings and concretions.
02FL02	29	Silty sands and sands alternating in lens-shaped thin beds, fining-upward into silts. At the base a level of matrix-supported gravel.
02FL03	15	Fining-upward clast-supported gravel. Pebbles up to some cm in size. The base is strongly undulated due to load structures deforming the top and the layering of the underlying unit.
02FL04	9	Sandy silt with alternating light and dark laminae in plane parallel bedding. The top, base and the internal lamination is deformed by load casts of the overlying unit.
02FL05	21	Sandy silt in alternating light and dark colored layers, finely laminated. The laminae are strongly convoluted. Convolution is not affecting the overlying unit. The geometry and distribution of the convoluted laminae suggest a fluidization process that affected the unit. Load casts from unit 02FL04 deform this unit locally.
02FL06	13	Dark massive silts with frequent shells of *Unio* in

Section 02 FL

Cl. Si. Sa. Gr.

02FL00
Fe-Mn concretions
02FL01
02FL02
02FL03
load structures
02FL04
02FL05
Unio shells
02FL06 — fluidized beds
02FL07
02FL08
plant and seeds remains
02FL09   *Unio shells and charcoals*
02FL10

		entire specimen or broken fragments.
02FL07	23	Silty sands alternating with thin beds of dark silts rich in organic matter. The entire bed is convoluted and homogenized, consistently with a fluidization process.
02FL08	19	Thin-bedded sandy layers alternating with dark silts in convolute geometry (fluidization). Frequent vegetation remains.
02FL09	12	Sands with small lenses of gravel and frequent remain of *Unio*. Charcoals, brick, and ceramic fragments are abundant.
02FL10	35	Clast-supported gravels with a thin lens of dark fine laminated silts included.

Section 03FL

Unit	Thickness (cm)	Description
03FL11	3	Weakly clayey silts, with plane parallel thin laminations and diffuse reddish coatings.
03FL12	12	Coarse sands with fining-upward to weakly clayey fine sands and then coarsening-upward to coarse sands again.
03FL13	6	Weakly sandy dark silts.
03FL14	29	Clast-supported gravelly beds, roughly bedded in cycles of fining upward intervals. Clasts are sub-rounded to subangular and some cm in maximum size.
03FL15	14	Clayey silts and thin discontinuous lenses of fine sand finely laminated. At the base rich coatings and concretions of Fe-Mn.
03FL16	14	Weakly clayey silts, more clayey at the base, with thin alternating lenses of fine sand, finely laminated. The base is constituted of a thin interval of matrix-supported gravel.
03FL17	7	Matrix supported gravel in a silty-sandy matrix.
03FL18	28	A silty-sandy interval. From the top: medium sand gradually passing downward to silty fine sand. Then, a level of fine sand gradually passing downward to weakly sandy silt. A t the bottom, fine dark silts interbedded with thinly laminated fine sands.
03FL19	30	The unit consists of two fining-upward beds of coarse clast-supported gravel. Clasts are subrounded to subangular with aligned long axis of clasts.
03FL20	13	Medium sands, weakly silty, with increasing silty component downward and an overall inverse gradation.

Section 03 FL

Cl. | Si. | Sa. | Gr.

03FL11
03FL12
03FL13
03FL14
Fe-Mn concretions
03FL15
03FL16
03FL17
03FL18
03FL19
03FL20
03FL21
03FL22
03FL23
03FL24
Unio shells and charcoals

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260
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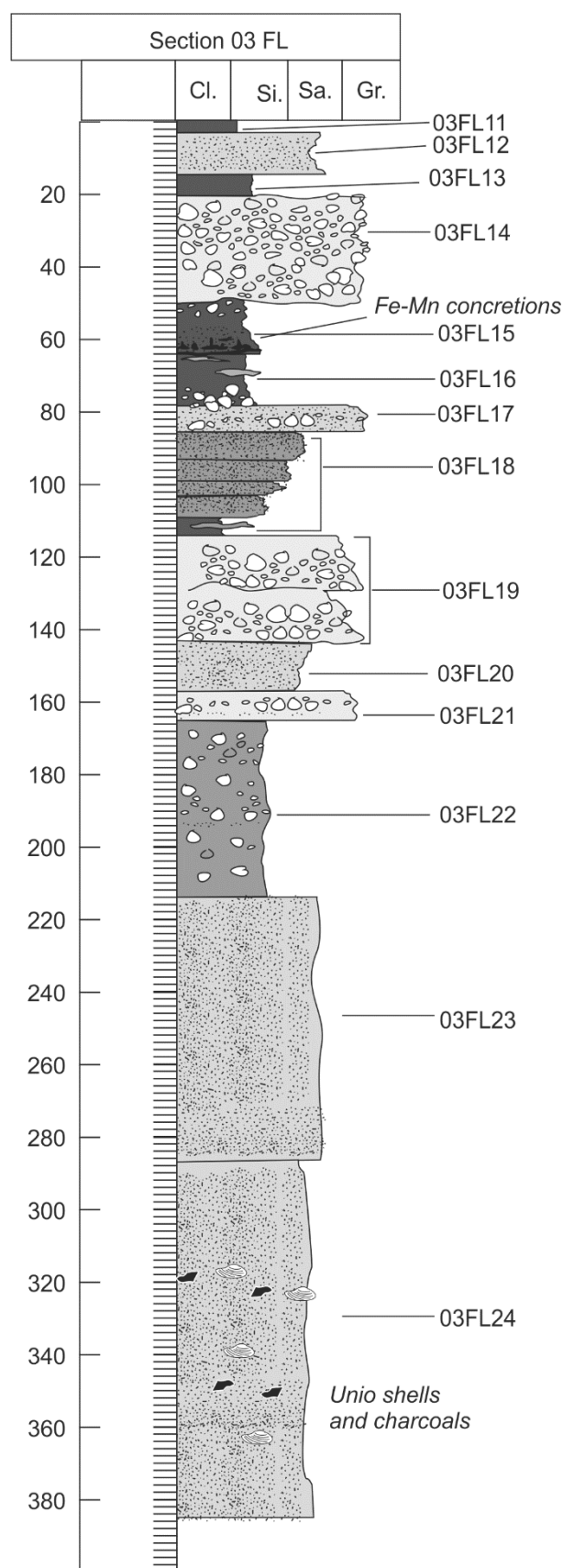
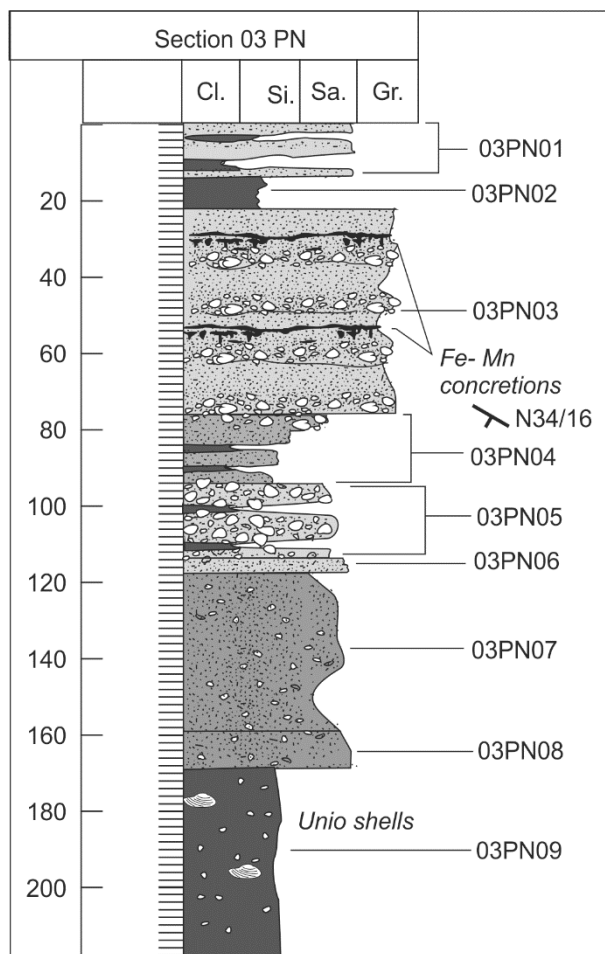
340
360
380

		Plane parallel laminations are present.
03FL21	9	A bed of clast-supported gravel with local small lenses of dark silt embedded.
03FL22	48	Massive bed of weakly sandy silt.
03FL23	72	Silty sand with interbedded thin layers of dark silts rich in organic matter.
03FL24	98	Massive silty sand with frequent fragments an shells of *Unio* and diffuse charcoals.

Section 03PN

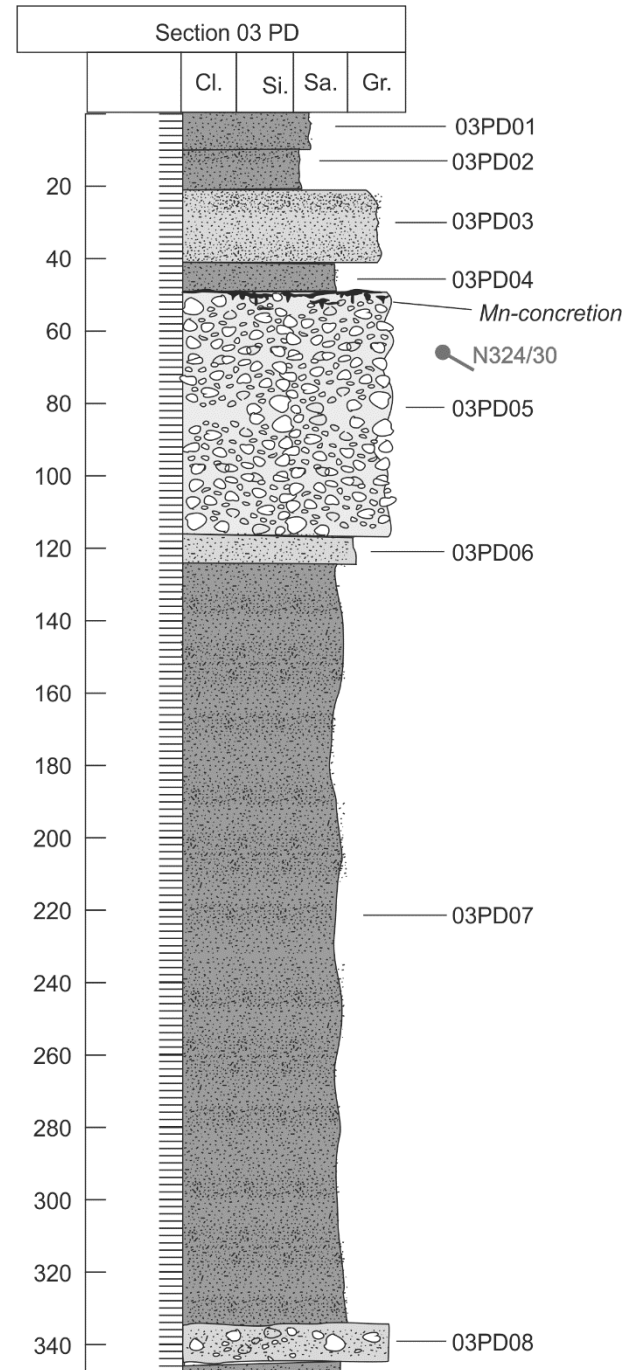
Unit	Thickness (cm)	Description
03PN01	15	Well selected inversely graded coarse sands with clasts up to some mm and interbedded lenses of fine sands.
03PN02	8	Clayey silts with a small fraction of fine sand, finely laminated. Presence of interbedded thin layers rich in organic matter.
03PN03	54	This unit includes four stacked banks of clast-supported gravels, with apparent imbrications (flow direction to the south) of subrounded to subangular clasts.
03PN04	18	Inversely graded thin bedded fine sands alternating with lenses of clayey silts. Plane-parallel fine laminations are present.
03PN05	20	Matrix-supported gravel alternating with thin beds of sandy silt.
03PN06	4	Matrix-supported gravel alternating with laminated thin beds of sandy silt.
03PN07	39	A thick bed of sands normally and inversely graded.
03PN08	10	Massive medium sand.
03PN09	50	Massive clayey silts with dispersed cm sized clasts and abundant shells of *Unio*.

Section 03 PN

Section 03PD

Unit	Thickness (cm)	Description
03PD01	10	Weakly silty fne sands con thin plane parallel laminations
03PD02	12	Silty/clayey fine sands.
03PD03	22	Matrix supported gravel with subangular to subrounded clasts of max. some cm in radius into a sandy matrix. Sparse laminated clay-chips of fine-grained reworked units and alternating lenses of clean well-selected coarse sand. Some charcoals are present.
03PD04	8	Weakly silty fine sands passing upward to clean and well-selected coarse sand. Plane parallel lamination are present.
03PD05	68	Clast-supported coarse gravel in a sandy matrix, roughly bedded. Locally, reddish to orange coatings of Fe are present.
03PD06	7	A lens of weakly silty fine sands passing upward to clean and well-selected coarse sand. Plane parallel lamination are present.
03PD07	210	Coarse sands with sparse cm-sized clasts, subangular to sub-rounded.
03PD08	10	Clean and well-selected fine gravel
03PD09	50	Coarse sands with sparse cm-sized clasts, subangular to sub-rounded.
03PD10	200	Medium to coarse weakly laminated sands with interbedded a 30-cm thick lens of dark laminated silt.
03PD11	80	Beds of clean and well-selected gravel with subangular clasts alternating with badly selected coarse

Section 03 PD

Cl. | Si. | Sa. | Gr.

03PD01
03PD02
03PD03
03PD04
Mn-concretion
N324/30
03PD05
03PD06
03PD07
03PD08

		sands. Reddish Fe coatings are diffuse. S0 N343/26
03PD12	15	Weakly silty fine sands with thin plane parallel laminations. S0 N312/23
03PD13	100	Matrix-supported conglomerates alternating with clean and well-selected gravel or badly selected gravel in lenses.