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Burial site hidden in a clearance cairn at Alu, Raplamaa

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INTRODUCTION

The site discussed in this paper (Reg. No. 12155) is located in an open farm field a few kilometres north of Rapla, between the smaller settlements of Alu and Sikeldi (Fig. 1).[1] Situated at a higher point on a gently undulating moraine plain, the site is overlooking the terrain which is smoothly sloping towards the south. It had been subject to state protection since 1977 when the cairn was recognised as a stone grave from probably the first centuries AD, with the field clearance stones overlain on it at a later date (Tõnisson 1977). This judgement, however, was based on only visual inspection; no bones or artefacts were recovered. The 2015 excavation of the site was due to the planned route of the Rail Baltic railways, where all archaeological and other monuments had to be studied in advance of its construction (see Lang *et al.*, this volume). The University of Tartu was contracted by Technical Regulatory Authority to perform the excavations.

Fig. 1. *Location plan of the site. The site is marked with a red circle.*

Jn 1. *Muistise asendiplaan. Muistis on märgitud punase ringiga.*

Base map / Aluskaart: Estonian Land Board / Maa-amet; processing / töötlus: Ragnar Saage

First we cleared the cairn of thick brush, sparing only a birch tree on the eastern end. The topmost layer, up to 40 cm thick, of loose and recent clearance stones were removed with a backhoe loader. The remaining stones (and some moraine beneath the cairn) were stripped off manually in ten layers. A layer is to be understood here as an arbitrary excavation unit, made up of simultaneously visible (uncovered) stones. In addition to the standard procedures of description and photography, the recording of each layer involved the creation of 3D models[2] (Laneman *et al.* 2015).

The excavation revealed that the overwhelming majority of the cairn was, from top to bottom, an irregular pile of clearance stones. Burials were present but in a different form from

[1] Today this land is officially part of Kalevi village, the core of which lies several kilometres north-east. Historically, the land belonged to Alu Manor. Local people also define the place by referring to Alu, which lies closer and has a longer history than Kalevi.

[2] 3D models (created by using the Agisoft PhotoScan photogrammetry software) are stored in TÜAK and are also accessible online at https://sketchfab.com/r.saage/folders/alu.

what was suggested in 1977. In the following, we first discuss the clearance cairn as the stratigraphically topmost but chronologically later feature, and then we shift to the burials. The aim is the presentation and basic interpretation of the excavation results, and we shall not go into detail in discussing the history of agriculture or Pre-Roman Iron Age mortuary practices.

CLEARANCE CAIRN

Fig. 2. *Clearance cairn after the removal of the topmost (recent) stones. View from the north-west.*
Jn 2. *Põllukivihunnik pärast kõige pealmiste (hiliste) kivide eemaldamist. Vaade loodest.*
Photo / Foto: Margot Laneman

The clearance cairn, slightly elongated in an east–west direction, was *ca*. 15 × 11 m in size (Figs 2, 3). The thickness of the stone coating was up to 1 m. Since the stones had been collected above and around a low hump, *ca*. 30–40 cm in height, the cairn rose up to 1.4 m above the surrounding field. The surface of the cairn was uneven, with its highest points at the eastern and western ends where piles of stones had been added quite recently, perhaps in the mid-20th century or even later. The middle part of the cairn was lower and showed a few heavily overgrown patches with tightly situated stones, which were initially mistaken to be the original surface of the grave.

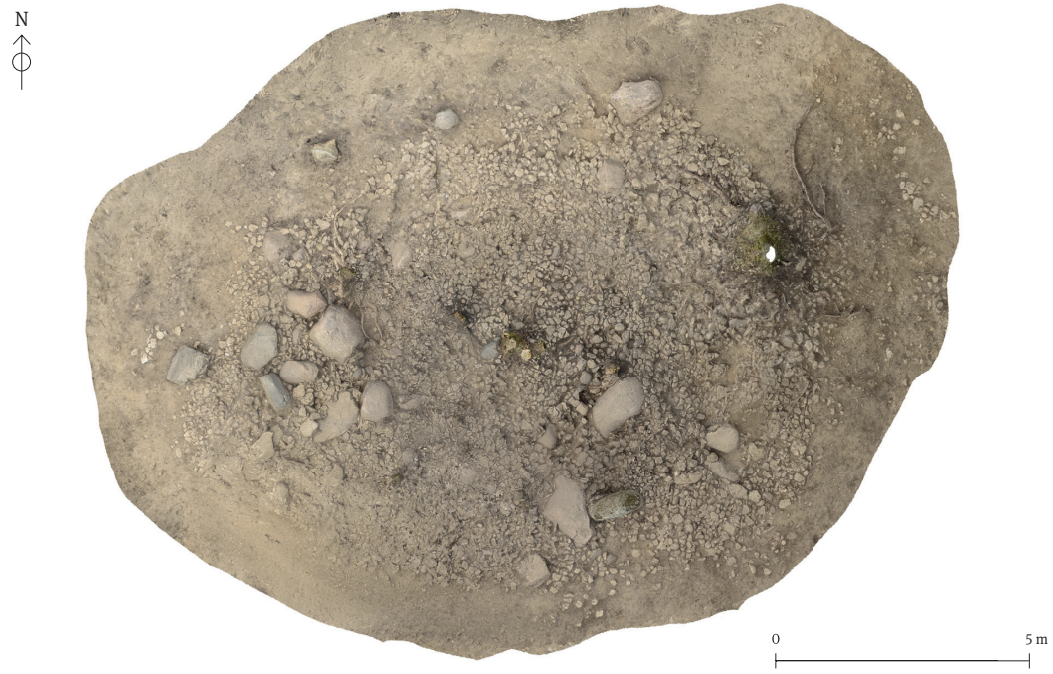

Fig. 3. *Clearance cairn after the removal of three layers of stones.*
Jn 3. *Põllukivihunnik pärast kolme kivikihi eemaldamist.*
Ortophoto of the 3D model / Ortofoto 3D-mudelist: Ragnar Saage

The cairn was composed of both granite stones and limestone, rather equal in proportion. Most of the stones were small enough to be grasped and tossed away. There were, however, considerably bigger granite stones and a few plates of limestone that were difficult or impossible to lift single-handedly. Such stones were relatively numerous in the topmost layers, though even larger boulders were present also in the lower layers, mainly in the eastern and western ends of the cairn. Among them, however, it was difficult to differentiate between clearance stones, intentionally arranged grave stones, and boulders planted by the last glacier. Most probably, all three categories were present and partly overlapping. Mainly found in the western end of the cairn, a few boulders were situated above a thin layer of stone shingle. These were probably carried from the field, since excavation under these boulders exposed some finds.

Finds

Table 1 provides an overview of the artefact finds recorded at the excavation. The finds were scattered between and beneath the stones, and their spread showed no significantly structured patterning. Some of the finds may have been associated with the burials, but unfortunately they cannot be differentiated from finds of later dates.

Table 1. *Finds collected at the excavation at Alu. Dates for the Siegburg stoneware and the pipe were provided by Erki Russow (pers. comm.), and dates for other wheel-thrown pottery, forged nails, and a bone button by Andres Tvauri (pers. comm.). Fr(s) – fragment(s).*

Tabel 1. *Alu kaevamistel kogutud leiud. Siegburgi kivikeraamika ja piibu dateeris Erki Russow (otse autoritele), ülejäänud kedrakeraamika, sepanaelad ja luunööbi Andres Tvauri (otse autoritele). Fr(s) – katke(d).*

Compiled by / Koostanud: Margot Laneman, Valter Lang & Ragnar Saage

Finds / Leiud	Number / Arv	Date / Dateering
Frs of earthenware vessels	70–85	Iron Age?; late 12th – 13th cc.; 13th – 14th cc.; 14th – 15th cc.
Frs of Siegburg stoneware	2	14th c.; 15th – early 16th cc.
Frs of glazed redware	1–2	17th – 18th cc.
Frs of burnt clay	55–70	?
Quartz flakes and a blade	75 + 1	?
Flint flakes	18	later Iron Age or historical period
Other stone finds (calcite, garnet, rock crystals)	30	?
Copper alloy finds	10	?
Forged iron nails, incl. horseshoe nails	9	historical period (17th – 19th cc.?)
Other iron objects	9	?
Frs of clay crucible(s)	5	?
Slags	6	?
Frs of glass	2	Medieval or early Modern Age?
Frs of a clay pipe	4	19th c.
Fr of a whetstone	1	?
Fr of a bone button	1	18th – 19th cc.

The fragments of clay vessels are very small, with measurements never exceeding 3 cm. In some instances it is impossible to differentiate between a potsherd and an ambiguous piece of burnt clay, hence the number of both find types is difficult to establish. The earthenware sherds originate from at least a dozen of vessels. Most or at least half of them have been wheel-thrown, but handmade pottery is also present. The dates of handmade vessels are

impossible to determine. The wheel-thrown pottery includes, according to Andres Tvauri, items representing Pskov groups 3: 2 and 4 of Slavic-type earthenware (TÜ 2525: 82, 84 and 32, 153, respectively), dated to the late 12th – 13th and 14th – 15th centuries, respectively (Tvauri 2000; 2005). One sherd (: 27) was dated to also the 13th – 14th centuries. One of the stoneware fragments probably represents the version I of a *Jacobakanne* jug from *ca.* 1325–1380 (Russow 2006, fig. 12: 3), whereas the second fragment is younger (see Table 1). The ambiguous pieces of burnt clay (daub?) are comparable with the potsherds in size; they come in different shapes and shades and their function is unknown.

Many of the flint flakes bear notches that indicate their use in fire-lightning with a steel (Kriiska & Johanson 2015). Most of the items are of imported Cretaceous flint but Silurian and Carboniferous flints are also represented. Of quartz flakes, only one (TÜ 2525: 198) shows use-wear traces. Besides recorded quartz finds, unworked 'natural' quartz was also common at the site. It is questionable whether the pieces of calcite, garnet, and rock crystal reached the site through human activity or are of purely natural origin.

Items made of some copper alloy are mostly unidentifiable fragments or even green dust, except for two coiled bronze wire tubules which, however, differ from usual forms of this find type and are thus difficult to date (Riina Rammo, pers. comm.). X-ray fluorescence (XRF) analysis revealed that most of the items were made from bronze, two from brass, and two from impure copper (Saage 2015). The majority of the iron objects, besides the nails, are also too heavily corroded to be identifiable.

A remarkable find is a fragment of a crucible with a droplet of copper-silver alloy on its exterior surface (TÜ 2525: 87). XRF analysis established that silver makes up roughly one-third of the droplet's consistence, which gives a clear indication that the crucible had been used for casting silver in addition to copper alloys (Saage 2015). An analysis of the interior surface of the same fragment, however, revealed a very low concentration of silver compared to other detected metals. The case is significant because it shows that element analysis of the crucibles' inner surfaces may provide very weak silver signals that can easily be overlooked as unintentional impurities. As for the other crucible fragments, their interiors yielded similar results with the discussed specimen, and it is possible that they originate from the same item.

Along with the finds presented in Table 1, the cairn contained numerous recent items that were not recorded and stored as finds, such as for instance pieces of ceramic building material and even a few bricks, heavily corroded iron nails, crown corks and a tin can, a few plastic buttons and footwear outsoles, a couple of small components from agricultural machinery, fragments of an exploded artillery shell, etc. Particularly the eastern half of the cairn produced over thirty corroded cartridge cases, mostly but perhaps not exclusively blanks. Tens if not hundreds of small bottles, probably cologne or medicine containers, had been deposited at the northern foot of the cairn. Such finds, although most numerous in the upper layers, were present all the way down to the cairn bottom.

There are multiple ways for such a find assemblage to form. As mentioned above, some of the finds may have accompanied the burials. A shepherd's or farmer's outdoor lunch or a smoke (pipe) break may have contributed to the collection. Manure brought to the field may have contained small artefacts. It is known that stone cairns have been used for dumping rubbish, which is highly likely in this case also. In the modern era, when field stones are removed with bulldozers (see e.g. Kivide koristamine... 2015), even artefacts from (other) archaeological sites may end up in a cairn. Shell fragments, which are numerous in the surrounding field as well, originate from an explosion that had occurred not far from the cairn.

Faunal remains

The excavation produced approximately 300 g of faunal remains, of which slightly over 70 g were too small for determination (Maldre 2015). The vast majority of the bones are unburnt, but at least three (indeterminable) fragments are burnt. An overview of the species and skeletal parts is provided in Table 2.

Table 2. *Species and anatomical composition of the faunal remains collected at the excavation at Alu. MNI – minimum number of individuals (unspecified if the bones may belong to an animal or animals represented in the above row/rows).*
Tabel 2. *Alu kaevamistel kogutud loomaluude liigiline ja anatoomiline koostis. MNI – minimaalne indiviidide arv (on jäetud täpsustamata juhul, kui luud võivad kuuluda mõnele ülemisel real / ülemistel ridadel esindatud loomale).*
Compiled by Margot Laneman, Valter Lang & Ragnar Saage after Maldre 2015 / Koostanud Maldre 2015 põhjal Margot Laneman, Valter Lang ja Ragnar Saage

	cranium	mandible	teeth	vertebrae	coracoid	ribs	sternum	scapula	humerus	ulna	radius	carpals	metacarpals	pelvis	femur	tibia	lat. malleolus	calcaneus	metatarsals	digital bones	indeterminable	Total / MNI
Cattle (*Bos taurus*)	1		1	1		1	1		1					1					2			9/2
Sheep/goat (*Ovis aries / Capra hircus*)	1		20			2			1					1	1		1					27/4
Sheep (*Ovis aries*)													1							1		2
Domestic pig (*Sus domesticus*)	2		4	4		1		1	3	1		2								2		20/4
Domestic pig / wild boar (*Sus* sp.)															1							1
Cat (*Felis catus*)									1													1/1
Dog/wolf (*Canis* sp.)																		1				1/1
Shrew (*Sorex* sp.)	1																					1/1
Mole (*Talpa europaea*)									6	1												7/3
Hedgehog (*Erinaceus europaeus*)	1																					1/1
Leporids (*Leporidae*)	1	1		1						1	1				1				1			7/2
Water vole (*Arvicola amphibius*)		2																				2/2
Voles (*Microtus* sp.)	7	12																				19/7
Rodents (*Rodentia*)				4										4	4	2						14
Toad (*Bufo bufo*)								1	1													2/1
Chicken (*Gallus gallus domesticus*)					1				1													2/1
Domestic pigeon / stock dove (*Columba livia f. domestica* / *Columba oenas*)									1													1/1
Grey partridge (*Perdix perdix*)									2													2/1
Grey partridge / hazel grouse (*Perdix perdix / Bonasia bonasia*)					1					1	1											3
Common starling (*Sturnus vulgaris*)	1																					1/1
Birds (*Aves*)				1																		1
Zander (*Lucioperca lucioperca*)	10																					10/1
Salmon/trout (*Salmo* sp.)				1																		1/1
Indeterminable	3	1	5	5		5		2	1						1	3					131	157
Total	28	16	30	15	2	9	1	2	18	4	2	2	1	6	8	5	1	1	3	3	131	292/35

Similarly to other finds, the animal bones were randomly scattered between stones all over the site. The spread was the densest in the south-eastern quarter of the cairn, around one of the burial areas, but interestingly this applies to both the domesticates and smaller creatures like rodents, moles, etc., whose presence probably has no direct connection to human activity. It is nevertheless possible that some of the animal bones, particularly from

sheep/goat, belong with the burials. On the other hand, cut marks from modern devices on a number of pig and cattle bones, as well as the good state of preservation and measurements of the bones, attest that the assemblage includes recent material. The bone of a wolf or, more probably, a big dog, and the bone of a young adult cat also look very 'fresh'. Based on their location (upper strata) and state of preservation, all the bird and fish remains are recent. What was said above about the origin of the artefact finds applies also to the faunal remains.

As for the (slaughter) ages of the animals, according to Maldre 2015 the cattle bones indicate at least one calf and one probable adult. Pigs include a newborn piglet, a piglet under six months old, another subadult, and a female over nine months old. Of sheep or goats, there are bones of a very young lamb, two individuals 12–21 months and *ca*. 18 months old respectively, and an adult older than three years. Leporids are present with at least one juvenile and one adult. Although they are most probably European hares (*Lepus europaeus*) or mountain hares (*Lepus timidus*), rabbits (*Oryctolagus cuniculus*) cannot be ruled out.

Dating

The dating of such cairns is complicated by a variety of factors: the cairns evolve gradually over long periods of time; even if datable finds are present it is difficult to establish when and under which circumstances they reached the cairn (see the discussion on finds above); stratigraphic relationships may have been dramatically altered by the roots of trees, removal of stones for some utilitarian purposes, and/or by compacting the cairn with a machine to make more arable land. Although we found no clear evidence of machine-powered compacting, stone 'robbery', or displaced cultural layers, all the other factors were apparently applicable. Recent and more archaic finds were intermixed. None of the finds that could be dated with reasonable precision had a context that would have allowed us to determine when the first clearance stones were brought. It cannot be established how and when the finds reached the site and whether or to what extent the cairn existed upon their arrival. Radiocarbon dating of charcoal would not help because although it was present in abundance, particularly in the eastern half of the cairn, the charcoal was associated with the upper rather than the lower stone layers. We also looked through the historical maps but they provided no helpful information to date the cairn.

It is however likely that the cairn, particularly its southern part, was present and relatively tall by the onset of the 20th century at the latest. This is suggested by its overall (old) appearance and by the fact that most of the forged nails and a 19th-century glass bottle (dated by Andres Tvauri) were situated relatively high in the cairn. It is not impossible that the major part of the cairn was formed as recently as the late 19th century. The arrival of the very first field stones, however, may have occurred considerably earlier. Unfortunately this event must be dated to a protracted time span between the end of the burial phase (see below) and the 20th century. For the latest insertions of field stones, it is appropriate to refer to Tõnisson (1977), who suggested that the uppermost stones had been added at the 'time of farms' (i.e. the pre-Soviet era) and also during the 'latest decades'.

BURIALS

The cairn concealed inhumed remains of probably two adult individuals. The bones are heavily fragmented and include no recurrent skeletal elements, but the morphology and dental wear of the recovered teeth clearly indicate a minimum of two persons (Malve & Laneman 2015).

This is also implied by the clustering of bones in two separate areas. The probable burial plots were situated, respectively, in the south-eastern and western parts of the original moraine hump, a few metres apart from each other (Figs 4, 5).

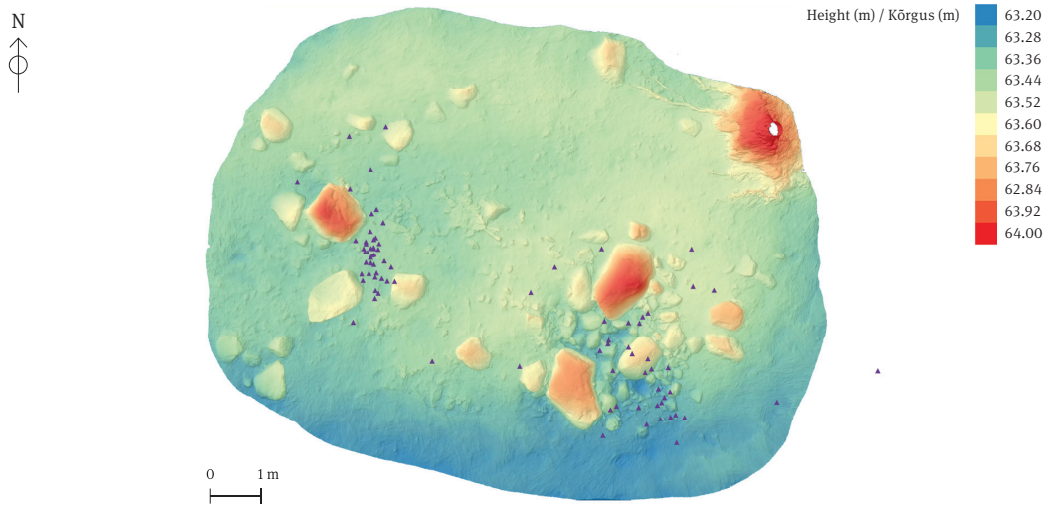

Fig. 4. *Distribution map of the human bones.*
Jn 4. *Inimluude asendiplaan.*
Digital terrain model of the 3D model / Digitaalne kõrgusmudel 3D-mudelist: Ragnar Saage

Fig. 5. *The site after the removal of (the majority of) clearance stones. In the foreground (right corner) the area of the south-eastern burial; in the background, between the big stones, the area of the western burial. View from the south-east.*
Jn 5. *Muistis pärast (enamiku) põllukivide eemaldamist. Esiplaanil (paremal) kagupoolse matuse asukoht; tagaplaanil suurte kivide vahel läänepoolse matuse asukoht. Vaade kagust.*
Photo / Foto: Margot Laneman

South-eastern burial

The south-eastern burial seemed to have been severely disturbed. The original grave was apparently located on the highest spot of the moraine hump next to two granite boulders, which stood over 0.5 m tall and had other dimensions around up to 1.5 m (Fig. 5). The boulders were probably placed there by glacier, not man. There may have been a shallow grave pit, or at least the topsoil seemed to have been removed from between the boulders. The grave may have had a floor of limestone slabs, unless the observed limestone debris was a purely natural phenomenon. Other stones, some of them of considerable size, seemed to have been arranged around the grave between and beside the above-mentioned boulders to form a kind of border or surround (to call it a wall would be an exaggeration). A single layer of granite stones *ca.* 30–40 cm in size was also found above the proposed grave, but it remains unknown whether this was an intentional stone blanket or the stones had collapsed from the above-mentioned surround. Unfortunately, the southern part of the structure was destroyed, and therefore its original size and shape remain undetermined. Most probably it was quite a small structure, a few metres across. We also do not know about its superstructure, but if it was of stone it was probably quite low (compared to the big boulders), since most of the fill between the boulders was made up of clearance rather than grave stones. The boulders themselves must have been visible from the surface both before and after the burial, until they became buried under the clearance stones.

Fig. 6. *Fragments of the two femora in the south-eastern burial. View from the south.*
Jn 6. *Kagupoolse matuse reieluude fragmendid. Vaade lõunast.*
Photo / Foto: Margot Laneman

Human bones were scattered over the described structure and even beyond (Fig. 4), and their vertical positioning also showed considerable variation. The cleaned bones are almost 240 g in weight and comprise fragments from the head, trunk, upper and lower limbs, and from both the left and right halves of the body (for a detailed account see Malve & Laneman 2015). The most well-preserved bones were the fragments of two femora, which were lying between the big boulders under a cover of smaller granite stones (Fig. 6). The proximal ends of the diaphyses were pointing to the north, the right leg was to the west, and the left to the east; nevertheless the distance between them was too small for an intact extended inhumation. The bones also include a fragment of mandible with three heavily worn teeth, which indicate an individual 35–45 years of age (after Brothwell 1981, 72, fig. 3.9). Since tooth wear is a highly individual feature and other bones show no age markers, this estimation cannot be taken for a definitive age determination: a more truthful, though necessarily more ambiguous, assessment would be an adult, neither very young nor old. The size of the mandible suggests a male rather than a female, but this is insufficient for a certain sex determination. The spread of the bones, which showed no anatomical order whatsoever, is probably a result of severe disturbance, although secondary bone deposition practices cannot be ruled out either.

The area of the suggested burial yielded numerous artefact finds. Quartz flakes, bronze items, burnt clay, and particularly some potsherds may be contemporaneous with the human bones. Unfortunately none of the finds have a firm date. The same applies to animal bones, including sheep/goat teeth, which were remarkably numerous in this region. On the other

hand, such finds were side by side with not only the human bones but also with the wheel-thrown pottery, forged nails and other late material, which is probably another indication of the disturbed state of the area.

Western burial

The other possible burial seems to have been embedded in the soil, with roughly 15 cm earth above and little less beneath, leaving one with an impression of a shallow grave. No clear indications of its existence were present higher in the clearance cairn or on the original ground surface under the cairn. It is nevertheless likely that big boulders had a part to play also in this burial (see Figs 4, 5). One of them was a roundish rock over 0.7 m tall, which most probably was present before the burial. Another one was a flat stone measuring *ca*. 1.2 × 0.7 × 0.3 m; its origin and connection to the burial is somewhat dubious, but it is worth considering what an impression it would have made if placed in an upright position. A slightly smaller granite stone, most likely not a clearance stone, was situated also on the other (eastern) side of the burial. A similar stone was found above the southern part of the grave (visible in Fig. 3), but it may also have been a clearance stone.[3] A surround of smaller stones, as observed in the south-eastern burial, seemed to have been absent, unless completely destroyed or indiscernible from the clearance stones.

The densest concentration of bones spanned an area of *ca*. 1.7 × 0.5 m between the described stones (Fig. 4). Vertically, the bones were situated within a 10 cm thick segment of soil. It is notable that the femora of the south-eastern burial were lying at roughly the same level. The total weight of the western bone assemblage is *ca*. 135 g, and it comprises fragments from the head (no cranium; only the mandible and probably a few teeth), the vertebral column, an arm or arms and a leg or legs; both left and right body halves are represented (Malve & Laneman 2015). The most well-preserved bone was a *ca*. 24 cm long fragment of the left tibia, aligned north–south in the southern part of the grave (Fig. 7). Also notable is a fragment of a lumbar vertebra with signs of spondyloarthrosis, since no other bone of the whole site displayed pathological features (apart from a few teeth with caries and calculus). The arrangement of the bones was generally accordant with an extended north–south oriented inhumation, with the head to the north. It is possible that the original form of the south-eastern burial was similar.

The preserved bone fragments had no markers that can be used to determine the sex of the individual. Age determination is, beyond a crude estimation that the bones belong to an adult, also complicated. The only means for more precise age estimation are the teeth which, unfortunately, were dispersed; their relation to the buried individual is therefore uncertain. The closest tooth was found 1.6 m north-west from the mandible, and the remaining two were located

Fig. 7. *The most well-preserved part (around the left tibia) of the western burial. The stones visible in the upper part of the photo are a natural setting of moraine. View from the west.*

Jn. 7. *Kõige paremini säilinud osa (vasaku sääreluu ümbrus) läänepoolsest matusest. Foto ülemises osas näha olevad kivid on looduslikus asendis moreen. Vaade läänest.*

Photo / Foto: Margot Laneman

[3] There were numerous stones of similar sizes in the western end of the cairn which, judging from their positioning, were probably clearance and not grave stones.

even farther to the south-east and east. However, they are incompatible with the teeth of the south-eastern individual, since they display only mild wear and, accordingly, indicate an individual 25–35 years old (after Brothwell 1981, 72, fig. 3.9). Again, this is an insecure method for a definitive age determination, particularly if the origin of the teeth is questionable.

No grave goods were found together with the bones. There was a tiny potsherd in the close vicinity, but it was found by soil sieving and may thus have been originated from also the clearance cairn. A few other ambiguous potsherds and a flint flake were situated above the grave site and have most likely a considerably later date than the burial. In the farther surroundings of the suggested grave, at various altitudes in and under the cairn, a range of other (late) finds was made, including the exemplars of almost all find classes presented in Table 1.

Dating and context

Since the artefact finds were unhelpful in dating the burials, a few bone samples were radiocarbon dated at the Scottish Universities Environmental Research Centre AMS Facility in Glasgow. The information on the samples and results of the analysis is detailed in Table 3.

Table 3. *Radiocarbon dates and stable isotope measurements of the human bones from the burial site at Alu. Calibration after OxCal v4.2.4, using IntCal13 calibration curve (Bronk Ramsey 2009; Reimer* et al. *2013). l. – left; r. – right; W – the western burial; SE – the south-eastern burial.*

Tabel 3. *Alu matmispaigalt leitud inimluude radiosüsinikudateeringud ja stabiilsete isotoopide sisaldus. Kalibreeritud OxCal v4.2.4 järgi, kalibreerimiskõveraks IntCal13 (Bronk Ramsey 2009; Reimer* et al. *2013). l. – vasak; r. – parem; W – läänepoolne matus; SE – kagupoolne matus.*

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Burial / Matus	Sampled bone / Dateeritud luu (TÜ 2525: ...)	Lab code / Laboritähis SUERC-...	Date BP / Dateering BP	Date cal / Kalibreeritud dateering (95.4%)	^{13}C (‰)	^{15}N (‰)	C/N
W	l. tibia (215)	63659	2209±33	380–200 BC	–20.4	8.4	3.4
W	femur (226)	63660	2213±33	380–200 BC	–20.5	8.5	3.3
SE	l. femur (190)	63661	2162±31	360–110 BC	–21.5	8.9	3.2
SE	r. femur (251)	63665	2166±33	360–110 BC	–21.1	8.8	3.3
SE	parietal bone (296)	63666	2145±31	355–60 BC	–21.0	8.6	3.3
SE	parietal bone (208)	Failed: insufficient carbon					

The AMS dates are thus unanimously indicative of the middle part of the Pre-Roman Iron Age. At first glance, the site may appear 'atypical' and unusual in this context, because no exact counterparts to such burials are currently known. On the other hand, the originality diminishes after a closer look at the diversity of Pre-Roman Iron Age burial/mortuary structures and practices, which include early *tarand*-graves, various cairn graves, insertions in Bronze Age stone-cist graves, earth-cut graves, and both inhumation and cremation (for a more detailed overview, see Lang 2007, 166ff., 217ff.). The burial mode (inhumation) and orientation (north–south), and also the poor or lacking provision of grave goods at Alu appear to be compatible with the general Pre-Roman Iron Age burial pattern. The number of burials accords with some of the cairn graves and late use-phase of old stone-cist graves (rather than early *tarand*-graves which are considered a 'signature' grave type of the period). The interpretation of such sites with only a few dead inevitably presents many difficult questions, such as: Where and how were other members of the community buried? Were the deceased outcasts, and if not, why were they excluded from the community cemetery? Was an isolated burial a sign of deference or disgrace? The available evidence, however, is capable of multiple interpretations.

As for other contemporary sites in the surroundings of Rapla, there was a cairn grave with two concentric stone circles, 19 and 15 m across, and with burnt and unburnt bones at Adila (Tallgren 1922, 86–87). The finds date the earliest burials to the (later) Pre-Roman Iron Age. A large hilltop site with an unknown function, radiocarbon-dated to *ca*. 400–200 BC, has been excavated at Võnnumägi near Keava (Lang & Laneman 2012), whereas the enclosure built on flat land at Lipa has a more ambiguous date within the Early Iron Age, i.e. 500 BC – AD 450 (Konsa *et al*. 2006). Some other sites may be contemporaneous with the burials at Alu (see Lang *et al*. 2012, fig. 9.2), but this cannot be verified without excavation. All of the excavated sites are located at a distance of over 10 km from Alu and thus do not contribute significantly to the understanding of the burial site. Therefore, we will not go into further speculation on this topic.

CONCLUSIONS

Excavations at Alu exposed a Pre-Roman Iron Age burial place which, however, does not easily fit into the frames of the existent grave typology. The features of both stone graves and earth-cut graves were present at the site, while the 'burial population' consisted of probably only two individuals. A rock-strewn hump, particularly one with some artificially inserted stones, would be an anticipated place for a clearance cairn. It is therefore no surprise that the burial site itself became gradually buried under field stones, which finally turned out to form a dominant part of the site. While it is tempting to indulge in discussion about how intriguing such 2-in-1 sites are, and how many apparent stone graves may turn into clearance cairns and *vice versa*, we leave this to our gentle reader to contemplate.

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PÕLLUKIVIHUNNIKUSSE PEITUNUD MATMISPAIK RAPLAMAAL ALUS

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Rail Balticu trassi arheoloogiliste eeluuringute raames kaevati Rapla lähistel Alu aleviku külje all viljapõllul, nõrgalt lainja moreenmaastiku kõrgemal künkal paiknevat kivihunnikut (jn 1). See oli muinsuskaitse alla võetud 1977. a kui I at algussajanditel rajatud ja hiljem põllukivide alla mattunud kivikalme (reg. nr. 12155). Kaevamisel selgus, et ülekaaluka osa hunnikust moodustasid põllu- ja mitte kalmekivid ning kuigi nende all peitus tõepoolest matmispaik, oli see varemarvatust oluliselt erinev.

Põllukivihunniku mõõtmed olid u 15 × 11 m. Koos umbes pool sajandit tagasi peale veetud kividega oli kivikatte paksus kuni 1 m, aga kuna selle all asetses madal künkake, tõusis kivihunnik ümbritsevast põllupinnast kuni 1,4 m kõrgemale. Kompaktne, tiheda mullaseosega kivistik koosnes nii pae- kui ka raudkividest (jn 2, 3). Suurem osa neist olid suhteliselt väikesed, kuid eriti hunniku otstes leidus ka märkimisväärselt suuri raudkive. Nende puhul oli sageli raske või isegi võimatu vahet teha, kas kivi oli paika pannud mandrijää, kalmeehitajad või kivikoristajad.

Leiud kivide vahel ja all paiknesid ilma märkimisväärse korrapärata, 20. saj materjal (ehituskeraamika killud, põllutöömasinate detailid, (pauk)padrunikestad, mürsukillud, jalatsitallad jmt) läbisegi märksa arhailisemate esemetega, millest osa seostub võib-olla matustega (savinõu-, kvartsi- ja tulekivikillud, pronks- ja raudesemed, tiiglikatked jmt – tabel 1). Sama kehtib loomaluude (tabel 2) paiknemise ja dateeringu kohta. Kivikoristuse alguse dateerimisel pole sellisest leiuainesest abi, eriti arvestades, et osa sellest on tõenäoliselt kivihunnikule veetud prügi. Vanimad kindlalt dateeritavad leiud on kedrakeraamiliste nõude killud, mis viitavad keskajale, kuid üldiselt ei saa nende järgi otsustada, millal esimesed põllukivid kohale toodi. See sündmus tuleb paigutada pikka ajavahemikku eelrooma rauaaegsete matuste ja 20. saj alguse vahel.

Enne põllukivide kuhjamist oli moreenikünkale maetud tõenäoliselt kaks inimest, kuid luustikud olid nii halvasti säilinud, et maetute arvus ei saa lõpuni kindel olla. Üks matus oli oletatavasti asetatud künka kaguosas paiknenud suurte kivirahnude kõrvale, võib-olla sinna kaevatud madalasse hauda (jn 4–6). Kive oli paigutatud ka arvatava haualohu peale ja/või ümber, kuid selle tõenäoliselt üsna väikese rajatise esialgse väljanägemise kohta on raske midagi kindlat öelda. Rajatise lõunaosa oli ilmselt täiesti lõhutud ning ka luufragmendid (mida oli kokku kõigest u 240 g) paiknesid kivide vahel korrapäratult laiali. Maetu oli täiskasvanu, kelle sugu ja täpsemat vanust ei saa määrata. Tema väheste säilinud hammaste kulumus osutab vanusevahemikule 35–45 a, kuid sellest on lõplikuks vanusemääranguks vähe.

Künka lääneossa maetu oli nähtavasti asetatud madalasse hauda: luud (u 135 g) olid üleni mulla sees ning vahetu kontakt kividega puudus. Kuid ka see haud tundus olevat paigutatud suurte raudkivide kõrvale või vahele, ehkki sellist piirdetaolist konstruktsiooni nagu kagu pool ei saanud täheldada (jn 4, 5, 7). Luude paiknemine viitas põhja–lõuna-suunalisele, peaga põhja orienteeritud matusele. Sugu ja täpsem vanus jäi ka selle täiskasvanu puhul määramata, ehkki üksikud võib-olla sellele indiviidile kuulunud hambad osutavad vanusevahemikule 25–35 a.

Ühtki esemeleidu nende matustega kindlalt seostada ei saa, kuigi mõni neist (eriti savinõukillud) võib kuuluda samasse aega. Luustikud dateeriti radiosüsiniku meetodil eelrooma rauaaega (tabel 3).

Eelrooma rauaaja matmiskombestiku varieeruvust arvestades ei ole sellised matused üllatavad, eriti kui võrrelda neid mitte varaste tarandkalmetega, vaid kangurkalmetega, matustega pronksiaegsetes kivikirstkalmetes ja ehk ka üksikute maahaudadega. Ammugi on mõistetav põllukivihunniku tekkimine sellise kivise künka ümber.