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MOVEMENT OR STABILIZATION? THE UPPER SAN RIVER BASIN IN THE SECOND HALF OF THE 1ST MILLENNIUM BC

Abstract: The ‘Celtic episode’ of the prehistoric Sanok region should be associated with a group of colonists from the south who, during phase LT C, used the local brine springs to produce salt and supply it to the population of the Upper Tisa River basin. For now, no finds definitely associated with phases LT B or LT D have been discovered in the region. The settlers probably relied on both agriculture and animal husbandry to sustain their communities. It seems unlikely they were able to produce any food surpluses, considering the unfavourable climate and poor soil conditions. When the expansion of Dacian tribes to the south of the Carpathians began to cause shifts in the political landscape and the trade routes’ network, the San River Valley cultural centre lost its economic significance and entered a period of decline. Presumably, some of the population may have migrated north into the more fertile lands, while others might have returned to the areas of their origin. According to the available data, there seems to be no clear continuity between the La Tène occupation and the oldest Przeworsk culture finds dated to the end of the early pre-Roman period.

Keywords: La Tène culture, celtic culture, middle La Tène, San basin, brine springs

I. INTRODUCTION

During the Iron Age, the drainage basin of the river San became the arena of important cultural change. Criss-crossed by important communication routes, the area was subject to various cultural influences pouring in from the south, south-east, east and the north. The development of local settlements in the area was – just like anywhere else – dependent on factors such as the physical geography of the region, its climate and the properties of local soils. Here, the Carpathians acted not as a natural border but rather as a buffer zone between the drainage basins of the river Tisa in the south and the San in the north. However, the area



was far from impenetrable – concentrations of finds associated with neighbouring lands have been found in abundance along the old communication routes crossing the region.

Today, the Sanok region enjoys a warm-summer humid continental climate with relatively high precipitation throughout the year – type Dfb according to the Köppen-Geiger classification. The average annual temperature is measured at 6.8°C and the average annual rainfall is 685 mm. The time frame this article will discuss belongs primarily to the Sub-Atlantic Climatic Interval of the Holocene, which was both colder and more humid than the Holocene climatic optimum – the Atlantic period. Nevertheless, some climatic variations have been observed within the Sub-Atlantic. Even though the final centuries BC are generally considered more temperate than the 1st millennium AD (Marks 2016, 60, 61), no indications of favourable agricultural conditions have been observed in the Upper San Valley at the time, especially in the absence of advanced agricultural engineering. Crucially, the northern slopes of the Carpathians are considerably less arable than the southern areas of the mountain range, due to much lower solar exposure. In the north, the winters are longer and the snow thaws later in the year. Temperatures also tend to rise above 0°C about ten days later than in the south. Such conditions affect all vegetation, delaying its development by one to two weeks, which impacts the crop yields (Tunia 2004, 338). Additionally, the high volume of rainfall reduces calcium levels in the soil, increasing its acidity (Tunia 2004, 335), making traditional agriculture less efficient.

For all of the above reasons, the prehistoric population within the Upper San River basin was not particularly dense. Despite the importance of the region and the evident movement of people along the communication routes, it likely remained only loosely settled throughout human prehistory. Early Iron Age artefacts are not very common. Within this context, some scholars distinguish the so called ‘Niepla type’ finds, comprising artefacts and features similar to those identified with the Tarnobrzeg Lusatian culture (=Tarnobrzeg group of Lusatian culture), found in association with other ‘Carpathian-type elements’ (Czopek, Poradyło 2008, 181, 183, 184, Ryc. 129; Czopek 2011, 327, 328, 339; Kotowicz P., Glinianowicz M., 2010). According to K. Dziągiewski, the ‘Niepla-type’ distinction, alongside other site types proposed in regions to the west (‘Zabrzeż-Podegrodzie type’, ‘Gorzyce type’), suggests a high level of isolation of local Carpathian and (Polish) Subcarpathian communities in the early Iron Age (Madyda-Legutko 1995; Dziągiewski, Godlewski 2009, 218, 219, Fig. 9; Dziągiewski 2010, 228, 229). Naturally, some degree of cultural diffusion is to be expected in all borderland regions, where individual elements of external cultures are often adapted for local use. Evidence of precisely such exchange can be found in the San River Valley, which served as a route around steep and heavily forested mountain ranges.

The iron tools hoard discovered in Międzybrodzie¹, Sanok County proves to be one of the most interesting finds dated back to the early Iron Age. The hoard comprised five iron sickles, two knives and a Szentes-Vekerzug type horse bit (<https://histmag.org/pod-sanokiem-odkryto-kolejny-skarb-13314>, 03.03.2018). The bit was used to date the find to late 4th – early 5th century BC (Werner 1988, 24-30; Taf. 3-12). The burial complex of Zabłotce, Jarosław County, may also be interpreted in this context. The site is located in the San River basin, several kilometres north of the area described in this article. Excavations in Zabłotce revealed an inhumation of a female, dated between the second half of the 6th and the first half of the 5th century BC. The grave goods recorded at the site were characteristic of the regions of Transylvania and the lower Danube. Interestingly, no traits typically associated with the Tarnobrzeg Lusatian culture were observed at the site. So far, the Zabłotce burial is the only one of its kind recorded in the area. Both the grave goods assemblage and the urnless cremation suggest that the deceased woman had come from a different cultural background. This could further corroborate the existence of a communication route in the Upper San River Valley (Bajda-Wesołowska et al. 2014, 121, 122).

The progression from Hallstatt to La Tène culture is not directly inferable from the modest assemblages recorded along the course of the river San. It remains highly unlikely that the *Marzabotto* type fibula recorded in Przemyśl should be viewed as evidence of La Tène migrations north of the Carpathians in the late LT A period or perhaps at the beginning of LT B² (Żaki 1955, 803, Fig. 367; Woźniak 1970, 151, 152, Table XLX:1; 2004, 45, 47). Similarly, it remains uncertain whether the ornament was brought to Przemyśl over the Carpathians, directly from the south, or rather from the west, where it could have been acquired from the inhabitants of Lesser Poland. Nevertheless, it is believed that the find marks the very beginning of more frequent contacts between local Tarnobrzeg Lusatian or Pomeranian culture settlements with the La Tène culture³. This relationship is further attested by later Duchcov-like type fibulae from the LT B period (Woźniak 2010, 77, 79; Czopek 2013, 236, 249).

Significant cultural change did not occur until the onset of the LT C period, when the La Tène cultural material first appeared within the Upper San River

¹ Międzybrodzie lies at the narrowing of the San Valley, near the foothills of the Slonne Mountains [Góry Slonne; lit. Salt (brine) Mountains]). The 'Międzybrodzie' toponym, attested since the Middle Ages, suggests that the site was located on an important communication route. In Polish, the name literally means 'a place between river fords' (Fastnacht, 1990, 26).

² T. Gralak however seems to disagree. His publication features a map illustrating the distribution of LT B fibulae on which the reach of the La Tène culture visibly extends over the San drainage basin (Gralak 2007, 319, Fig. 319).

³ Perhaps the glass ring fragment recorded at the Tarnobrzeg Lusatian culture burial site in Przędzel (Nisko County) should be interpreted in the same context. Nevertheless, it remains unclear whether the artefact should be classed as late Hallstatt rather than early La Tène (Karwowski 2007, 139).

drainage basin⁴. These important finds confirm the presence of Celtic settlements in south-eastern Poland (Parczewski, 1978; 1988; 1996, 265, Figs 8:1-5; 1999, 345; 2000, 274, Figs 6:7; 8:2, 3; Woźniak 1992, 16; Parczewski, Pohorska-Kleja 1995, 66; Figs 10:1-6; Madyda-Legutko 1996, 36-41; 2004, 70, 71; Ginalski, Muzyczuk 1999; Czopek 2002, 13-18, Fig. 1; Karwowski 2004; 2007; 2008; 2012; Przybyła 2004). This is the fourth, latest and most recently discovered La Tène colonisation area⁵ in present Poland. Notably, older literature often emphasises that Celtic settlements on Polish territory are commonly found in areas enjoying a more favourable climate and with the best soils – chernozems or dark brown loess (Woźniak 1970, 196-205, 209, 210). The hypothesis does hold for La Tène culture centres identified previously. Indeed, in the west of Lesser Poland, in Lower Silesia and on the Głubczyce Plateau, the La Tène settlements are located in areas with most fertile soils and favourable climate (Poleska 2006, 10). The above settlement complexes also became important stops on crucial north-bound long-distance communication routes. What is more, Z. Woźniak's remarks remain relevant in the context of other known Polish territories with attested strong Celtic influence (through the intermediary of other peoples influenced by the 'Celtic World'). For instance, assemblages from the regions of Kuyavia and Kalisz include local coins modelled after La Tène pieces (Rudnicki, Milek, Ziabka, Kędzierski 2009; Kontny, Rudnicki 2016, 310). As expected, here too, the climate is temperate and the soil quality is high. The areas also lie on north-bound communication routes.

The La Tène settlements in the Upper San River drainage basin do not follow this pattern. The climate of the region is much harsher and the soils less fertile⁶. Compared to northern territories of Slovakia, where the mountainous regions were dominated by Púchov culture settlements, the northern slopes of the Carpathians offer much less solar exposure, making the region less suited for agriculture and animal husbandry. And yet, evidence of La Tène settlements are only found in the zone of less favourable climate, only sporadically extending into the more temperate and fertile lowlands! Granted, Z. Woźniak, did once entertain the idea that the Celtic settlement may have expanded onto the foothills between

⁴ At times, the area of Celtic settlement in the Upper San Valley is referred to as an 'enclave' (Karwowski 2007, 128, 136, 138, 139). However, the term is not entirely accurate. An 'enclave' suggests a community (or cultural phenomenon) completely separated from its place of origin by other groups (or cultures). So far, no evidence has been found to suggest that the San Valley settlements were separated from the population inhabiting the lands near the Tisa River by any other cultures.

⁵ Scholars agree on the allochthonous character of the La Tène sites recorded in Poland. Naturally, phenomena such as acculturation and adaptation of the La Tène cultural paradigms by the local population should also be taken into account. However, in each case we are dealing with a group of migrants from the south, who established the first La Tène settlements in the area.

⁶ A. Kokowski disagrees, claiming that the area abounds in rich soils and enjoys a favourable water regime and optimal climate (Kokowski 2004, 35-36).

the rivers San and Wisłoka. However, nearly 15 years ago, when the AZP⁷ project had been completed in the former Przemyśl and Rzeszów Voivodeships, he concluded that despite all their efforts, the researchers had been unable to find more La Tène assemblages in the areas bordering the known La Tène settlements. On the contrary, much more La Tène material was recorded in the Upper and Middle San River Valley⁸ (Woźniak 2004, 43, 49-50). Nevertheless, our knowledge of the settlements in the region remains fragmentary. The topography and heavy forestation of the foothills near the town of Sanok resulted in less successful surface surveys than those conducted on frequently ploughed lowland fields. For this reason, La Tène sites in the San River Valley remain largely unexplored, especially when compared with the settlement complexes recorded elsewhere. Likewise, very little can be inferred about the Iron Age economy of the region. Considering the unfavourable climatic conditions, it seems plausible that animal husbandry would have been more important than agriculture. Similarly, ethnographic studies indicate that, just as in other mountainous regions, transhumance would have been the primary model of environment exploitation: the herds would have been moved from the summer pastures located higher to the lower ground for the winter (e.g. to the river valleys). At the same time, the settlements would have been permanent dwelling places with some of the inhabitants being in charge of agriculture. Notably, La Tène settlements are typically found in areas with active brine springs.

In a recent publication, R. Madyda-Legutko and J. Rodzińska-Nowak formulated a list of research postulates pertaining to the investigation of the Roman Period San River Valley. The chronology of the Celtic settlement in the region and the possible acculturation of the settlers also feature among their propositions (Madyda-Legutko, Rodzińska-Nowak 2017, 439). This article is not intended as a comprehensive synthesis of previous research on the issue of Celtic colonization in south-eastern Poland. Nevertheless, we will do our best to present the current state of our knowledge of the chronology and geographical distribution of this cultural phenomenon. I will also propose an explanation of the dynamic cultural changes which affected the San River Valley settlements in the final centuries of the 1st millennium BC.

⁷ AZP – Archeologiczne Zdjęcie Polski (Polish Archaeological Record) – country wide Polish field-walking surveys project, ongoing since the 70's (20th c.). The AZP initiative aims to identify and catalogue Polish archaeological sites.

⁸ Let us remember that even towards the end of the 20th century, the very existence of Celtic culture centres in south-eastern Poland was still being disputed in the scientific community (Czopek, Kokowski [eds.] 1999, 347). In his work published in 2001, A. Kokowski seems to doubt that the settlements should be associated with the La Tène culture, but rather links the pottery assemblages with the Tarnobrzeg group of Lusatian culture (Kokowski 2001, 112-113). However, his propositions were later addressed by S. Czopek (Czopek 2002; Woźniak 2004, 50).

II. GEOGRAPHICAL REACH OF LA TÈNE CULTURE IN SOUTH-EASTERN POLAND

Geographically, the La Tène cultural material is concentrated in the Upper and Middle San River Valley. However the distribution of La Tène finds has been shown to extend as far as the river Wisłoka in its upper course (to the west) and to the river Wisłok in its lower course (north). Regrettably, the eastern reaches of the distribution area have not been thoroughly studied to date. Surface pottery finds have also been recorded on the right banks of the lower course of the river Wiar, suggesting that the La Tène influences could have possibly reached further to the Upper Dniester River (Woźniak 2004, 50; Karwowski 2007, 129, 138). Apart from the Sanok region, evidence of the La Tène settlement has also been recorded in the Dynów Foothills, where the climate and agricultural conditions are somewhat better, but still not as favourable as the loess in the Rzeszów Foothills. However, as W. Blajer and M.S. Przybyła have stressed, the AZP initiative research project revealed much fewer large prehistoric pottery-rich sites in the area, compared to the Rzeszów Foothills region. Curiously, sites containing La Tène cultural material are not particularly abundant in the Carpathian foothills near Rzeszów (stray finds reported in Boguchwała, Rzeszów, Albigowa). Furthermore, their volume did not increase despite several thorough surface surveys conducted in the area, prior to the construction of the A4 motorway. At the same time, the terrain of the Rzeszów Foothills, with their rich brown and chernozem soils, is both more fertile and accessible to researchers than the Upper San drainage basin. It seems interesting that despite all these advantages, the La Tène materials are less abundant here than in regions further down south. The northernmost reach of the La Tène culture appears to roughly correspond with the southern limits of known Pomeranian culture settlement. There also appears to be a correlation between the distribution of Celtic cultural material and the reach of the earlier micro regions associated with the Tarnobrzeg Lusatian culture (Woźniak 2004, 51; Blajer, Przybyła 2008, 59, 98). Such observations seem particularly concerning, given how difficult it has been to determine the chronology of the early Iron Age settlement in Polish Subcarpathia.

Finds associated with the La Tène culture have been recorded at about 40⁹ sites, however, not all of them have been excavated (Fig. 1). A great proportion of the assemblage was discovered accidentally and with no clear context, while

⁹ The list does not include Geto-Dacian coinage formerly classed as Celtic. While some of the coin pieces may have travelled to the territories of Poland with Celto-Dacian migrants, other coin finds have been linked with the Poienești-Lucașeuca culture. Moreover, the geographic distribution of the coins is much wider than the reach of the La Tène material discovered in south-east Poland. Nevertheless, it seems likely this was where the coins first appeared before later finding their way into the Vistula drainage basin. Greek coinage has been excluded for the same reason.

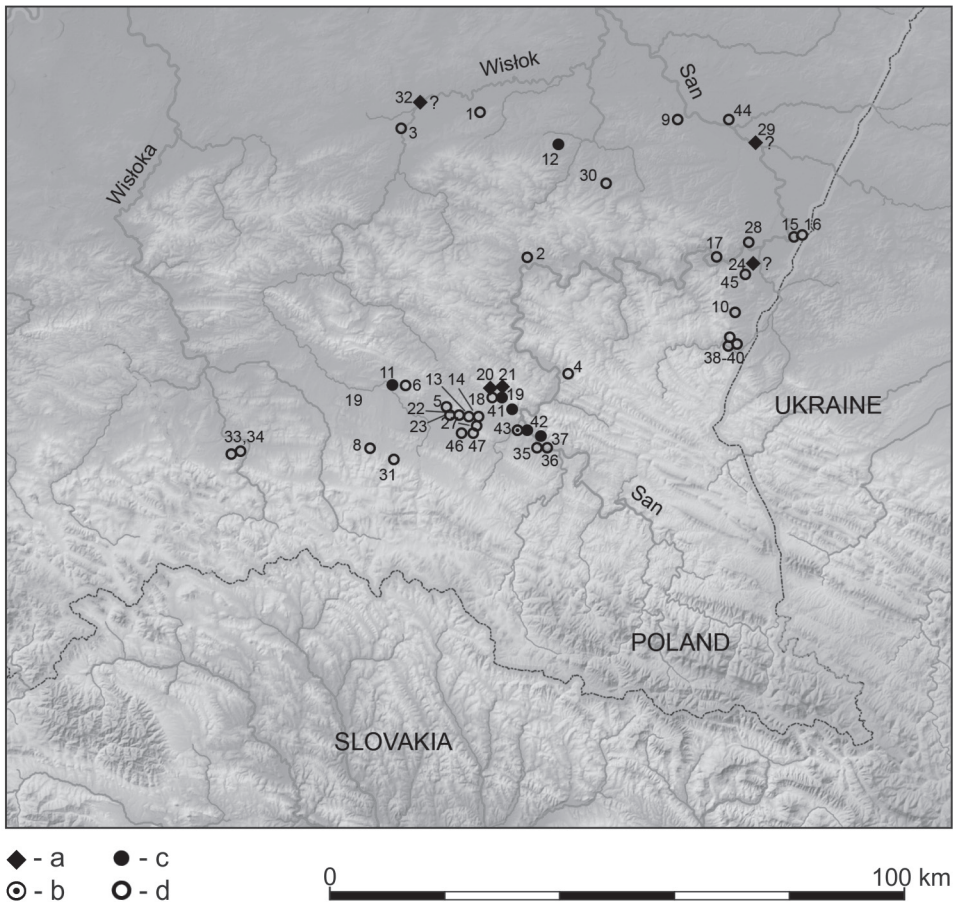


Fig. 1. La Tène culture in south-eastern Poland. Types of finds;
 a – sacrificial finds, b – celtic coin, c – sites of La Tène culture settlements, d – loose or
 isolated pottery finds, material recorded during the AZP action

some of the material was recorded as stray artefacts at sites associated with other cultures. Of the abundant surface finds, only a modest pottery assemblage may be interpreted as La Tène and there is no consensus as to its precise dating. According to Z. Woźniak, placing some of the potsherds within the La Tène chronology is questionable at best (Woźniak 2004, 50). So far, six or seven settlements have been discovered in the Upper San River drainage basin (Bachórz - site 16, Krosno - site 1, Pakosówka - site 32, Trepcza, Sanok-Biała Góra - site 3 (Parczewski 1988, 45), Srogów Górny - site 2, perhaps also Medyka - site 62). Furthermore, it seems plausible that one of the occupation phases of the 'Horodyszczce' hill-fort at

Trepcza might be associated with the La Tène culture since some isolated Celtic finds have been recorded at the site. The assemblage also includes the hoards of metal artefacts discovered at Pakoszówka (there is no agreement on whether each of the hoards should be given a separate site number) as well as two possibly sacrificial sites on the rivers Wisłok (in Rzeszów) and San (in Radymno). Celtic coinage has been recorded at other locations (Trepcza and Pikulice¹⁰). The finds from the research excavations in Lipnik and Medyka confirmed a late Celto-Dacian cultural horizon in the area. Curiously, the Celto-Dacian assemblages occur at sites with no evidence of earlier Celtic phases. Undoubtedly, it would be wrong to indiscriminately base our assessment of the La Tène reach in south-eastern Poland on the recorded distribution of isolated finds associated with this culture. After all, some of the artefacts from the San River basin, such as the *Marzabotto* fibula from Przemyśl mentioned earlier, are clearly identifiable as imports into an otherwise local context. As for the surface finds, as well as other finds with no context, it is impossible to distinguish imports from objects with clear associations with the local cultural context of the site or feature where they were recorded. Likewise, associating features with cultures proves just as problematic. When a La Tène pottery fragment is recorded in a pit located at a site associated with multiple archaeological cultures (and the potsherd was the only find recovered from the pit), is it safe to assume that the pit should be classed as La Tène? Furthermore, should the site be listed as Celtic in the reference catalogues? It seems interesting that similar questions arise when the distribution of the sites associated with the Tyniec group is compared with the distribution of known La Tène pottery finds (Kubicha 1997, 299-312, Figs 3-6).

III. LA TÈNE CULTURE CHRONOLOGY IN SOUTH-EASTERN POLAND

Within the La Tène assemblage from the south-east of Poland, the following subgroup of finds may be distinguished and used as chronological indicators (Fig. 2). The glass bracelet fragments from Albigowa, Sanok-Biała Góra, Bachórz and Trepcza can be dated to the beginning of phase LT C (with the artefact from Trepcza representing the oldest horizon). By contrast, the fragment of a glass face-bead recorded in Pakoszówka and an iron fibula from the same site seem to represent the later tiers of phase LT C. Likewise, a sword sheathed in an iron scabbard (originally with an ornament depicting a pair of dragons) recovered

¹⁰ An accidental, unexpected and unique Polish find comprising six Celtic coins. The discovery was so unusual, it was mentioned in the Polish press (<https://rzeszow.tvp.pl/26029940/odkryty-skarb-szesc-celtyckich-monet-moga-miec-az-2-tysiace-lat>; 23.03.2018 <http://rzeszow.wyborcza.pl/rzeszow/1,34962,20364230,niezwykle-znalezisko-pod-przemyslem-monety-moga-miec-2-tysiace.html>) 23.03.2018.

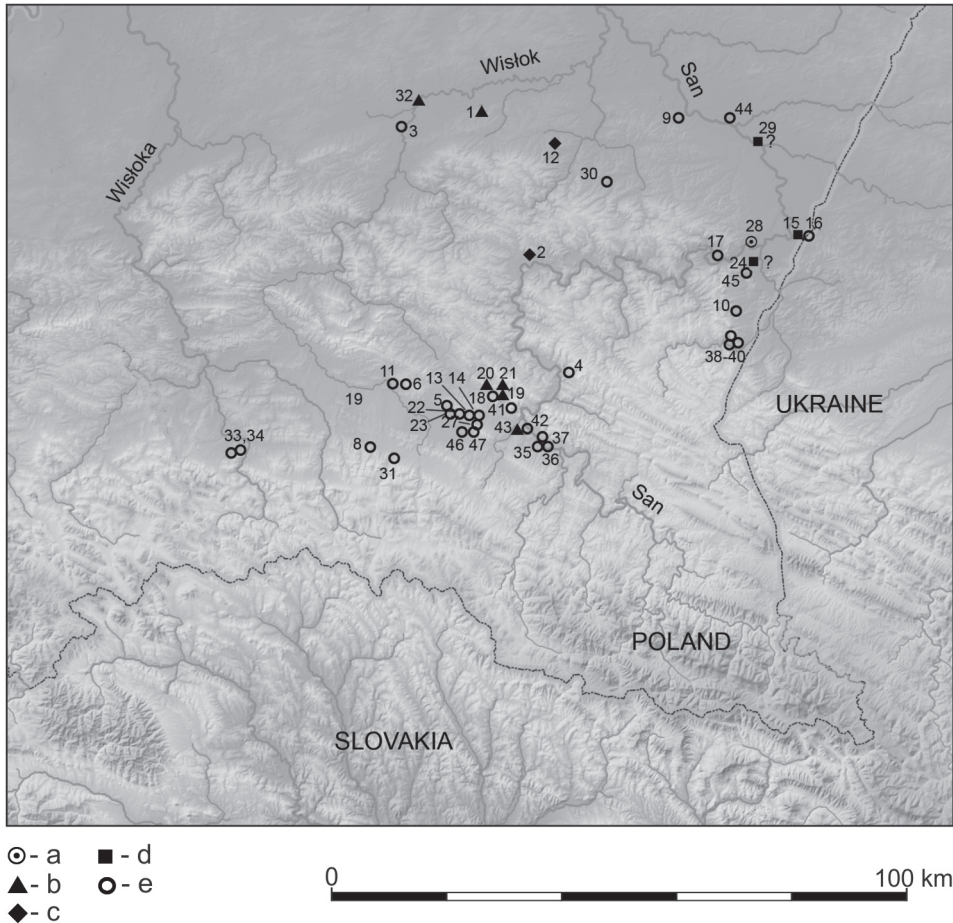


Fig. 2. La Tène culture in south-eastern Poland. Chronology; a – LT A, b – LT C, c – LT C and LT D, d – LT D, e – finds broadly dated as LT

from the river Wisłok in Rzeszów can be used as a reliable dating benchmark. The artefact was found at the fringes of the La Tène cultural reach in south-eastern Poland and is typical of phase LT C1. While similar swords are known from both Hungary and Slovakia, they rarely appear in the Upper Tisa drainage basin, with which the San River Valley settlements are thought to have had the closest cultural ties. Notably, phase C1 is relatively well documented, whereas much fewer chronological indicators can be identified for phase C2. Whether this discrepancy can be useful for studying the dynamics of the La Tène settlement of south-eastern Poland is currently difficult to establish. As Z. Woźniak points out,

Celtic assemblages from the south-east of Poland practically lack chronological indicators for phase LT D. Recorded pottery forms are typical for the LT C period, with the exception of the Bachórz graphite pottery fragments, which bear traits of younger wares. He also remarks that extending the chronology of Celtic settlement further into phase LT D does not seem particularly justifiable (Woźniak 2004, 51). Although a collection of finds recorded in Lipnik and Medyka (site 62), which do exhibit partial Celto-Dacian traits, can be dated to phase LT D, such forms are believed to have already developed during phase LT C and were still being used in phase LT D. The site at Bachórz was the only one which yielded just a few Przeworsk culture potsherds identified as typical for phase A3 (Parczewski 1993, Fig. 5:6; 2000, 274). However, it is likely that these pottery fragments are even later than the youngest La Tène finds from the same area and so could be useful in determining the onset of the Roman Period settlement in the region¹¹ (Woźniak 2004, 51).

IV. LOCAL CHARACTERISTICS OF LA TÈNE CULTURE IN SOUTH-EASTERN POLAND

The La Tène settlements in the south-eastern regions of Poland show certain features which distinguish them from the other occupation centres known from the drainage basins of the Vistula and Oder. These differences are observed in both the chronology and the character of the colonisation process. The first settlements are thought to have appeared in Silesia and Lesser Poland during phase LT B and were likely related to the Celtic migrations in Central Europe. Z. Woźniak believed there had been three migration waves, roughly related to the historical Celtic expansion into Italia and Central Europe. He saw these migrations as successive steps leading to Celtic dominance in Central Europe, ensuing dramatic cultural changes attested in both the historical source literature and archaeological research (Woźniak 1970, 186-190). Presently, the interpretation of the phenomenon is becoming slightly more nuanced (Hauschild 2010, *passim*).

And what of the San River Valley and its place in this model? The oldest known chronological indicators from the area are associated with early LT C phase. None of the recorded finds have been identified exclusively with the earlier La Tène periods. Therefore, in line with the common consensus, the onset of the Celtic settlement in south-eastern Poland falls on phase LT C1 and follows

¹¹ Evidence of Przeworsk culture occupation from earlier pre-Roman periods, albeit scarce, have been found to concentrate in the area where the river Wisłok feeds into the river San. Other early Przeworsk culture finds were recorded at Kamiénica, Przeworsk County (Hadaczek 1909, 18; Fig. 4, Antoniewicz, 1929, 99; Fig. 1; Kokowski 2001, 111-112, Fig. 1, Table II; Dąbrowska 1970, 282-283; 1988, map 2).

the period of great Celtic migrations and expansion. The phase marks a period of forming consolidated settlement centres ensuing economic transformations. Beginning in phase LT C (or even earlier in some cases), regions with strong La Tène presence in Eastern Europe become more stable and the network of settlements becomes more dense and established (as seen in Moravia). According to traditional interpretations, the La Tène culture had nearly spread over the entire southern foothills of the Carpathians as early as the end of the 4th century BC (Woźniak 1974, 60, 61; 2004, 48). More recent studies however propose that the ethnic composition of the region was likely mixed (Berecki 2008, 78). Such views are supported by the research conducted at the complex comprising three cemeteries (Ciumești, Sanislă and Berea) and two settlements (Ciumești-Bostănărie and Berea) in Satu Mare region, Romania. While the assemblage from Ciumești-Bostănărie was mostly composed of culturally 'new' La Tène finds, the material recovered at Berea was identified as predominantly local (Ferencz 2007, 159).

The stabilization of settlement centres in the Celtic world went hand in hand with economic growth, which can be inferred from the introduction of local coinage as well as from the establishment of production centres and long-distance trade routes (Clerc 2014). Initially, the centres appear to have been of the Némčice-Roseldorf type (Salač 2006; 2012, 325-329; Holzer 2009, 8-9). These were large settlement complexes, capable of producing a variety of goods and attracting a lot of trade, such as the sites at Berching-Pollanten, Sajópetri Hosszú-dűlő or Nitra-Šindolka, among others (Březinová 2000; Szabó [ed.] 2007). The settlement at Nowa Cerekwia [Altstett] is also increasingly thought to have been one of the larger centres as well (Woźniak 2011, 31; Bednarek 2013) and it is possible that the site at Podlęże had also been a large settlement of this type (Woźniak 1990; Dzięgielewski, Purowski 2011). In Transcarpathian Ukraine, the site at Gališ-Lovačka, sometimes classed as an oppidum, has long been confirmed as an important production and trade centre (Olędzki 2004, 127; 2005, 146; Kotigorosko 2015, 123, 127, 150-151, 206, 213, 215, 237-238), even though the site lacks any apparent defensive structures. Most importantly, Gališ-Lovačka flourished during phase LT C, which is consistent with the chronology of the La Tène occupation in the Upper San River Valley. Large open settlements were also home to skilled craftsmen. Evidence of ironworking and non-ferrous metal production is quite abundant at such sites (military equipment production has been confirmed at Sajópetri Hosszú-dűlő, while tools associated with metal working have been found at the Nitra-Sindolka settlement). However, other trades such as horn and antler production or stonemasonry are also represented in the remnants of workshops (Březinová 2000, 16, 18; Czajlik, Molnár 2007, *passim*; Guillaumet 2007, *passim*). Furthermore, evidence has been found that other less common materials were also being used in workshops within some of the large open settlements. These materials included sapropelite, amber, glass

or even coral (Clerc 2014, 142-143, 223). It is presumed that such specialised workshops likely operated within a well-developed trade network, allowing them to sell their produce. The region of the Upper Tisa was no different. According to some scholars, the Celts may have already settled in these lands during phase LT B1. However, their presence is not fully attested until phase LT B2 (Woźniak 2010, 79, 84; Kazakevich 2015, *passim*, and earlier publications). The settlers found the climate in these new lands to be quite favourable for agriculture. They also quickly began working with metal and clay (Mihok et al. 1999, 16, 18; Mihok et al. 2000, 75-77). It is also possible they tried to set up trading routes leading to the amber-rich lands to the north, through the territories of present Ukraine and Belarus (Woźniak 2010, 79, 84). That such connections with the rest of the Celtic world did exist is easily demonstrated by the numerous coin finds recorded in the area (Kotigoroško 1991, 131). Research suggests that the wealthy settlement at Gališ-Lovačka served as the economic centre of the region (Kobal 1996, 158-159). Surveys conducted at the site (some more systematic than others) recorded over 1000 iron objects, of which 400 have been described in various publications (Clerc 2014, 51). The centre on the Upper Tisa was still active in phase LT D. By then however, the cultural make-up of the settlement had changed to include some Dacian influences, creating a new cultural entity, sometimes referred to as the Zemplín culture.

In general, scholars tend to agree that some cultural similarities do exist between the La Tène population of the San River Valley and the Upper Tisa (Woźniak 1974, 149-150; 1992, 16; Madyda 1996, 41; Karwowski 2007, 138-139; Olędzki 2004, *passim*; 2005, *passim*). A recent discovery seems to further substantiate such claims. The iron items discovered in two hoards in Pakoszówka appear to be analogous with similar artefacts found at Celtic settlements throughout the Eastern and much of Western Europe. However, they show most similarities with the finds from the Mukachevo area. The way in which the chisel is fitted to the main share seems particularly telling – it is identical as in the case of similar finds from Sanok and from the Mukachevo region (Bochnak et al. 2016, 223-224, 228; Fig. 19).

How are the above discrepancies best explained? Why did the La Tène occupation of the San River Valley begin later than in the west of Lesser Poland or in Silesia? Why did it end? And most importantly, why was it limited to areas of unfavourable agricultural conditions?

As a phenomenon, intentional settlement of territories not suitable for agriculture is not unheard of. In Eastern Europe, certain communities are known to have chosen to settle on less fertile soil, provided other mineral resources were available nearby. These could then be traded for crops which the communities were not able to grow themselves and the surplus would have been used to purchase luxury goods. The best examples of such settlements are the complexes at Hallstatt

and Hallein (in Austria), known for salt production and active principally during the Hallstatt period and through some of the La Tène. Other examples include the region of Hunsrück-Eifel (in Germany), rich in iron ore and active in phase LT A (Collis 1994, 38). Similarly, the research of the poor sandy soils around Kraków-Bieżanów revealed the remnants of nearly all archaeological cultures active in western Lesser Poland between the late Neolithic and the Roman Period (Przybyła 2017, 386). Presumably, the resource which attracted La Tène settlers into the Upper San River basin may have been the aforementioned brine springs. The springs were still known and used in the Middle Ages or, in some cases, even later. Salt is essential for human survival and must be consumed to supplement any sodium deficiencies. Additionally, it acts as a highly effective preservative of perishable foods such as meat or dairy. The ability to preserve food for the winter months must have been crucial for the well-being of the community. In this view, salt truly becomes a strategic resource, the trade of which must have functioned since the dawn of civilisation. The recommended daily sodium intake for a healthy diet is 0.4-0.6g, which is equivalent to 1-1.5g of sodium chloride and it is commonly assumed that all communities, prehistoric and later alike, must have had access to it. Salt has always been a much sought-after resource and the demand for it was not subject to fashions or trends. Crucially, salt can also be used as currency since it is easily divided and measured out with no loss of value (unlike amber, a large piece of which would have probably been worth more than the same weight in several small fragments; Godelier 2010, 169). And so, it seems likely that communities with access to salt would have found themselves in an advantageous position allowing them to strive for dominance in the area.

The hypothesis linking La Tène settlement with the presence of brine springs is not new. In fact, many researchers have attempted to correlate the distribution of sites associated with the Celts with naturally occurring salt springs (Fig. 3) (Parczewski 1978, 143; Madyda-Legutko 1996, 41; Ginalski, Muzyczuk 1999, 13; Woźniak 2004, 51). The first research projects concerned with the importance of brine springs in the Słonne Mountains region [Góry Słonne; Salt (brine) Mountains] were carried out in the 60's (20th c.; Jodłowski 1985, 61). Nevertheless, however tempting the hypothesis, one must not forget that no archaeological features definitely identified as La Tène salt making facilities have been discovered in the Upper San River basin so far. Likewise, none of the recorded pottery bears evidence of being used in the salt production process. Remarkably, graphite pottery constitutes an important percentage of all Celtic wares recorded in south-eastern Poland. Perhaps this is because such wares are quite characteristic and easily identified as La Tène. Considering its physico-chemical properties, it is often believed that graphite pottery may have been used for more 'technical' purposes, including in salt extraction (Jodłowski 1971, 91; Poleska 2006, 71).

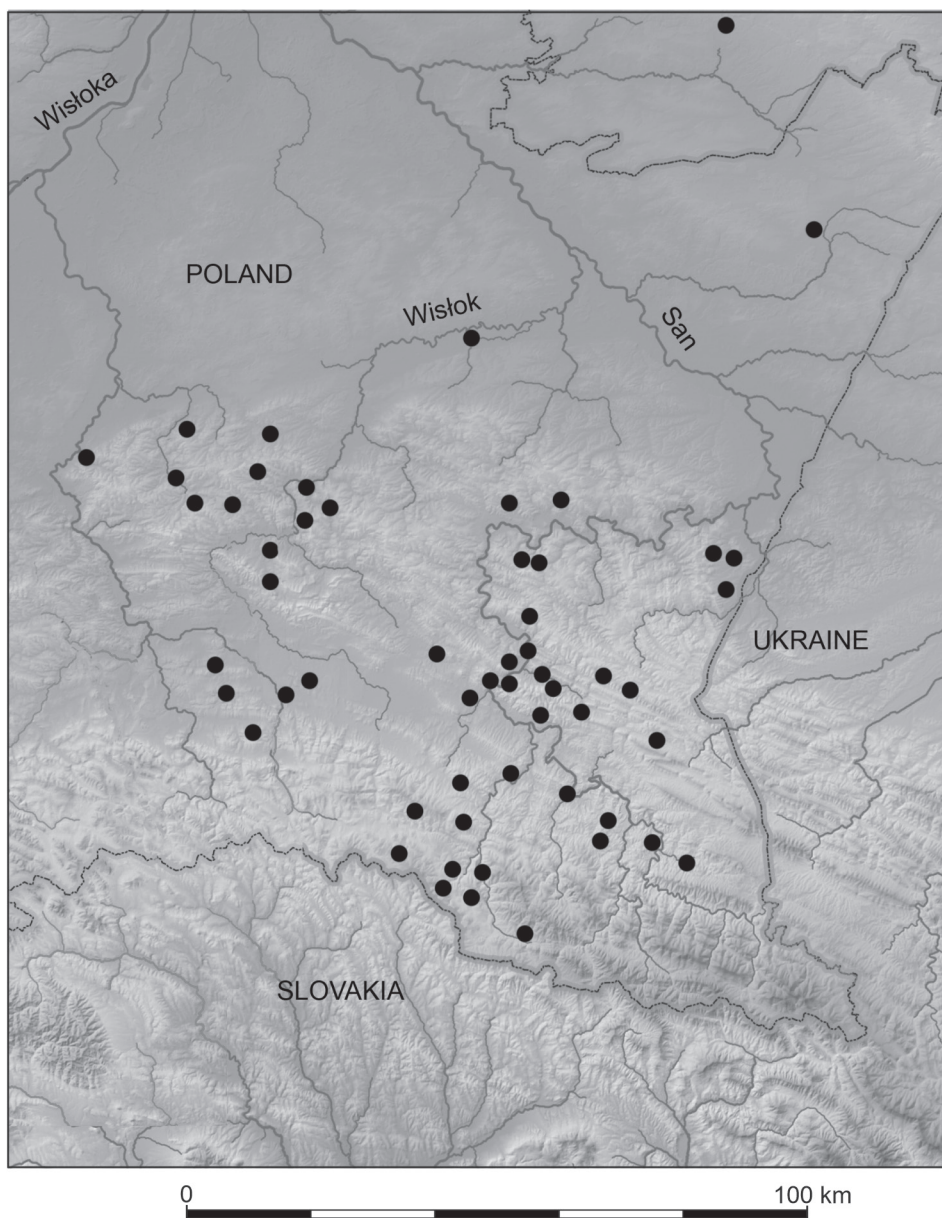


Fig. 3. Salt springs in south-eastern Poland (Acc. to Jodłowski 1971)

On the other hand, the research of the La Tène cultural material in the Upper San River Valley is still rather fragmentary. As we have mentioned, only a few of the sites were excavated. Moreover, many of them were multicultural sites, where the presence of younger sediments made it more difficult to study the older cultural material. Finally, even though the locations of brine springs, as well as their exploitation throughout history, is well attested in source texts and through onomastic studies, no actual remains of Modern Period salt production facilities have been discovered to date. Nevertheless, we believe that the presence of salt springs constitutes a key element in understanding the characteristics of La Tène settlements in the Upper San River basin. Additionally, we need to consider the following two factors:

1. Both the climate and soil quality in the region make agriculture less effective than elsewhere. Additionally, observations made in the Modern Period give us reasons to believe that local communities must have suffered severe food shortages, particularly during the so called 'hungry gap'. Even during the interwar period in the 20th century, it was still common for the population of the Bieszczady Mountains to face periods of near starvation, sometimes right after the harvest season (in particularly lean years) (Reinfuss 1939, 272; Olszański 2006, 56; Wolski, Blin-Olbert 2017, 625-627). Known Modern Period records of numerous so called 'famine food' plant species which grow in the Carpathians are a testament of how hard it must have been to survive in this mountainous area (Bohdanowicz 1996; Misiołek 2003; Łuczaj, Szymański 2007; Łuczaj 2008a; 2008b; Marciniak 2008). While it may be true that the people of Słonne Mountains might have enjoyed the benefits of local brine springs, there is no chance that this factor alone would have directly increased their food supply.

2. Unlike other La Tène centres known in present Poland, the communities which dwelt in the Upper San River basin were probably not intermediaries in long-distance trade. In Lesser Poland or Silesia, amber is a relatively common find, which suggests settlements located there did exchange goods with the inhabitants of territories to the north. By contrast, no finds indicating trade with the northern neighbours have been recorded in the Upper San River Valley. While Z. Woźniak proposes that a trade route connecting the Upper Tisa basin with Sambia may have existed at some point, it would likely have lead through the lands of present Ukraine and Belarus and then through the Rembielin region in Przasnysz County (Woźniak 2010, 77, 79). Supposedly, the Pomeranian culture and Tarnobrzeg Lusatian culture tribes inhabited the Rzeszów Foothills until the 4th or possibly the first half of the 3rd century BC (Czopek 2013, 239, 251). However, available archaeological data suggest that the contacts between these peoples and the La Tène culture population were not particularly frequent. On the other hand, the hoard from Pakoszówka, the hill-fort at Trepcza (with its possible fortifications) and the gold coin from Trepcza indicate that despite its

peripheral location, the Upper San River basin was not entirely isolated from the rest of the Celtic cultural circle. It is also possible that the Greek coins discovered in Mrukowa and Grabownica Starzeńska (Humniska), as well as other Geto-Dacian pieces (particularly the phase I of coinage) may be associated with the La Tène culture settlement in the San Valley (Florkiewicz 2009, 102-104; Table I).

Considering the above, one can assume that settling climatically and agriculturally unfavourable areas may be considered reasonable, provided that the La Tène population of the Upper San Valley functioned as an 'colony' established by the peoples inhabiting regions to the south (Upper Tisa River in particular) and that the principal resource of the 'colonists' was the salt they produced locally and exported back across the Carpathians.

At the same time, it is difficult to establish whether the communities from the Upper Tisa basin began the exploitation of the San River Valley brine springs in order not to rely so heavily on their former suppliers, or if existing trade routes had become less reliable due to political issues. The closest source of salt were the deposits of Maramureş (e.g. near Solotvyno¹²). However, the area was not settled by the Celts but remained under the control of local Iron Age communities. The region was dominated by both open and fortified settlements (Solotvyno, Bila Cerква). Aurel Rustoiu emphasises that the finds from both Solotvyno and Bila Cerква suggest an evolution from the Early to the Late Iron Age, unchanged by the arrival of foreign groups, and different from the situation we observe elsewhere – e.g. after the Celts arrived in Transylvania (Rustoiu 2014, 153-156; 2015, 15).

Prehistoric salt extraction in Transcarpathian Ukraine has not been particularly well studied (Kobal 1997; Harding 2011, 31-32). Further away, lay the Transylvanian salt deposits. The Celts arrived in the area during phase LT B and were quick to understand the importance of the resource. It is believed that the presence of salt was one of the key reasons of Celtic colonisation of Transylvania and that the settlements were deliberately located either nearby easily accessible deposits or on important communication routes (Ferencz 1998, 219; 2006, 158). Unfortunately, the scale of the prehistoric salt extraction in Transylvania is difficult to ascertain because of later (Modern Period and contemporary) salt mining activities in the region (Ferencz 2006, 158; Berecki 2009, 15). Researching the brine springs and their exploitation proves similarly difficult. As far as the territories of present Romania are concerned, attempts to establish the scale of salt extraction from brine springs activities were only made in Moldova (Monah 2002, 139).

¹² The site was named after the large deposits of salt (sol' [соля] in Russian means salt). A nearby site of prehistoric salt extraction, located between the towns of Novoselitsa and Tisolovo, is known in literature as Királyvölgy (Hungarian), Königstal (German) and Valea Regilor (Romanian). All mean 'King's Valley' – perhaps because in the Middle Ages, salt extraction was strictly controlled by the crown (Harding 2011, 30).

Understandably, archaeology does not have the tools to accurately study problems such as the scale of salt trade. And so, the influence of regional politics and social interactions between prehistoric communities south of the Carpathians remain unknown. On one hand, researchers mention a 'salt road' leading from the south-east to south-west, on the line Sălacea – Nyírbátor – Nyíregyháza – Himesudvar (Almássy 1997, 229). On the other, Dacian influences become stronger in Transylvania in phase LT C (Woźniak 1974, 61, 62; Rustoiu 2015, 27-28). Such a change may have well shifted the dynamics of trade relations in the region. Perhaps, this was why the 'colonists' decided to venture north of the Carpathians at the time?

The above hypothesis also seems to explain the disappearance of the La Tène culture in the south-east of Poland. According to the accounts of Gnaeus Pompeius Trogus and Justin, during the reign of king Rubobostes/Burobustes, that is before the year 168 BC, the Dacians' power increased, as they defeated the Celts who previously held supremacy in the region (Justynus, *Prolog XXXII*)¹³. Dacian influences become apparent on the Tisa at the beginning of phase LT D and as we have previously mentioned, similar processes have also been observed in Transcarpathian Ukraine. The influence of the Dacians also reaches Maramureş. Most likely, large territories of the Carpathian Basin became politically unified. What would this have meant for the salt producing communities in the Upper San basin? We believe it's possible that once the power of Rubobostes' successors reached the southern fringes of the Upper Tisa basin, the Dacians were able to satisfy their demand for salt with local deposits at Maramureş now came under their control. The salt from Transylvania also supplied parts of Pannonia and large areas of the Balkan Peninsula west of the rivers Vardar and Great Morava (Medeleţ 1995, 53-54; Iarosslavski 1997, 45; Rustoiu 1999, 192). When the political landscape of the Upper Tisa basin shifted, the brine springs in the San River Valley lost their significance, ensuing a local settlement crisis.

However, it is important to remember that some Celto-Dacian material has also been recorded in south-eastern Poland. Namely, the finds from Medyka and Lipnik, dated to phase LT D (Poradyło 1999; Przybyła 2004). Perhaps the same dating should apply to the puzzling find of a silver bull's head recovered from the river San at Radymno (Parczewski 2009, and earlier publications). Notably, some of the artefact's features appear typical for Celtic and Thracian toreutics (Bochnak, Kieferling 2009; Bochnak, Bochnak 2016). It is believed that such finds would be the evidence of the arrival of Celto-Dacian influences into the San River basin¹⁴. Additionally, during phase LT D, influences from

¹³ *Incrementa Dacorum per Rubobosten/Burobusten regem.*

¹⁴ The list of Celtic finds from the Przemyśl area could perhaps include the famous find of six Celtic silver coins (<https://rzeszow.tvp.pl/26029940/odkryty-skarb-szesc-celtyckich-monet-mogamic-az-2-tysiace-lat>; <http://rzeszow.wyborcza.pl/rzeszow/1,34962,20364230,niezwykle-znalezisko>

Transcarpathian Ukraine reached as far as Lesser Poland, which is attested by the pottery recorded near Kraków (Woźniak 1990, 74-75; Poleska 2000, 87-89). The Dacian cultural impact became even stronger at the beginning of the Roman Period. The pottery assemblages from Bachórz-Chodorówka seem to confirm this. Many of the forms appear analogous to those found at sites associated with the Dacian cultural circle (Gedl 2004). The same can be said about other sites in south-eastern Poland as well (Florkiewicz, Bochnak 2006, 132-135). While the current state of our knowledge is not sufficient to form definite conclusions, it seems plausible that the Celtic material from the salt-rich San River basin and the later Ceto-Dacian wave should be treated as separate cultural phenomena.

V. CONCLUSION

At present, it can be concluded that the La Tène cultural material recorded in the Upper San drainage basin chronologically belongs to phase LT C. For now, no finds definitely associated with phases LT B or LT D have been discovered in the region. Similarly, none of the evidence collected so far indicates that local La Tène communities in the area underwent any acculturation processes. Furthermore, based on the available data, there seems to be no clear continuity between the La Tène occupation and the oldest Przeworsk culture finds dated to the end of the late pre-Roman period (Woźniak 2004, 51, 52). The ‘Celtic episode’ of the prehistoric Sanok region should likely be associated with a group of colonists from the south who, during phase LT C, used the local brine springs to produce salt and supply it to the population of the Upper Tisa basin. The settlers probably relied on both agriculture and animal husbandry to sustain their communities. However, it seems unlikely that they were able to produce any food surpluses, considering the unfavourable climate and poor soil conditions. In a broader perspective, the La Tène culture at the time enjoyed a period of economic growth, as evidenced by the large open settlements capable of producing various goods for long-distance trade. However, when the expansion of Dacian tribes to the south of the Carpathians began to cause shifts in the political landscape and the trade routes’ network, the San River Valley ‘colony’ lost its economic significance and entered a period of decline. Presumably, some of the population may have migrated north into the more fertile lands of the Rzeszów Foothills, while others might have returned to the areas of their origin. Notably, the youngest La Tène material was recorded primarily on the fringes of the extended San basin complex. The latest horizon of settlement with identifiable Celtic characteristics incorporates

pod-przemyslem-monet-y-moga-miec-2-tysiace.html). However, this was a stray find – both isolated and unusual in the Polish context.

Dacian cultural elements. This confirms that local communities did establish some contacts with the regions south of the Carpathians, or could point to later migrations from the south. And so, which was it – *Movement or Stabilisation?* Our answer is this: a stable support base, either north or south of the Carpathians, would have been the prerequisite of stable settlement in the Upper San River basin. Otherwise, the benefit of brine springs available in the area is outweighed by the difficulties related to poor climate and impoverished soil. Consequently, the Słonne Mountains become a land to ‘move-through’ rather than settle upon.

LIST OF SITES WITH A RECORD OF LA TÈNE MATERIAL IN SOUTH-EASTERN POLAND (see Fig. 1, 2)

1. **Albigowa**, Łańcut County, site 1. A glass bracelet fragment, loose find (Blajer 2003, 73-81; Karwowski 2004, 153-161; 2007, 128; Woźniak 2004, 49, 51 (as settlement); Przybyła 2004, 219-232).
2. **Bachórz**, Rzeszów County, site 16. A multicultural site containing La Tène cultural material (Parczewski 1978, 134-151; 1993, 205-216; Parczewski 1999, 339-350; Karwowski 2004, 153; Przybyła 2004, 230; Karwowski 2007, 128).
3. **Boguchwała**, Rzeszów County, site 11. A graphite pottery fragment (Żaki 1955, 803; Woźniak 1970, 341; Czopek 1992, 134; Przybyła 2004, 219, 230).
4. **Dobra**, Sanok County, site 16. Graphite pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
5. **Długie**, Sanok County, site 13. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
6. **Haczów**, Brzozów County, site 1. Graphite pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
7. **Humniska**, Brzozów County, site 10. Graphite pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
8. **Iwonicz**, Krosno County, site 51. La Tène type pottery (imitation of situla?) recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Muzyczuk 2002, 184).
9. **Jarosław**, Jarosław County, site 158. Graphite pottery fragments, including one recorded within a pit identified with Pomeranian culture (Czopek 2011, 92; 2014, 179).

10. **Kniażyce**, Przemyśl County, site 14. Graphite pottery (Poradyło 1999, Fig. 5; Przybyła 2004, Fig. 10).
11. **Krosno**, Krosno County, site 1. La Tène culture settlement (Muzyczuk 2002; Karwowski 2007, 136, 2008, 146).
12. **Lipnik**, Przeworsk County, site 3. A multicultural site containing La Tène cultural material (Przybyła 2004, 221-231).
13. **Markowce**, Sanok County, site 7. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
14. **Markowce**, Sanok County, site 9. Grey pottery recorded during the AZP research project (Madyda-Legutko 1996, 37; Ginalski, Muzyczuk 1999, 9-10; Czopek 2002 16-17).
15. **Medyka**, Przemyśl County, site 42. La Tène type pottery recorded during the AZP research project (Poradyło 1997, 84; Przybyła 2004, 230).
16. **Medyka**, Przemyśl County, site 62. Site containing celto-dacian type pottery (Poradyło 1999, 217-229; Przybyła 2004, 230; Karwowski 2007, 136; 2008, 147-149).
17. **Ostrów**, Przemyśl County, site 14. Graphite pottery recorded during the AZP research project. (Koperski, Parczewski 1976, 55; Parczewski 1978, 144; Czopek 1992,16; Przybyła 2004, 230).
18. **Pakoszówka**, Sanok County, site 3. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
19. **Pakoszówka**, Sanok County, site 32. Settlement of La Tène culture (Muzyczuk, Pohorska-Kleja 1994, 167-181; Karwowski 1997, 54-55; Olędzki 2004, 129; Przybyła 2004, 230; Karwowski 2007, 133).
20. **Pakoszówka**, Sanok County A hoard of damaged bronze anklets and (?) a hoard of iron tools (Bochnak, Kotowicz 2015; Bochnak et al. 2016).
21. **Pakoszówka**, Sanok County. A hoard of iron tools (Bochnak *et al.* 2016).
22. **Pielnia**, Sanok County, site 22. Graphite pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
23. **Pielnia**, Sanok County, site 30. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17).
24. **Pikulice**, Przemyśl County. According to the finders, a hoard of six silver Celtic coins with 'pellets' was discovered in the town of Pikulice. No Iron Age material was discovered during further research. The status of the find remains unclear(<https://rzeszow.tvp.pl/26029940/odkryty-skarb-szesc-celtyckich-monet-moga-miec-az-2-tysiace-lat>; 23.03.2018<http://rzeszow.wyborcza.pl/rzeszow/1,34962,20364230,niezwykole-znalezisko-pod-przemyslem-monety-moga-miec-2-tysiace.html>) 23.03.2018.

25. **Pobiedno**, Sanok County, site 18. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17).
26. **Pobiedno**, Sanok County, site 22. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17).
27. **Prusiek**, Sanok County, site 18. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17).
28. **Przemyśl**, Przemyśl County, site 292. A bronze *Marzabotto* type fibula, a find without context (Woźniak 1970, 341; Czopek 1992, 134; Przybyła 2004, 230).
29. **Radymno**, Przemyśl County, site 6. A silver bull's head accidentally recovered from the river San (Woźniak 1970, 342; Czopek 1992, 135; Przybyła 2004, 230; Bochnak, Kieferling 2009; Parczewski 2009; Bochnak, Bochnak 2016).
30. **Rączyna**, gm. Kańczuga, pow. przeworski, stan. 19. Graphite pottery recorded during the AZP research project (Przybyła 2004, 221, 230).
31. **Rymanów**, Krosno County, site 25. Graphite pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Muzyczuk 2002, 184; Przybyła 2004, 230).
32. **Rzeszów**, Rzeszów County, site 15. A sword in an iron scabbard with an ornament depicting a pair of dragons (?) recovered from the river Wisłok (Kunysz 1959, 187-188; 1962, 86; Woźniak 1970, 161; Przybyła 2004, 230; Bochnak 2005, 154; 2006, 168-169, Fig. 3).
33. **Samokłęski**, Jasło County, site 3. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
34. **Samokłęski**, Jasło County, site 13. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
35. **Sanok**, Sanok County, site 54. Graphite pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17).
36. **Sanok**, Sanok County, site. 60. A multicultural site containing La Tène cultural material. Unpublished, courtesy of Mirosław Mazurek.
37. **Sanok-Biała Góra**, Sanok County, site 3. A multicultural site containing La Tène cultural material (Parczewski 1987; 1988; Parczewski, Pohorska-Kleja 1995; Muzyczuk, Ginalski 1999, 9; Przybyła 2004, 230; Karwowski 2004, 159; Karwowski 2007, 139; Karwowski 2008, 145-146).
38. **Sierakońce**, Przemyśl County, site 1. Graphite pottery collected during surface surveys (Woźniak 1970, 342; Czopek 2002, 16-17).
39. **Sierakońce**, Przemyśl County, site 3. La Tène type pottery (Czopek 1992, 135; 2002, 16-17).
40. **Sierakońce**, Przemyśl County, site 5. La Tène type pottery recorded during the AZP research project (Poradyło 1997, 84; Przybyła 2004, 230).

- 41. Srogów Górny**, Sanok County, site 2. A site containing La Tène cultural material (Czopek 1992, 135; Muzyczuk, Pohorska-Kleja 1994, 171).
- 42. Trepcza**, Sanok County, site 2. A multicultural site (hill-fort) containing La Tène cultural material (Karwowski, Ginalski 2002, 67-83; Przybyła 2004, 230; Karwowski 2004, 153-162; 2007, 133-134; 2008, 147-149).
- 43. Trepcza**, Sanok County, site 4. A Celtic Nike type stater, modelled after the coinage of Alexander the Great - loose find (Stefański 1967, 76; Woźniak 1967, 205; 1970, 342; Czopek 2002, 16-17; Przybyła 2004, 230; Karwowski 2007, 133).
- 44. Wietlin**, Jarosław County, site 8. La Tène type pottery recorded during the AZP research project (Poradyło 1997, 84; Przybyła 2004, 219).
- 45. Witoszyńce**, Przemyśl County, site 2. Graphite pottery (Parczewski 1978, 145; Przybyła 2004, 230).
- 46. Zboiska**, Sanok County, site 12. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).
- 47. Zboiska**, Sanok County, site 18. La Tène type pottery recorded during the AZP research project (Ginalski, Muzyczuk 1999, 9-10; Czopek 2002, 16-17; Przybyła 2004, 230).

translation Jan Skorupka

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