

DATA TO THE PALEOANTHROPOLOGY OF THE ENVIRONS OF NAGYBARACSKA

ANTÓNIA MARCSIK

Department of Anthropology, Attila József University, Szeged

(Received November 30th 1971)

Introduction

The archeologist of the István Türr Museum in Baja, MIHÁLY KÖHEGYI carried out a rescue excavation in the environs of Nagybaracska in the summer of 1970. The excavation was first begun in the sand-pit of the village, the area known as Öregszőlők (old vine-lands), lying in the northern part of the village. There was left over in that place only the western edge of the cemetery. The number of graves excavated is 14. According to the excavating archeologist, about 100—150 graves may still be in the earth. The excavation, owing to the scant grave furniture (silver coin, bronze ring, iron knife, silver ring), is not worth carrying on. Therefore the anthropological elaboration of finds has become necessary. The graves are of W—E orientation. The cemetery may be, on the basis of BÉLA I's coins, of Century XI.

A second area of the excavation was that known as Kisbaracska, in the vicinity of the village where the mediaeval cemetery round the church was uncovered. To be sure, at ranging over the area, also fragmentary potsherds were found from the Arpadian age. The settlement may have begun already in that age but it reached its real extent only in Centuries XIV—XVI. The result of the rescue excavation is: four graves.

Owing to woodfelling and cutting, there was a rescue excavation in the area known as Pizskula, as well, that lies at the edge of a high bank running parallel with the Danube. On the slope of the sandy hill the traces of a settlement from the prehistory (Iron Age) as well as the ditch of the mediaeval cemetery are visible. The site of the present excavation is identical with the mediaeval village Töttös. The result of the excavation is also four graves from one of which a silver coin of Century XIV could be found. (I wish to express my thanks in this way to MIHÁLY KÖHEGYI for having made available for me the archeological documentation.)

Materials and Methods

The anthropological material of the small series available for me is, on average, in a medium state of preservation I have performed the metrical and morphological analysis of finds according to MARTIN's method (1928) and the taxonomical one according to LIPTÁK (1962, 1965). At observing the pathological findings I have made use of BALÓ's work (1952), and at describing the anatomical variations I have used the work of BROTHWELL (1959).

Elaboration of the anthropological material

Nagybaracska — Öregszőlők (Century XI)

Grave 1 (6890): Juvenile female skeleton in a fragmentary state of preservation. The cranium is mesocranic (78,74), the forehead stenometopic; the cranium is ovoid in norma verticalis; glabella 1, fossa canina 2, spina nasalis anterior 2, alveolar prognathism 1.

Grave 2 (6891): Mature female skeleton with calvaria in a good state of preservation, fragmentary mandible and skeletal bones. The cranium is dolichocranic (73,63), chamaecranic, metriocranic and euencephalic with a pentagonoid contour; glabella 3, protuberantia occipitalis externa 3. Strong flatness at the lambda region with cone-shaped occiput. Most of the alveoli are absorbed. On the right and left: os epiptericum.

Grave 3 (6892): Cranium in a good state of preservation and skeleton in a medium state of preservation of a mature male. The cranium is dolichocranic (72,97), hypsocranic, acrocranic and euencephalic with an ovoid contour; glabella 4, protuberantia occipitalis externa 3; the forehead is eury-metopic; the face is hyperleptoprosopic and leptene; fossa canina 4, spina nasalis anterior 3, alveolar prognathism 2; the orbit is hypsiconch, the nose chamaerrhine, palate leptostaphylin. Sacralisation. Stature: 168 cm.

Taxon: protonordic (pn), (Plate I).

Grave 4 (6893): Skeleton of a child (Inf. II). The cranium is in a state of medium preservation.

Grave 5 (6894): Skeleton of a male (Ad.), in a good state of preservation. The cranium is mesocranic (78, 73), hypsocranic, metriocranic and euencephalic, with an ovoid contour; glabella 2, protuberantia occipitalis externa 2, the forehead is metriometopic. The face is mesoprosopic and euryene; fossa canina 2, alveolar prognathism 1. The orbit is hypsiconch, the nose is chamaerrhine, palate brachystaphylin. Incomplete sacralisation, in the cranium sutural bones in the lambda region. In the long bones: traces of arthropathy. Stature: 166 cm.

Taxon: Mediterranean-x (m-x).

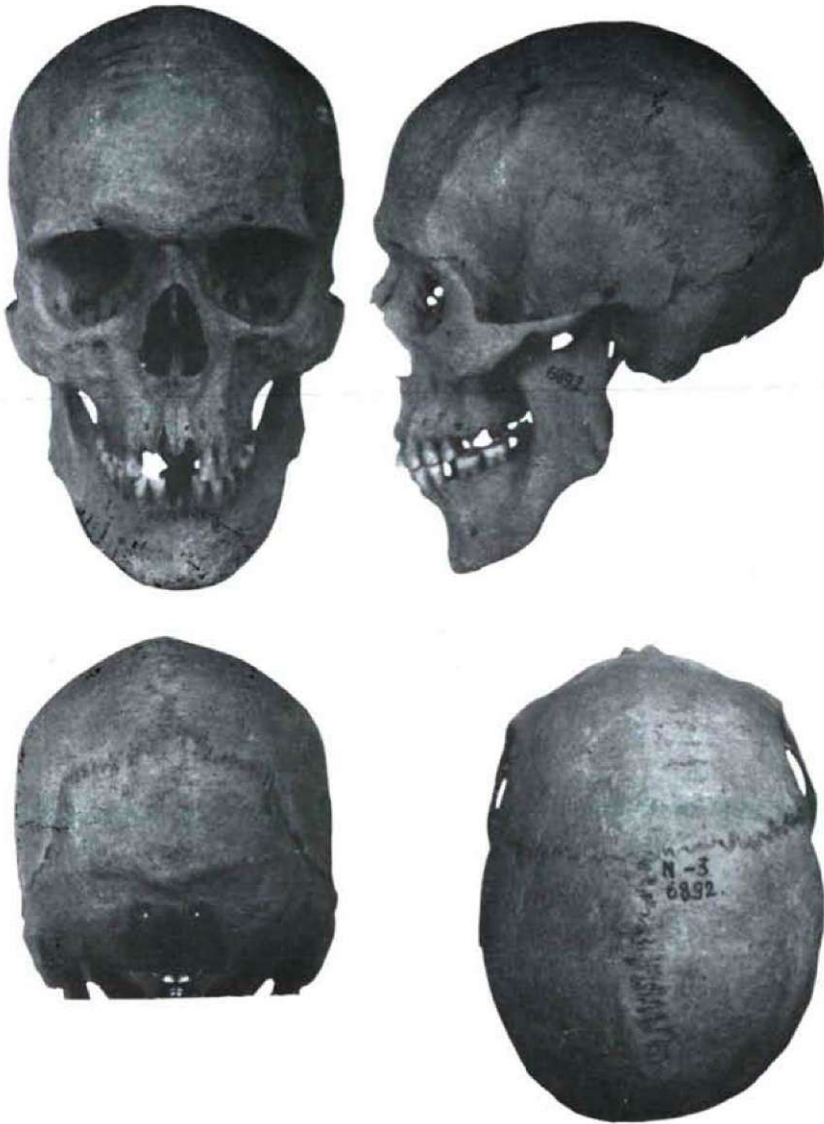
Grave 6 (6895): Skeleton of a mature male, in a good state of preservation. The cranium is brachyocranic (82,42), hypsocranic, metriocranic and aristencephalic, with a pentagonoid contour. Glabella 3, protuberantia occipitalis externa 3; the forehead is stenometopic. The face is euryene, fossa canina 2, alveolar prognathism 2, the orbit is mesoconch, the nose hyperchamaerrhine, palate brachystaphylin. The norma occipitalis is tentshaped, with extremely wide mandibular ramus. In the cranium: sutural bones. Stature: 165 cm.

Taxon: cromagonoid-B — x (crB-x).

Grave 7 (6896): Skeleton of a child (Inf. I), in a fragmentary state of preservation.

Grave 8 (6897): Skeleton of an adult male, in a good state of preservation. The cranium is brachyocranic (82,02), orthocranic, tapeinocranic and euencephalic, with an ovoid cranial contour; glabella 4, protuberantia occipitalis externa 2; the forehead is stenometopic. The face is hypereuryene, fossa canina 2, spina nasalis anterior 3, alveolar prognathism 2; orbit hypsiconch, nose leptorrhine. In the cranium: sutural bones in the lambda region. Stature: 170 cm.

Plate I: Grave 3 (6892) Nagybaracska—Öregszőlők Male, protonordic (pn)



Taxon: of cromagnoid character (crC-x).

Grave 9 (6898): Skeleton of a mature female, in a good state of preservation. The cranium is mesocranic (79,53), hypsicranic, acrocranic, with an ovoid contour. Glabella 2, protuberantia occipitalis externa 3. The forehead is eurymetopic. The face is mesoprosopic, mesene, fossa canina 2, alveolar prognathism 2. The orbit is chamaeconch, the nose chamaerhine, palate meso-

staphylin. On the right: os epiptericum. In the right and left humeri: perforatio fossae olecrani. Stature: 156 cm.

Taxon: Mediterranean-x (m-x). (Plate II)

Grave 10 (6899): Juvenile female skeleton. The skeletal bones are defective.

Grave 11 (6900): Fragmentary calvaria and skeleton of an adult male, the latter in a good state of preservation. Stature: 168 cm.

Grave 12 (6901): Skeleton of a juvenile female, in a good state of preservation without cranium.

Grave 13 (6902): Skeletal bones of an adult male, in a good state of preservation but without cranium. Stature: 169 cm.

Grave 14 (6903): Skeleton of a juvenile female, in a good state of preservation with mandible.

Nagybaracska — Kisbaracska (Centuries XIV—XVI)

Grave 1 (6887): Skeleton of an adult female, in a good state of preservation. The cranium is mesocranic (76,24), chamaecranic, tapeinocranic and euencephalic with a pentagonoid contour. Glabella 1, protuberantia occipitalis externa 2; the forehead is stenometopic. The face is leptoprosopic, leptene, fossa canina 4, alveolar prognathism 1; orbit hypsiconch, nose mesorrhine, palate leptostaphylin. In the cranium: sutural bones; on the right: os epiptericum. Sacrum bifidum. Stature: 155 cm.

Taxon: Mediterranean-x (m-x).

Grave 2 (6888): Skeleton of a mature male, in a good state of preservation. The cranium is brachycranic (80,00), hypsicranic, metriocranic with a pentagonoid contour. Glabella 3, protuberantia occipitalis externa 2. The forehead is metriometopic. The face is euryprosopic, mesene; fossa canina 2, alveolar prognathism 1. The orbit is mesoconch. The nose is mesorrhine, palate mesostaphylin. The norma occipitalis is tent-shaped. In the cranium: os epiptericum (on the right). Stature: 169 cm.

Taxon: of brachycranic character (br-x).

Grave 3 (6889): On the basis of the documentation of excavation it is the skeleton of a child.

Grave 4 (6890): Skeleton of an adult female, in a fragmentary state of preservation. The cranium is dolichocranic (74,03), with a minor lambdoid flatness.

Nagybaracska — Piszkula (Centuries XIV—XVI)

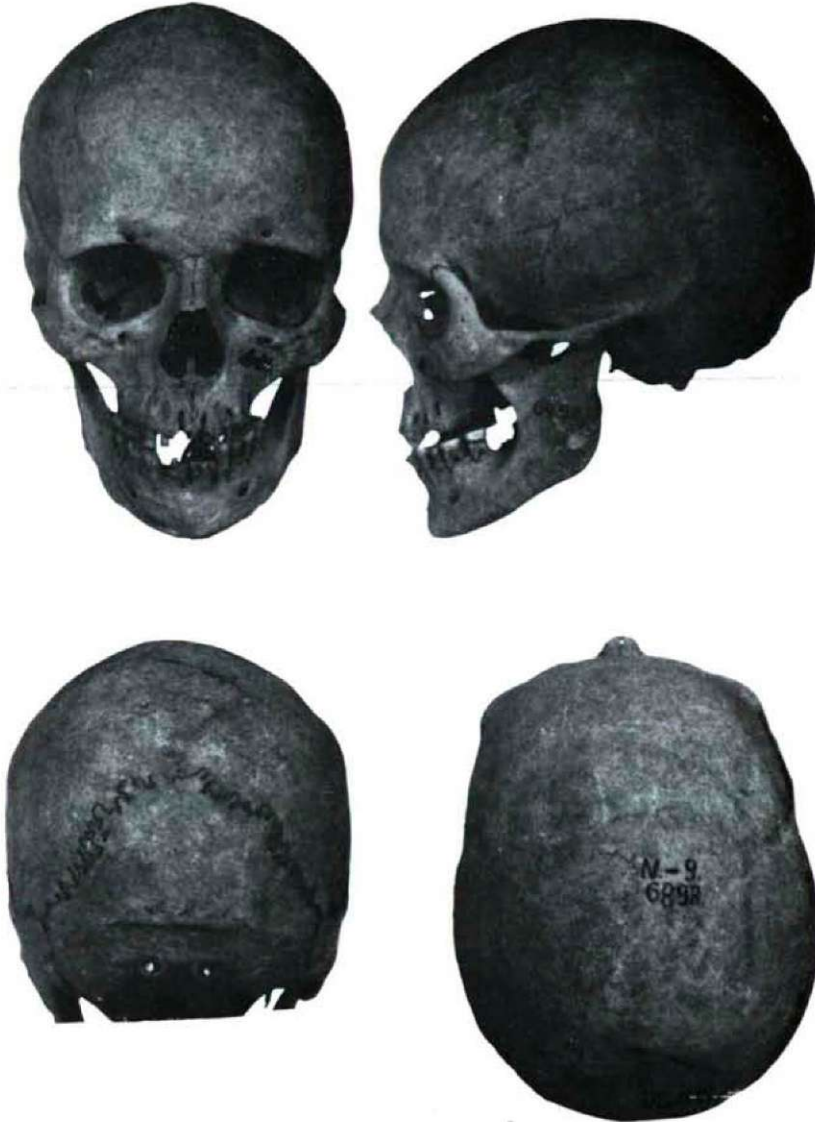
Grave 1 (6883): Cranium and skeleton of a juvenile female, both in a medium state of preservation. The cranium is strongly brachymorphic with planoccipitale. In the lambda region: sutural bones.

Grave 2 (6884): Fragmentary skeleton of a mature male, of strongly brachymorphic character. Alveoli partly absorbed. Strong massive mandible. Sacralisation. Stature: 169 cm.

Grave 3 (6885): Skeleton of a child (Inf. I), in a fragmentary state of preservation.

Grave 4 (6886): Skeleton of an infant (Inf. I), in a fragmentary state of preservation. Orbital osteoporosis.

Plate II: Grave 9 (6898) Nagybaracska—Öregszőlők Female, mediterranean —x (m—x)



In case of Nagybaracska—Öregszőlők Mediterranean as well as Cromagnoid elements can be found. Grave 3 is particularly important; owing to its size and morphological characteristics it is a classical representative of the Protonordic (pn) race inside the Nordic group in LIPTÁK's taxonomical system (LIPTÁK, 1965.) The characteristic features of the gracile Mediterranean taxon manifest themselves in cases of a male and a female. The Cromagnoid elements (crB-crC-x) occur, mixed with other taxons, in cases of 2 males.

In the finds at Nagybaracska—Kisbaracska, apart from the Mediterranean element, the brachycranial taxon appears, as well, while in case of Nagybaracska—Piszkula, the exclusive number of the brachycranial finds is striking.

Pathological deformations

From among the deformations that can be perceived morphologically well, first of all the arthrosis deformans and spondylosis (spondylitis deformans) are to be mentioned. Both of them are the non-contagious diseases of joints and of the vertebral spine, following the destruction of an articular cartilage, respective of the intervertebral fibrocartilage. Over the years, various pathologic metabolic products, endocrine disturbances may have participated in inducing the disease.

The arthrosis deformans manifests itself in one or more joints. The bone ends of the joints become denuded. At the border of the articular cartilage tuberosities are caused by the cartilage — and bone — formation.

The spondylitis deformans or spondylosis is a disease of the intervertebral disks. The vertebral body becomes flat. Between the vertebrae synostoses are formed.

The arthrosis deformans can be observed in monoarticular form in the skeleton of a male of grave number 6894/5, in the articulation of the left humerus.

Spondylosis may be noticed in the vertebrae cervicales of a skeleton of grave number 6895/6 and in all the vertebrae of a male of grave number 6884/2.

Spondyarthrosis (a non-inflammatory disease of the intervertebral joints) appears in the cervical vertebrae of males of grave numbers 6895/6 and 6884/2.

In the long bones of the male of grave number 6884/2 smaller and larger exostosis can be seen. In one case I have noticed the trace of fracture, in the diaphysis of the left humerus (grave 6884/2), and in another case the ankylosis of the sternum and first rib (grave 6884/2.)

Among the anatomic variations, in a child grave (No. 6886/4), there was remarkable the orbital osteoporosis, i.e. the osteoporosis of orbit, a rather rare phenomenon with an unknown aetiology. It may have developed as a result of environmental causes, of an increased pressure. At any rate, it is more frequent in young age.

Evaluation of the results and their connection with other series

The anthropological picture of the population of the Southern Hungarian Plain in the Arpadian age is characterized by FARKAS—LIPTÁK (1968) on the basis of three series of high number, published separately by both authors beforehand (Orosháza-Rákóczi-telep, LIPTÁK—FARKAS, 1962a; Szatymaz-Vasútállomás, LIPTÁK—FARKAS, 1967; Békés-Povádzug, LIPTÁK—FARKAS, 1967a). They characterize it as follows. The preponderance of the of the Nordic ones is running to 37 per cent of the material investigated, followed by the Medi-

terranean group with 35 per cent. The participation of Cromagnoids is approximately 15 per cent in the series investigated. The rest is formed by the Europid and brachycranial elements that can be defined more exactly only with some difficulty. I have obtained similar results after analysing the population of Kardoskút—Fehértó in the Arpadian age, as well (MARCSIK, 1970). The population at the highway Kiskunfélegyháza—Alpár in Century XII, that originated from the territory between the Danube and Tisza, (LIPTÁK, 1954) is showing some conformity with the populations of the Southern Plain, mentioned above, containing however in case of females a higher percentage of brachycranial elements, too. The population of Baja—Pető of Centuries XI—XVI (LOTTERHOF, 1968) — i.e., of a latertimes — is differing in some degree from the population of the Southern Plain and of the territory between the Danube and Tisza known by us so far. The dominant component is the Mediterranean element coming to 43,4 per cent of the crania suitable to be analysed taxonomically. It is followed by the brachycranial group (19 p. c.). The Nordoid and Cromagnoid groups are in the third place with equal percentage.

In the poorly populated cemetery at Csongrád-Vendelhalom in Centuries X—XI (LIPTÁK, 1957) Nordoid, brachycranial, Mediterranean and Turanian component can be demonstrated.

In the Csátalja (LIPTÁK, 1957), lying geographically close to Nagybaracska, the Nordoid, Mediterranean, Cromagnoid-B and Cromagnoid-A elements are considerable.

The results of a taxonomical analysis of some series in the Arpadian age are demonstrated in Table 1, showing besides the facts mentioned above, that the population of Baja—Pető are the most similar to the material of Kérszusza beyond the Danube. This question is made more difficult, of course, because in case of Baja—Pető — failing an archeological publication — the Mediaeval graves and those from the Arpadian age could not be separated. It cannot be decided unequivocally, therefore, whether the brachycranial elements that are present in a large enough number are connected with the mediaeval graves of Baja—Pető or, in the same way as in Kérszusza, they are representing a component from the Arpadian age.

As to the finds at Nagybaracska—Öregszőlők from Century XI, it can only be ascertained on the basis of a taxonomical analysis — in a way similar to the smaller series at Csátalja — that we have to reckon with the presence of Mediterranean and Cromagnoid elements that are so characteristic of the populations in the Southern Plain in the Arpadian age.

In case of the mediaeval finds at Nagybaracska—Kisbaracska and Nagybaracska—Piszkula there are present mostly brachycranial elements. Similar brachycranial elements can be found also in the anthropological picture of the cemeteries at Téglás—Angolkert (LIPTÁK—MARCSIK, 1966) from Centuries XI—XIV and Röske—Kószó farm (LOTTERHOF, in press) from Centuries XIV—XV.

The finds the vicinity of Nagybaracska are not suitable for drawing far-reaching conclusions. This short paper would like, therefore, only to contribute, by publishing these more recent data, to the elucidation of some details of the population changes in the territory between the Danube and Tisza in the Centuries X to XIII, respective XIV to XVI.

Table 1. Comparison of some series in the Arpadian Age and in the Middle Ages

Provenience of excavation	Author	Cranial index		Taxons
Highway Kiskunfélegyháza— Alpár, Cent. 12—13.	LIPTÁK, 1954	Male : 12 Female : 17	74,6 76,9	Nordic, Cromagnoid—A, Mediterranean, cromagnoid—B
Kérsusza, Century 11.	LIPTÁK, 1953	Male : 83 Female : 74	78,0 78,3	Mediterranean, brachycranial elements, Cromagnoid—B, Nordic
Orosháza—Rákóczi telep, Cent. 10—12.	LIPTÁK— FARKAS, 1962	Male : 81 Female : 69	74,3 75,8	Nordic, Mediterranean, Cromagnoid—A, cr—B, brachycranial elements
Szatymaz—Railway station, Cent. 10—12.	LIPTÁK— FARKAS, 1967	Male : 77 Female : 47	75,4 75,5	Mediterranean, Nordic, cr—A, brachycranial elements
Baja—Pető, Cent. 11—16.	LOTTERHOF, 1968	Male : 40 Female : 22	76,5 77,5	Mediterranean, Brachycranial elements, Nordic, cr—A, cr—B
Kardoskút—Fehértó, Cent. 11—12.	MARCSIK, 1970	Male : 100 Female : 79	74,4 75,3	Nordic, Mediterranean, cr—A, cr—B
Békés—Povádzug, Cent. 10—12.	LIPTÁK— FARKAS, 1967	Male : 25 Female : 29	74,8 76,8	Mediterranean, Nordic, cr—A, C, brachycranial elements
Csátalja, Cent. 11.	LIPTÁK, 1957	Male : 18 Female : 32	76,5 76,7	Nordic, Mediterranean, cr—B, cr—A, brachycranial elements
Csongrád—Vendelhalom, Cent. 10—11.	LIPTÁK, 1957	—	—	Nordic, brachycranial elements Mediterranean, Turanian (N = 5)
Nagybaracska—Öregszőlők, Cent. 11.	MARCSIK, —	—	—	Mediterranean, Cromagnoid elements (N = 5)

References

- BALÓ, J. (1952): Kórbonctan II. — Egészségügyi Kiadó, Budapest.
- BROTHWELL, D. R. (1959): The use of non-metrical characters of the skull in differentiating populations. — *Homo* (Supplement), 103—109.
- FARKAS, GY.—LIPTÁK, P. (1968): Über die Anthropologie der Bevölkerung des südlichen Teils der Ungarischen Tiefebene in der Arpadenzeit. — *A Móra Ferenc Múzeum Évkönyve* 1966—67. 2, 135—141.
- LIPTÁK, P. (1953): L'analyse typologique de la population de Képuszta au Moyen âge. In: NEMESKÉRI, J.—LIPTÁK, P.—SZÓKE, B.: Le cimetière du XI^e siècle de Képuszta. — *Acta Arch. Hung.* 3, 303—370.
- LIPTÁK, P. (1954): A típusok eloszlása Kiskunfélegyháza környékének XII. századi népességében. (Répartition des types anthropologiques de la population des environs de Kiskunfélegyháza du XII^e siècle). — *Biol. Közlem.* 1, 105—121.
- LIPTÁK, P. (1957): Awaren und Magyaren in Donau—Theiss Zwischenstromgebiet (Zur Anthropologie des VII.—XIII. Jahrhunderts). — *Acta Arch.* 8, 199—268.
- LIPTÁK, P. (1962): *Homo sapiens* — species collectiva. — *Anthr. Közlem.* 6, 17—27.
- LIPTÁK, P.—FARKAS, GY. (1962a): Anthropological analysis of the Arpadian Age population of Orosháza—Rákóczi telep. — *Acta Biol. Szeged*, 8, 221—236.
- LIPTÁK, P. (1965): On the taxonomic method in paleoanthropology (historical anthropology). — *Acta Biol. Szeged.* 11, 169—183.
- LIPTÁK, P.—MARCSIK, A. (1966): A Téglás-Angolkerti középkori (XI—XIV. századi) temető embertani anyagának ismertetése (Das anthropologische Material des Gräberfeldes Téglás-Angolkert vom Mittelalter) aus dem XI—XIV. Jahrhundert). — *A Déri Múzeum Évkönyve* 1965. 69—96.
- LIPTÁK, P.—FARKAS, GY. (1967): Anthropological examination of the Arpadian Age population of Szatymaz (10th to 12th centuries). — *Acta Biol. Szeged.* 13, 71—119.
- LIPTÁK, P.—FARKAS, GY. (1967a): A Békés—Povádzugi őskori és 10—12. századi temető csontvázmaradványainak embertani vizsgálata. (Anthropologische Untersuchung an den aus Urzeit und aus dem 10—11. Jahrhundert Skelettmaterialien des Gräberfeldes Békés—Povádzugi.) — *Anthr. Közlem.* 11, 127—163.
- LOTTERHOF, E. (1968): Anthropological investigation of the skeletal material of a cemetery at Baja—Pető from the XI—XVIth centuries. — *Acta Biol. Szeged.* 14, 81—88.
- LOTTERHOF, E. (in press): Anthropological investigation of the skeletal material from the cemetery at Rőszke—Kószó farm from the 14—15th centuries. — *Acta Biol. Szeged.* 17.
- MARCSIK, A. (1970): Anthropological investigation of the cemetery at Kardoskút—Fehértó from the 11th—12th c. — *Acta Biol. Szeged.* 16, 155—162.
- MARTIN, R. (1928): *Lehrbuch der Anthropologie.* 2. Aufl. — Jena.

Address of the author:
Dr. ANTÓNIA MARCSIK
Department of Anthropology,
A. J. University, 6701 Szeged,
Hungary