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On September 18–22, 2001 the Symposium Castella Maris Baltici VI was held in Lithuania. This is already the 6th symposium for the researchers of the medieval castles. The first symposium was held in Turku, Finland in 1991, the second – in Nyköping, Sweden in 1993, the third - in Malbork, Poland in 1995, the fourth - in Estonia in 1997, and the fifth – in Denmark in 1999. The topic of the conference held in Lithuania was "Contacts and Genetically Dwellings in the Castle Buildings". Over 40 scientists participated in the conference from Denmark, Belarus, Finland, Sweden, Switzerland, Germany, Russia, Great Britain, Poland, Latvia, Estonia, and Lithuania. In the conference there were not only reports presented but also the most famous castles of Lithuania visited in Vilnius, Trakai, Kernavė, Kaunas and Klaipėda. The time of this conference coincided with the European Heritage Days "Defensive Fortifications in Lithuania".

This conference was organised by the Public Institution Academy of Cultural Heritage established by Vilnius University, Vilnius Academy of Arts, Vilnius Gediminas Technical University, Ministry of Culture of the Republic of Lithuania and Department of Cultural Heritage Protection. The Symposium Castella Maris Baltici VI was sponsored by the Department of Cultural Heritage Protection. The Center of Cultural Heritage funded the publishing of this publication. I would like to express my gratitude to Diana Varnaitė, Director of the Department of Cultural Heritage Protection, Vitas Karčiauskas, Director of the Center of Cultural Heritage, Alyvydas Nikženta- tis, Director of Lithuanian Institute of History, Juozas Baudauskas, Director of the Publishing House Savastis, and editors of the publication prof. Werner Meyer and dr. David Gaimster.

Especial thanks deserve my colleagues who organised this event Rita Mosiejienė, dr. Justina Poškienė and dr. Gintautas Zabiela.

Dr. Albinas Kuncevičius

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defence of the island consisted of an earth rampart and a wooden palisade. It is impossible to determine whether the brick-buildings were houses or towers and whether they date back to 1314 or if they are much younger. It is possible that the Stege castle which was built in 1314 was a genuine wooden castle. On the other hand the fact that the under-water constructions are made of wood must not lead to overreaching interpretations. The well-defined piles of bricks in the moat do as mentioned above indicate an earth rampart. But a ringwall of bricks is not definitively out of the question.

Artefacts

Artefacts are found in the moat close to the bridge and in the wells. Down-at heel leather shoes and small, manufactured, wooden sticks, presumably parts of furniture, bone material and potsherds are the most common artefacts in Stege Borg. But there are also parts of cross bows, dice, pieces, handles of knives, a seal, a sword pommei etc. The most remarkable finds are the ornamented pieces of birch bark (Fig.13), which have never been seen in Denmark before. Similar pieces are excavated in Kernave in Lithuania along with a stamp used to strike the ornaments on to the birch bark. The ornamented birch bark and the stamp from Kernave are on view in the Kernave museum of archaeology and history (Vilkūnas, Luchtanis, Grigonienė 1999). Ornamented birch bark and other artefacts from Stege castle are on view in Møns Museum in Stege, Denmark. Possibly these pieces of ornament have been used to decorate baskets, boxes, quivers etc.

Future excavations of Stege Castle

Only one quarter of the 1314 castle has been excavated. The two quarters of the castle to the south are occupied by modern harbour-activities and have been exposed to many building-activities during time. Probably little is left of the castle in that area. But the area to the east, which is today undeveloped, apparently has never been demolished to the same degree as the now excavated area. If the future building-activities cause archaeological excavation in this area, perhaps foundations of buildings and the layout of this part of the castle-island will be brought to light.

Anders Reinsert

SOME SCANIAN AND SCANDINAVIAN CASTLES AND THEIR RELATIONS TO THE LIVONIAN ORDER

Einige skanische und skandinavische Burgen und ihr Verhältnis zum Livischen Orden


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Background

Scania is to day the southern most province of Sweden but up to 1658 Scania was an important part of Denmark. Particularly when we are dealing with medieval and the renaissance period in this part of Sweden we actually are looking at Danish conditions. It was common among the members of the high nobility in Scania to own estates both in Denmark and in Sweden. A few also owned property in Norway and Finland.

That was one of the results of the political union between the countries during the period 1397 to 1523, the so-called Kalmar federation. One of the results of the Kalmar federation was that ideas concerning art, politics, religion, warfare and architecture easily moved over the borders in-between the different countries of the federation. The national borders were no limitation for the thoughts of the privileged people.

Instead the ideas, for instance concerning architecture and fortification, seem to follow family relations more than the national borders. This phenomenon makes it possible for building-types and plane-solutions within the buildings to move over considerable distances without any traces in between.

This phenomenon should not be overestimated however. There are regional differences in building techniques between Denmark and Sweden even if both countries belongs to a architectural world, at least concerning stone-building techniques, that they shared with the rest of northern Europe.

Military conflicts in Scania during early renaissance

In the beginning of the 16th century two large-scale rebellions took place in Scania. The development of this conflicts followed the same patterns as the contemporary rebellions among the peasants in Germany.

The first rebellion took place in 1525 and many of the private castles and manors where destroyed or heavily damaged in the struggle between Fredrik I and the rebellious forces led by Sören Norby. Artillery was the new weapon used effectively by both sides.

Eleven years later a new rebellion took place and only few of the fortifications owned by the nobility survived.

In both of the civil wars the social tensions between peasants and the inhabitants of towns on the one side and the local nobility on the other side, became evident. In the end the nobility stood as victor with new privileges, political power and enlarged economical resources to there disposal.

After the rebellions the nobility had several reasons to increase their building capacity. First of all many of them have lost their castles and manors in the struggles against the rebellious forces. The need for good and modern private protection against rioting bands had become evident for the nobility during the fighting but they also wanted to dress their victory in new and mighty castles.

The development of castle building tradition in Denmark east of the sound after the rebellion 1534–1536

Inbetween the rebellions and the first decades after the last insurgent armies was forced to surrender a comprehensive building activity occur among the members of the Scanian nobility. This building period is characterised by an experiment with different types of castles and fortifications (Fig. 1). One clearly can identify a group with diagonal placed artillery towers was crystallise.

Four castles in Scania belong to the main group and they are all built in brick in a combined early renaissance and late gothic architectural style. They all have four wings built together which gives a small squared courtyard like the castles build by the Teutonic or the Livonian orders. The castles are placed in lakes, natural ore artificial; or are surrounded by broad moats. The defence-system is similar in all four castles with diagonal placed corner towers that could give flanking fire by cannons. The wings were also protected by a shooting gallery just under the roof. The loopholes was furnished with recoil beams. Between the loopholes are in most cases a sort of machicolations, especially close to the corners and over the entrances.

The oldest of the castles with diagonal towers in Scania is Vegeholms built soon after 1530 by the knight and member of the kings council, Tyge Krabbe (Richard & Ljunggren 1853: 1 Vegeholm; Whalin 1903: 273; Olsson 1922: 237; Kjellberg 1966 III: 350 ). He was a well reputed warrior who had been one of the kings commanders on most battlesfields on Scanian soil during the beginning of the 16th century. The castle that he built in the bend of the Vege river is the only Scanian example with squared towers. When Tyge Krabbe ordered Vegeholm to bee built he used one older building, the southern wing to which he added three other wings and the two squared towers on the corners. From the towers flanking fire could bee given along the outer side of the wings (Fig. 2).

According to a sign over the entrance, Tage OttsenTott begins to built the castle Eriksholm 1538. The castle was named after Tages younger brother Erik and commemorated his death at the age of 19 (Richard & Ljunggren 1854: 2 Trolleholm; Olsson 1922: 231; Kjellberg 1966 I: 276) Later the name of the castle was changed to Trolleholm. Tage Tott was landlord of Bohus an later Landskrona. The castle of Landskrona was built under his supervision in 1549 (Norm 1949: 92). In the Scanian wars, between Sweden and Denmark 1675 to 1678, the castle Eriksholm was destroyed. When it was rebuilt again the towers were changed and the buildings lost their renaissance look in favour for the baroque style. However the castles original appearance are well known from written descriptions and contemporary drawings. Considerable parts of the eastern wing has also been preserved to our days (Fig. 3).

Torup is the only Scanian castle of this type that has been dated by dendro-chrono and it was begun in 1537 and it was completed 1542 (Bartolin 1975: 12). The foundations of this castle where, according to a now lost sign, laid by Lady Gørvell Sparre (Richard & Ljunggren 1854: 1 Torup). Torup is the best-preserved castle of its kind in Scania but some changes in the exterior were been made in the years 1631–32 (Kjellberg 1966 II: 343). After a strike of lightning one of the corner towers was rebuilt from...
built several times but the exterior is relatively well preserved.

From older descriptions, drawings and pictures a fairly good reconstruction of the castles original appearance can be made (Fig. 3).

Lillöhus has a complicated building history and new investigations, carried out by Anders Ödman, have considerably changed its older history (Ödman 2001: 58). On the foundations after a high medieval castle, the member of the king’s council Ivar Axelsen Thott built around 1460, a large fortified house. Ivar’s brother was Erik Axelsen who founded the border castle Olofsborg in Finland. Olofsborg was one of the fortresses in Scandinavia that originally was designed for artillery warfare.

Ivar Axelsens castle Lillöhus was destroyed 1525 in the Sörens Norby rebellion and was rebuilt with diagonal artillery towers some years later. There is no exact dating when this building-project was made but it was either in the beginning of 1530th or around 1546 by Jacob or his brother Börge Trolle (Andersson 1948: 54). Two drawings from the 17th century made by the Swedish fortification expert Eric Dahlberg shows a strong castle (Olsson 1922: 193) (Fig. 6).

In 1548 the king Christian the III ordered a building master with the name Otlof, who by this time was in service of Anna Uggerup. She was half sister of Jacob Trolle and after his death 1546 she came in the position of Lillöhus (Lundberg E.B. 1941: 78) Oluf should immediately leave his service in Annas household and travel Lyckå to build a new border castle there (Lundberg E.B. 1941: 73) (Fig. 7).

The castle Lyckå has many parallels and similarities with Lillöhus. From the kings letter it is obvious that the Building-master Oluf may have been engaged in the modernisation of Lillöhus (Andersson 1948: 38). King Christian had no intention to create a strong border castle at Lyckå but to “build a residence and a haven of refuge in times of war” (Lundberg 1941: 76). This means that we are not dealing with one of the heavier fortifications that defended Denmark. As a comparison can the around ten years older Malmöhus be used. This castle, which defended a part of the eastern shores of the sound and the kings interests against rebellious citizens of the towns (Reisner 2000a: 164; Reisner 2000b: 232), was a full equipped fortress in the same style as the border castles created after the order the emperor Charles V between his territories and the kingdom of France (Roosens 1996: 193).

The development in Denmark west of the sound after 1536

In Denmark west of the sound only one example of a castle with diagonal defence towers is known but several others were built after the diagonal towers had lost their character of defence installations (My special thanks to Heidi Marie Moller Nielsen who turned my attention towards the Danish material). Wee will later return to the more civil type of castles with diagonal towers in Denmark in this article.

The only known castle of the type that uses diagonal towers as military defence purposes is Urup in Jutland. This small castle was erected on the families old estate by the knight, admiral and member of the kings council Pe-
der Skramm in 1543–44 (Norrman 1953: 122), Peder Skramm's half aunt was Anna Ugerup who had handed over her building master Olof to Christian III in order to build the border castle Lyckå (Norrman 1953: 124). Later the castle Urup was modernised and most parts of Peder Skramm's buildings were destroyed (Fig. 8).

Archaeological investigations made by Otto Norrman has given evidence that the castle Urup was more or less a copy of Lyckå in Blakinge and Lillöhus in Scania (Norrman 1953: 116), probably the same building master, Olof, has been in charge when the three castles were erected.

In Denmark west for the sound a particular type of manor that has solved the defence question with a defendable house with three towers, developed. They occur in Funen and in Jutland and follows another line of defensive thought in fortification than the diagonal towers. A beautiful example is Hesselager gaard on Funen. The kings chancellor Johan Friis began to build the castle in 1538 but we do not know for sure when it got the shape that we see today (Rils 1981: 83). To obtain full flanking fire of the walls in

Fig. 7 Lyckå. After Lundberg 1941

Fig. 8 Urup. After Norrman 1953

Fig. 9 Penningsby. After Söderberg 1967

Fig. 10 Brokind. Eric Dahlgren. After Hahr 1917

Fig. 11 Kungs-Norrby. Eric Dahlgren. After Hahr 1917

Fig. 12 Morby. After Tuulse 1952

Sweden

Four castles from this period in Sweden are known to have diagonal artillery towers. Two of these were built in the central part of Sweden.

**Penningby** in Uppland was originally a double house. It was the nobleman Lars Turesson Tre Rosor who soon after 1543 added the diagonal towers to an already existing house (Hahr 1917: 109; Söderberg 1967: 32). Lars Turesson was married to Kristina Eriksdotter Gyllenstjärna and through relation by marriage related with Börje Trolle to Lillöhus in Scania (Fig. 9).

Related with Lyckå and Lillöhus in plan was Brokind in Östergötland. A large house with one quadrangular and one round tower as we know it from a 17th century picture. All datings are pure speculation (Lovén 1996: 485) but it seems reasonable that A Hahr is correct when he says that the towers where added in the middle of the 16th century (Hahr 1917: 140) (Fig. 10).

King Gustav Vasa built a small castle called **Kungs-Norrby** with a rectangular house in 1556. We do not know if the diagonal towers, one quadrangular and one round in plan, was original or later additions. Archaeological investigations have given evidence for building-activities in the second half of the 16th century (Lovén 1996: 485) (Fig. 11).

A private castle called **Morby**, built by Gabriel Oxenstierna and his wife Beata Eriksdatter Trolle in 1569. The castle has one round and one squared tower added to a older four-winged castle (Tuulse 1952: 33) (Fig. 12).

Gabriel Oxenstierna was Swedish governor in Tallinn that year and he had a special task to modernise military buildings in Estonia. Beata Eriksdatter Trolle had close family relations with the Danish Brahe family who built Vittskövé. The Trolle family had got benefits from the Kalmar federation and owned large properties and estates in both Sweden and Denmark.
but as a governor of Estonia he had several opportunities to become familiar with diagonal towers as defence idea.

**Norway**

In Norway Steinvikholm built by the Archbishop Olav Engelbrektsen just outside Trondheim is an interesting example of the type. Modern studies have recently been made and published by Sæbjörg Walsaker Nordeide. One of her results is that the archbishop probably got the idea of the castle-type from another source than the Scanian nobility. The archbishop was in Rome to get his Pallium 1523 and directly when he got back to Norway he began to build Steinvikholm. According to Nordeide's interpretation Olof has been in contact with Leonardo da Vinci's castle plans (da Vinci was in the Popes service 1513–1516) and especially one that was made during this period where the great inventor had made a drawing over a fortified castle with diagonal placed towers (Nordeide 2001: 127) (Fig. 13).

**Estonia**

**Neuschloss** (Vasknarva) on the borderline, created by the Narva river, against Russia. The castle was first built by the Livonian order in 1349, destroyed in 1427 and modernised with artillery towers around 1500. On Tuulise's drawing of the castle there is only one tower but (Tuulise 1942: 314) later investigations has shown that castle during its last modernisation was rebuilt with diagonal placed artillery towers (Altoa 1997: 233, 272) (Fig. 14).

**Worder,** (Virtsu) on the Estonian mainland just opposite the island Saaremaa (Osel) was built 1465 as a vassal castle by Konrad Ukkull. It was destroyed 1533-34 and was never rebuilt (Tuulise 1942: 317). We do not know when the artillery towers was added, but they are probably not as early as 1465. The castle was investigated in 1977 by K. Aluze who made an excellent reconstruction of the castle's original appearance (Aluze 1978: 73) (Fig. 15).

**Latvia**

**Wenden (Cesis)** was built in the beginning of the 13th century and was the main-castle of the Livonian order and earlier by the sword knights. Wolter von Plettenberg built new artillery towers here in the end of the last years of the 15th century (Tuulise 1942: 46; Ose 2000: 222) (Fig. 16).

**Neumühlen (Adazi)** was originally built in the end of the 13th century by the Livonian order. It was modernised with diagonal artillery towers by Wolter von Plettenberg around 1500 (Tuulise 1942: 133; Ose 2000: 225) (Fig. 17).

**Aischwangen (Alsunga)** existed in 1341 and it was a administrative strong-point under the Komturrei Goldingen. It was build as a large quadrangular castle with 60–65 m sides. Around 1500 new artillery was added to the complex (Tuulise 1942: 232; Ose 2000: 223) (Fig. 18).

One of the most splendid castles where the idea of the diagonal placed artillery towers was fulfilled is the castle in Riga. It was, like the other examples of Livonian castles in Latvia mentioned in this article, modernised by the Master of the Livonian order Wolter von Plettenberg. Wolter von Plettenberg was master of the Livonian order between 1494–1535. The works on Riga castle begins in the last years of the 15th century. The building-master Meister Nygels or Nickels from Tallinn work here from the first years of the 1500 to 1515 when castle was ready (Tuulise 1942: 322–323). It is probably he who erected the large diagonal placed artillery towers (Fig. 19).
From fortification to architectural element

It is typical for several building elements that originally had defensive purposes being transformed to architectural elements when their original purpose is of no use any more. One of the most classical examples is the moat. When the moat was filled with water it became an obstacle of significance for the enemy. It made surprise attacks impossible and a considerable problem for the enemy during a siege. When the artillery developed in a way that made private effective fortifications incredibly expensive, together with a more secure and stable situation in the society, the moat became a beautiful water mirror where the manors splendid but defenceless architecture could reflect. Even long after the towers no longer were of any military use the nobility still built them in order to show off their status. Also the diagonal towers were used in a more friendly way in the end of the 16th and beginning of the 17th century. Here is some examples in both Denmark and Latvia.

Kerklingen in Latvia was built in 1575 (Pirang 1926 I: 69) have diagonal towers. In this case the towers were not built for fortification purposes. Instead they are housing the manors staircases (Pirang 1926 I: 34).

In Scania we have Marsvinsholm built 1644 by Otto Marsvin (Kjellberg 1966 II: 193) with beautiful diagonal towers that gives the building a graceful appearance.

In Denmark Katholm on Jutland was built with diagonal towers in the in the last years of the 16th century in a distinctive Dutch influenced renaissance style (Kock 2000: 86). Also Osterholm on island Als was rebuilt to an exclusive hunting lodge by the duke Hans probably in 1592. Today the place is a ruin but archaeological research have give evidence that the construction was supplied with diagonal towers (Nom 1956:103).

Discussion

The datings of the different additions to the castles in Livonia are not exact but it seems reasonable that the idea with diagonal placed artillery towers first occurred in the area that is now known as Latvia. I would like to suggest that the very first castle of the type is Wendow (Cessis), the main castle of the Livonian order. When Wendow was modernised the brilliant military strategic thought of the diagonal towers was evident. The same flanking effect could bee obtained by two diagonal placed towers as with four corner-towers. A real barging for Wolter von Plettenberg the threat against the order from Russia was constant and to modernise the castles of the territory was an urgent demand. If the fortification have the correct plan this could then be made to half the amount of money and even more important, in half the time.

As we have seen there is several similarities in between the area controlled by the Livonian order and Scandinavia in castle planning. The question where the link is between the Livonian order and Scandinavia is hard to answer however. The written sources are to scarce to give a clear overview over the problem.

As far as I have found out there are no direct written evidences for a connection at all. Instead of working with hard facts we have too look on a possible solution of the origin of the contacts.

We know, for instance, that there already in the early 13th century have been contacts between Gotland and the region that now are known as the Baltic states as with other parts around the Baltic sea. Not only limestone and timber for building purposes we re exported from Gotland but also craftsmen, like stone-workers and masons, came to the Baltic region from the island to build churches and carve details of stone (Markus 1999). Kaur Altoa has pointed out that one of the pilgrim routes to Old Livonia led though Sweden to Gotland over Saaremaa (Őssel) to the Estonian mainland (Altoa 1997: 13). In her dissertation Kersti Markus has pointed out that the close connection in building tradition between Saaremaa, Jaern and Sweden. Gotland. One of the links in the 13th century was Cistercian monastery in Roma (Markus 1999: 219). It seems like the stoneworkers and other craftsmen from Gotland connected with the building activity continued to work in the Baltic region up to the end of the medieval period. After the death of Wolter von Plettenberg the building activity of the Livonian order collapsed and the craftsmen from Gotland had turned home or found new markets. On the home island there were probably few opportunities to get any work in the building-industry on the island since the later part of the 15th century had turned into long period of business depression. If the craftsmen still wanted to work with large scale buildings they had too look for new markets.

One such market was Scania where both capital resources and a demand for new buildings occurred after the wars in the first decades of the 16th century (Tuulise 1942: 393). In Scania a lot of building-material such as stone and timber was bought otherwise obtained in Gotland and moved to the castle Glimmingehus (Berggren 1999: 61). The similarities between Glimmingehus in Scania and Ahrensburg (Kurresaare) in Ösel, at least the stone-carvings, could bee explained by the mobility among the craftsmen from Gotland. The nobleman that ordered Glimmingehus to bee built (the admiral Jens Holgersen Ulfstand) was the governor over Gotland for at least 22 years from 1487–1509 (Wallin 1979: 39; Skansjö 1999: 21). Gotland was then since 1361 under Danish supervision.

When a new market for building-masters and craftsmen connected to building activity occur in Scania after 1530, their was already a well established net of contacts between the local nobility and the building organisation in Gotland. The "dark horses" among the Scandinavian castles with diagonal placed artillery towers is Steinlikholms outside Trondheim in Norway. The dating, 1524, is a bit to early to fit with the argumentation above. There is, at a first glance, obvious relations between Steinlikholms and the castle of Riga, as Tuulise pointed out in 1942 (Tuulise 1942: 393). There is however no known rational link in between the Norwegian castle and the Livonian order. Nordheis suggests that the archbishop obtained this special fortification idea from Italy, indirectly from Leonardo da Vinci is most likely. But there could still bee a connection to the Livonian order and Wolter von Plettenbergs rebuilding of the castle in Riga. Even if Leonardo was one of the renaissance periods important inventors he could still have got the inspirations to this type of fortifications from Livonia. During the last years of the order we can assume that several diplomats have had their way in both direction between the Pope and the grandmaster of the Livonian order. Some of them can actually have seen the new fortifications in Riga and even brought drawings or at least sketches to Rome.

A couple of decades after that the diagonally placed artillery towers has been exceeded by other fortification ideas in Scandinavia and in the Baltic, some of the nobility still provided their manors and castles with the same types of towers, but know it was to display and strengthen the buildings architectural appearance.