

Article

Mapping the Far Right: Geomedia in an Educational Response to Right-Wing Extremism

Thomas Jekel * , Michael Lehner and Robert Vogler 

Department of Geography and Geology & PLUS-School of Education, University of Salzburg, Salzburg 5020, Austria; michael.lehner@sbg.ac.at (M.L.); robert.vogler@sbg.ac.at (R.V.)

* Correspondence: Thomas.jekel@sbg.ac.at

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Abstract: Across Europe, and probably the world, messages of the extreme right surface with increasing and alarming regularity in both public and virtual space. Within the virtual space, geomedia are increasingly used in nationalist propaganda, a trend which is embedded in a wider development in public discourse, election results, and policies. In Austria and Germany, particular sensibilities due to the responsibility for the Holocaust have developed, leading to various specific education initiatives that address this part of history. This paper presents an activist learning environment using geomedia to deconstruct right-wing extremist discourses, and has been tested used in university settings in Salzburg and Vienna. Using a combination of Instagram and geospatial technologies not visible to learners, results of reflection and learning processes are analyzed qualitatively across two slightly different enactments of the learning environment. Experiences suggest an encouraging potential of geomedia use in critical learning processes, as long as the technology is hidden from learners, forming an incentive, support, and contextualization of the learning process.

Keywords: learning; geomedia; education; spatial citizenship; right-wing extremism

1. Introduction

Recent elections in the USA, France, Austria, and the Netherlands and the BREXIT referendum in the UK have one thing in common: a shift to the populist right, a tendency to (again) look for simple, if not simplistic, answers, a longing for strong leaders, discourses of “alternative facts”, and a retreat to nationalistic arguments [1,2]. Embedded in these discourses are quite a few notions that may be termed “extreme right”, that use symbols used in National Socialism, or at least codes that hint at this ideology in a version of hide and seek.

These symbols and codes are used in public space as well as in virtual space. While in many countries the use of these symbols and codes is not forbidden by law [3], Austria and Germany as the main perpetrators of the Holocaust have explicit legislation forbidding their use and hand down severe sentences for infringements [4]. For example, a man who flew a kite with Nazi symbols in Salzburg city was sentenced to two years in prison in early 2017 [5]. While this legislation and law enforcement have been criticized by the political right as infringing the right to free expression, one European court has ruled that this legislation is rightful and within the capabilities of the nation state [6], which may take action due to specific historic sensibilities (i.e., Germany and Austria being the main Nazi culprits of both the Holocaust and war crimes).

In this context, education that counters movements of neo-national-socialism and discourses akin to its ideologies is paramount. Initiatives in this area include visits to the historic places of the holocaust [7], to visits of contemporary witnesses to secondary schools to talk about their lives and experiences [8], a practice that will no longer be possible in the near future, for obvious reasons.

Much education, however, has a distinct teacher-centred structure, i.e., students have been on the receiving end of input-focused instruction. Only very recently have new approaches have been explored, using geomedia technology for increased interaction with historical places [9], or even deconstructing geomedia-based discourses of the extreme right [10,11]. In these cases, geomedia are either a guidance tool, or a set of Volunteered Geographic Information (VGI) [12] used in a political process, that is deconstructed.

Most of these education initiatives have centred on National Socialism in the past rather than on the extreme right-wing movements of the present. The potential transfer of the analysis to the present was left completely to the students. However, an analysis of the current discourses and communication structures of the far right seems paramount for educational and democratic reactions to the extreme right's present antihuman tendencies [13]. We discuss elements of these discourses in Section 2.1.

The current challenge, therefore, is to devise learning environments that address both the Nazi ideology and symbolism and the historical facts these point to, as well as the current incarnation of neo-Nazi thought and communication. The aim of the learning environment, therefore, is to make current far-right thought in the public sphere identifiable, intelligible, and criticisable.

The learning environment #notmysymbol presented and analysed in this paper combines these aims. Geomedia are used as a tool for students' research and for mapping current Nazi symbols in public space. Here, Geomedia are understood as all data collection, analyses and communication tools that have specific co-ordinates. Today, everyday geomedia are used mostly via mobile phones and other mobile devices.

Our contribution aims to address the following main topics: (a) identifying usable theories for students to apply in analysing extreme-right discourses with students using geomedia (Sections 2.1 and 2.2); (b) devising both pedagogical and technical solutions for mapping processes (Sections 2.3 and 3) supporting this analysis, and (c) exploring the learning processes fostered by the use of the learning environment through qualitative analysis of learners' reflections (Section 4).

2. Theoretical and Pedagogical Background

To make right-wing discourses in public space identifiable, intelligible and criticisable, students need to be made aware of a particular theoretical lens and be provided with a research method. These are discussed in the following sections and were translated pedagogically for classroom use using ideas from spatial citizenship and activist education.

2.1. Conceptions of Right Wing Extremism

The emergence of the new (extreme) political right has been discussed at length in a variety of scientific disciplines as well as in the public domain. Two main discourses are present in both domains, and readers can easily identify them in readers' discussions in online newspapers and other media of their choice. We take a structured approach and identify extremism theory and the syndrome approach [14,15].

The first prominent approach to right-wing extremism was proposed by extremism theorists such as Backes and Jesse [16] or Pfahl-Traughber [17] and adopted by the German Ministry of Constitutional Protection and the Interior [18]. In essence, the representatives of extremism theory distinguish between "extremists" who refuse the "values and rules of the game" of a democracy, and "democrats" [16]. "Extremism" thus encompasses phenomena such as "right-wing extremism", "left-wing extremism", "Islamism", "Eco-terrorism" and "radical feminism" [19]. In general, extremism theory, therefore, problematizes a perceived distance from the centre of society without really defining the centre itself. Measuring this distance, in consequence, is a dangerous empirical endeavour. At the same time, we may clearly note that the effects of these different "extremisms" are also vastly different: few deaths are reported from radical feminism or eco-terrorism; they follow different aims and use different discourses. Left-wing extremism—if Stalinism is subsumed into it—has accounted for numerous casualties. However, it is right-wing extremism that has developed the planned determination of

human life, and supported this through a very specific combination of anti-democratic, racist and anti-Semitic discourses. If we, thus, want to use a background theory to deconstruct the right-wing extremist discourses, we need a theory that is more closely related to the phenomenon itself.

For the conception of the geomedia-based learning environment #notmysymbol we, therefore, turned to a set of theories that define the phenomenon based on its characteristics. Austrian contributors to research (e.g., Schiedel [20]) base themselves on the conceptual understanding by Holzer [14,21]. According to Holzer [14], right-wing extremism is considered a “syndrome phenomenon”, understood as a bundle of features connected to one another [20,22]. These features include:

- The principle of nature/naturalness: everything unwanted is deprecated as “unnatural”. In addition, social and global inequalities and associated hierarchies are also naturalized and legitimated by this principle [14].
- “People and the people’s community” (“Volk und Volksgemeinschaft”): equipped with unchanging character traits that are even super-ordinated to the individual [14]. Thus, significance is gained by an individual through his or her obligation towards “the totality of the people” [23]. It may be noted that these totalities are also linked to naturalized absolute spaces.
- Ethnocentrism and -ethno-pluralism: with this concept, a desire for a “world-wide system of apartheid” is expressed along the lines of “Germany to the Germans”, “Turkey to the Turks”, etc. This principle features the same integrative and exclusionary functions as racism in the 1930s [14,23].
- Scapegoat function: groups such as “strangers”, academics, or politicians within established parties are being blamed for their alleged misdeeds. This principle becomes particularly accelerated when some socioeconomically and economically justified fears are projected onto enemy groups, allowing conspiracy theories to take the place of rational analyses [14,23].
- “Nationalizing historiography”: born from the view that the “German people” were superior; there is a tension present between guilt and glorification through the crimes committed in the name of this “people” under the Nazi regime. This tension may possibly be relieved through the trivialization or denial of these violent crimes [14,23].

The definition by Holzer [14] outlined above also points to the fact that on the extreme right, other processes are strongly argued, spatially. At the same time, the question may also be raised, in line with Lefebvre [24] and Paasi [25], as to the manner in which various social groups symbolize their regionalizations in public. A forbidden Nazi symbol, therefore, is not just to be seen as a symbol: it is an attempt at the appropriation of social space (or, in the case of social media, of virtual space).

For reasons of operationalization, the #notmysymbol initiative is based on legal texts in its first phase (mapping) [22], as it refers to “prohibited national socialist symbols” under Austrian law, and therefore activities “beyond the social rules of the centre”. This might lead to the conclusion that it was conceived following the theory of extremism. However, in the analysis of the social processes it clearly adopts the “syndrome phenomenon” approach to guide students’ research into the specific discourses.

2.2. The Social Geoweb and the Far Right

The social (geo-)web is characterized by the contribution of lay cartographers to geomedia [26] that has variously been called volunteered geographic information (VGI) or neogeography [12] and mainly describe data collection and communication by non-professionals. Such activities allow lay users to attach meaning to specific spaces. This may be the case for very mundane offerings like their shopping experiences or hotel ratings [27], which are of course interesting from an economic perspective.

In recent times, however, the extreme right has clearly taken into account the power of maps. Examples are the “Braune Karte” (“brown map” [28]) that localized refugee homes with the implicit intent of at least harassing refugees [10]. Currently, the “Einzelfallmap” (“singular instances map”) [29] claims to document foreigners’ crimes in Germany and Austria. The map has been discussed as an explicitly ideological propaganda instrument of the extreme right [11], adhering to almost

all dimensions of the Holzer definition [14] of right-wing extremism discussed above. A similar map “documented” Jewish institutions in Germany [30], which Jewish institutions interpreted as an encouragement to attack Jews.

On the other hand, there are maps that explicitly contest such right-wing propaganda maps. The HOAXmap is one of the more prominent examples [31]. Here, assumptions of right-wing extremist VGI maps are deconstructed using reliable media, trustworthy information sources, as well as police reports and court sentences, instead of rumours.

Generalizing from these few examples, we may conclude that maps play a crucial part in current political developments, having both social and legal consequences. This calls for an educational response that (a) is within the limits of human rights and the respective constitutions of the countries concerned; (b) deconstructs map-use by specific interest groups, and (c) allows students an activist response, using geomedial, to right-wing extremist tendencies.

2.3. Geomedial-Based Education: Spatial Thinking vs. Spatial Citizenship

Right from a very early phase of geomedial use in secondary education (when the technology itself was the main aim to use GIS-inclusion in the classroom), two major paradigms of “learning with geoinformation” in secondary education emerged. The first of these was termed “learning to think spatially”, which was defined as an ability across subjects to use absolute spatial thinking in terms of dimensions and scales, reasoning and communication [32]. The paradigm was prominently promoted by the GIS industry early on [33,34], and was also significantly supported within science education and from the perspective of the workforce market [35].

Critical statements have been advanced that claim a science and technology-centred approach used in spatial thinking. Instead they argue for geomedial use in secondary education from a societal perspective [36,37]. This second approach was termed education for spatial citizenship and based mainly on findings from two research directions: (a) the competence critical map reading following the insights of critical cartography [38,39], and (b) the ability the use of spatial representations within participatory settings, i.e., public participatory GIS (PPGIS) [40], where participants are enabled to use spatial representations in their argumentation to foster either individual or collective interests. The spatial citizenship approach was later supported by Elwood and Mitchell and Gordon et al. [41,42], as well as by Bednarz and Bednarz [33]. It re-centred the role of geomedial-based education on emancipatory aims and the formation of the political subject. It, therefore, follows an activist approach to geomedial-based education. Under activist education, we subsume enabling students to critically engage with their social surroundings, and handing them tools and methods to contribute to societal change [43]. The initiative and learning environment #notmysymbol is deeply rooted in spatial citizenship thought [22] not only in analysing social movements, but also in actively combatting or supporting these. #notmysymbol, thus, provides an example of activist approaches within education for spatial citizenship.

3. #Notmysymbol: Integration of Pedagogical and Technical Dimensions

Originally, the #notmysymbol initiative was not conceived as an educational environment but was developed as an activist approach by students to document Nazi symbols in the public space. The trigger was an incident on 4 November 2016, when two men flew a children’s kite with Nazi symbols in the city center of Salzburg [15]. The general idea was to provide the city administration of Salzburg, as well as law enforcement agencies, with data on symbols that are forbidden under Austrian law through a collaborative student mapping endeavour, forcing the authorities to act. Here, the activist conception comes to the fore. However, right from the start we kept educational perspectives in mind and were overwhelmed by the students’ response and learning processes.

3.1. Basic Model

The original goal of #notmysymbol was to collaboratively document and map forbidden Nazi symbols in public space, an aim based on a bottom-up public participation approach, i.e., a de-centralized data collection. The strategy behind this approach was that #notmysymbol, in an ideal situation, could serve as both a real-world civic engagement initiative and a learning environment. To facilitate both, the following considerations were identified:

- The task of identifying existing symbols using photos should be based on crowdsourcing principles and therefore allow for open and participatory collaboration. The aim was to enable as many participants as possible to contribute.
- The documented symbols, i.e., the photos of those symbols collected, should be georeferenced to enable a cartographic visualization of all identified items. This would enable reporting to public authorities (civic engagement) and include public social space in the learning environment.
- Due to the delicate nature of the initiative, the storing of a collection of illegal symbols on university-, school-, and/or private servers had to be avoided. The idea behind this demand was to avoid potential legal problems on an individual basis (i.e., for the people who contributed to the initiative).

Based on these requirements, it became fairly clear that the initiative should use a combination of social media, existing online services, cloud platforms and applications, which allow the necessary openness but which in addition, due to their terms of use, are subject to the principles of national law. As a consequence, the initiative opted to use popular social media platforms that allow both broad availability and, especially, visibility. Instagram was chosen as the platform to collect and publish the symbols found in public space. The reasons for choosing Instagram were:

- It is a very popular social media platform for publicly sharing photographs, and therefore allows for a wide visibility. In addition, it can also serve as multiplier for the initiative;
- An option to georeference uploaded photographs is already implemented;
- All photographs are stored on cloud services; and
- It is easy to filter all Instagram posts by a hashtag inquiry in real-time.

After researching already existing hashtags on Instagram, we decided to launch the new hashtag “#notmysymbol”. Anybody who wants to participate in the initiative can do so by photographing a symbol in its spatial setting using a common smartphone, with the geo-tagging function in the camera app enabled, and publicly posting the photo on Instagram in combination with the hash-tag “#notmysymbol” and a disagreement comment.

All related Instagram posts can be accessed by a hashtag filter (in this case #notmysymbol). This allows for easy and up-to-date documentation and analysis of all collected symbols. In addition, it is possible to geovisualize them in real time using the ESRI GeoEvent Processing extension and the geo-tags of the posts [44]. The generated real-time feature service can be visualized in an ArcGIS Online webmap. They can also be embedded in a custom-designed StoryMap showing the overall results of the initiative for future documentation and communication.

At the same time, it is possible to address and transfer this topic to various (post-)secondary educational settings. Any teacher can participate in the initiative and use it in his/her lessons without the need to prepare a background infrastructure: the lesson(s) can focus on the symbol collection using everyday technology, the reflection of the mapping and documentation process and the emergence of the symbols themselves, and communicating the traces [45], including via cartographic visualization. This is in line with the three competence domains addressed in the “spatial citizenship” approach [36].

3.2. Two Differing Implementations of the Basic Model

The basic ideas described in Section 3.1 and Figure 1 were implemented in two settings that differed in terms both of the participants and of the structure of the learning environment itself (see Figure 2):

1. The first implementation was effected in Salzburg with a cohort of 79 first-semester students enrolled in initial teacher training for geography and economics. They were typically aged 18–21, but a few participants were slightly older. The mapping was embedded in an introductory course on geography education. This group was therefore close to a secondary education group, the students having no deeper education in scientific geography and/or cartography (they were 1.5 months into their studies).

The modality was a fairly simple mapping task (finding symbols, documenting them with mobile phone cameras, and publishing them on Instagram with the compulsory hashtag #notmysymbol). Students were provided with a simple technical online tutorial. In addition, they were asked a set of questions [15] to document their strategies for finding symbols, their feelings during the mapping process, as well as the meanings they thought were applicable when looking at the symbols [22].

In case of the first group, the timing of the mapping process coincided with the final stages of the run-off in the Austrian presidential election campaign between the now elected president Alexander van der Bellen of the Green Party and the nationalist Norbert Hofer (November/December 2016). During this period, increasing numbers of right-wing-extremist discourse structures in social media have been documented by Fuchs 2016 [46], and the political atmosphere could be described as heated.

2. The second implementation took place in Vienna in March and April 2017 with a group of 23 students in the latter stages of their initial teacher training. In contrast to the first implementation, no heated local political argument was present at the time of the mapping process. Several of these students were aware of the traces paradigm [45], which aims to link artefacts in public space to a preceding human action by interpretation. Some had even used it in real-world school settings. In addition, students had knowledge of concepts of the social constructedness of space. The mapping process was embedded in a lecture on spatial citizenship.

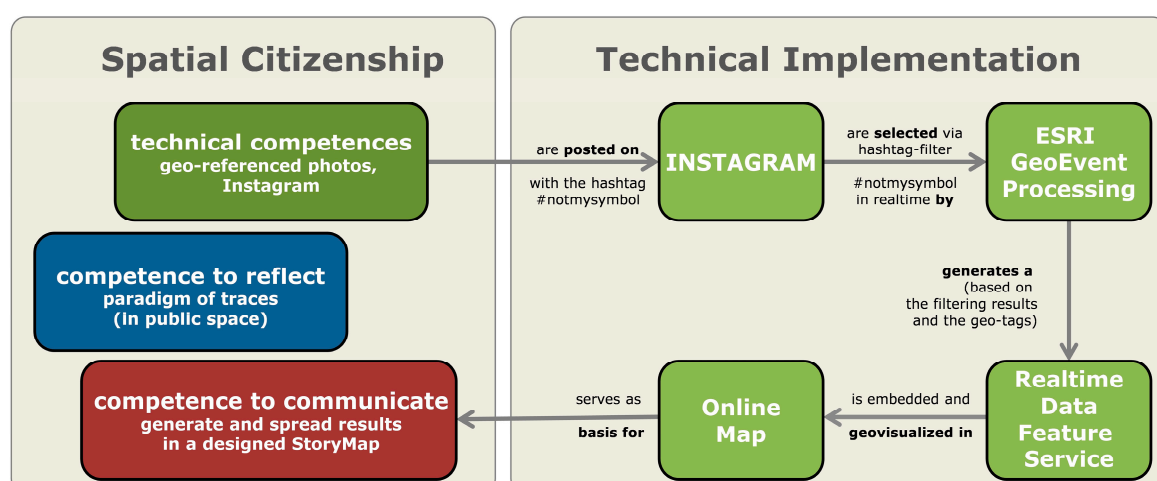


Figure 1. Basic model for spatial citizenship and technical implementation in #notmysymbol (from: [22], Austrian Academy of Sciences Press, CC BY-ND 4.0).

The learning environment was designed as in the Salzburg example initially, but after the reflection on individual mappings, it also included a specific input on the Holzer definition of right-wing

extremism [14,23], which was provided both in a presentation and on paper. The Holzer definition was then used as a framework to analyse the online-discussion forum of an Austrian newspaper regarding occurrences of discourse structures.

The two different learning environments of #notmysymbol did not actually ask for specific GI(S) skills to be learned. The approaches used geomedia to support learning processes on topics that are sensitive in specific societies, on topics that are hidden, either consciously or subconsciously. The main question, therefore, was whether the learning environment enabled the participants to reflect on specific conditions in society, and whether it would allow students to become politically involved and active. The data presented and interpreted in the following section was gathered from the mapping reports produced by students, as well as from discussions in class that were documented by the authors.

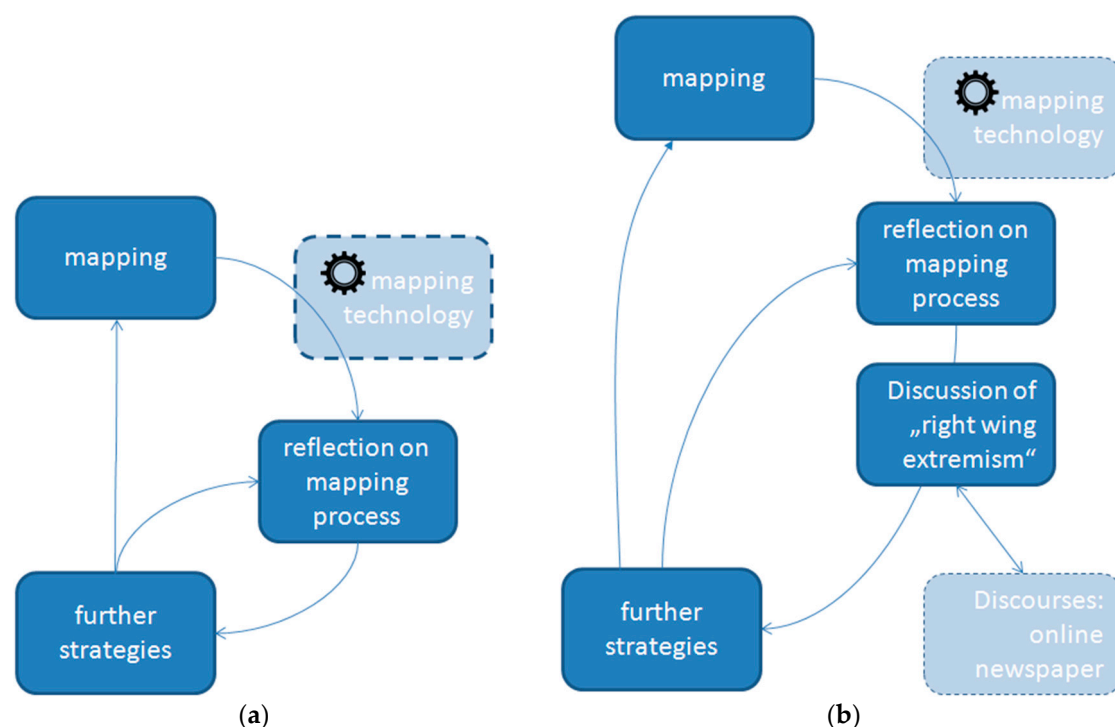


Figure 2. Differing implementations: (a) Implementation in Salzburg autumn 2016; and (b) implementation in Vienna spring 2017 (own diagram).

4. Experiences

The students' reflections on their mapping process were collected through the learning management systems of the respective universities (blackboard, Moodle). Providing individual reflections was a compulsory part of the courses. A variety of further data was collected through emails to the lecturer/tutor and personal communication with both students and stakeholders at the university. Quotes here are a selection referring to aspects of the underlying pedagogical concept of spatial citizenship education. At the same time, in its exploratory and iterative nature, the approach and redevelopment of the learning environment through different implementations may be likened to design based research [47].

Due to the different structure of the two implementations, we will present and describe the results separately, with the focus on the characteristic features of each case.

4.1. The First Implementation in Salzburg

The Salzburg implementation was much simpler regarding content and design; students' learning processes were expected to be mainly in the field of mapping and reflection on their own mapping routines. Several students noted that they were perhaps intimidated by carrying out the mapping action in the public space itself:

"When photographing the symbols I felt decidedly ill at ease. I stood with my mobile in front of a symbol, and the looks of passersby seemed to pierce and condemn me [. . .]. What would happen, if someone approached me? I would try to explain the project in any case. What would happen if anyone from the [Neo-Nazi] scene watched and threatened me? I definitely felt very uncomfortable and insecure in specific places in Salzburg while looking for and documenting symbols."

comment by a student, female (authors' translation)

Thus while documenting Nazi symbols in a heated political atmosphere, they could be (wrongly) seen as supporters of the Nazi ideology, or as in opposition to it and, therefore, be vulnerable to violent attacks by neo-Nazi proponents. Within the course, this led to a discussion of the imagined or real dangers of places, and of the differences between the legal and individual statuses of places.

Other students were afraid of the digital traces in their virtual curriculum vitae, and asked the authors to upload their geo-referenced images. Students clearly learned that an activist's "mapping of the forbidden" in a world of (geo-)social media implied a variety of individual risks and, therefore, responsibilities.

As well as these fears, students also experienced difficulties actually finding these symbols in public space. They developed specific individual search strategies (concerning, for example, surface materials used, and social setups of specific neighborhoods as a guide for where to look for symbols). This process included the reversal of assumptions on which search strategies were based:

"I started my search in Lehen [a less well-respected quarter of the city of Salzburg; authors' note], as I thought there would be lots of symbols due to the diverse ethnic setup of the neighbourhood. I was only successful on my way back to the city center."

comment by a student, female (authors' translation)

These reports clearly indicate that the learning environment was successful in showing students how their individual decisions led to specific perceptions in the mapping process, and to differing results when documenting the purely physical dimension of Nazi symbols.

At the same time, students also documented their insecurities when interpreting the actual symbol found, as seen in the following comments:

"I was quite impressed by the diversity of impressions I faced on my daily way to the University. I found graffiti which were hardly decodable, and stickers of bands and football teams with political statements".

comment by a student, female (authors' translation)

"I found a devil which was giving a Hitler salute, which is definitely a matter of the Prohibition Act. I also found writings which displayed the word "Nazi". I wasn't quite sure whether the word is already forbidden, so I researched the prohibited national socialist symbols".

comment by a student, male (authors' translation)

These comments on insecurities drew our attention to two facts: (a) students developed a very specific and scrutinizing view of their everyday environment instead of their usual fleeting glance; (b) students became aware of difficulties of interpretation. The individual research process mentioned in the last comment led the student back to the Austrian Law Information database (RIS), for a wider comprehension of the laws involved which are part of the Austrian constitution. We consider this an encouraging effect of the learning environment.

There were also difficulties regarding the authorship of the symbols—had the symbols been left by neo-Nazis, or by left-wing people actively demonstrating against the ideology (for example, by putting Swastikas on campaign material of the nationalist candidate)?

However, an increased political awareness was definitively noticeable even in this first iteration of the project, as testified in a student's comment:

"It was quite a positive experience for me. The process of searching for such symbols broadened my horizon, and I think from now on I will walk the city with my eyes more widely open. If I find national-socialist symbols in the future, I will definitely report them to the authorities".

comment by a student, male (authors' translation)

The last quotation clearly hints at the possibility of fostering activism in learners, be that as simple as cooperating with the authorities to enforce laws and the constitution.

In general, this first implementation (see Figure 3 for the results on the example of the inner city of Salzburg, Austria) was more successful than expected with regards to the reflection on the mapping process and interpretation of individual results. However, what the simple mapping endeavour lacked was the underpinning of the mapping process with relevant theory, and the link into everyday communication within social media.

#Notmysymbol - aktuellste Bilder

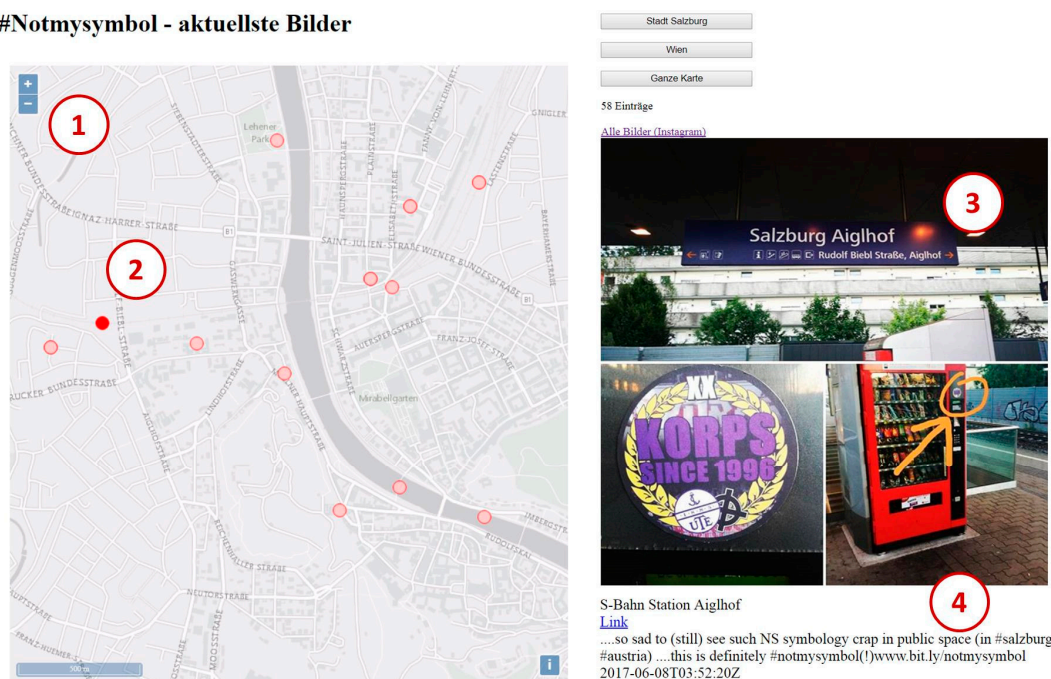


Figure 3. Results of the collaborative mapping-process on the example of the inner city of Salzburg (Austria) displayed on a mapping application prototype: (1) delivering a map interface including all collected symbols, (2) highlighting the selected post, (3) showing the photo of the selected post uploaded to Instagram, and (4) delivering the location, the direct link to the original Instagram post and embedding the comment added to the Instagram post by the uploading user (screenshot from the mapping application prototype: [48]).

4.2. The Second Implementation in Vienna

As described above, the implementation in Vienna in spring 2017 widened the concept of the learning environment by including a theoretical input on right-wing extremism, as well as a link to non-geo-social media. The latter was added as we expected right-wing extremism to be much more prevalent in these virtual spheres than in physical public space.

The results of and reflections on the mapping process showed very similar patterns to those found in the Salzburg example with regards to students' fears, uncertainties regarding interpretation and political aspirations of the symbols' authors. However, with the link to a public online discussion forum, students became much more aware of the spatial structure of arguments within everyday political argumentation. In the discussion forum of *DerStandard*, an Austrian newspaper, students could readily identify arguments that were in line with Holzer's definition of right-wing extremism.

An exemplary contribution, summing up and representative of many others, was posted by a user named "Sk3ptiker" on 11 April 2017, 14:01:52 in a post regarding an article about the Stockholm terrorist attack:

"If I read the names [of the terrorists], these are all not European names. I suppose that their lifestyle and the lifestyle of their families and their social environment are linked to their names.

This ideology, lifestyle and approach come exactly from the place which one would expect, this is consistent. If he grows up here or there does not play a major role. Actually it just emphasizes even more that there are problems with people from these regions. Even parents who have lived in secure and economically strong countries for a long time still educate extremists. This is a problem we do not have with our western lower classes in this way, even if they are not very well educated either" [49] (authors' translation).

Within this statement, students found most of Holzer's dimensions of right-wing extremism: a "to our own people" attitude; the assumption of a natural link between culture and space, i.e., the naturalness of individuals' characters; an ethnocentric discourse; and a scapegoat function for specific groups of population. Looking even more closely at this discussion forum, students were surprised how many comments included at least one dimension of right-wing extremism. It is this idea—linking mapping results back to both social theory and public discourses—that makes the use of geomedial mapping particularly worthwhile in our experience. This clearly points towards a two-pronged strategy: first mapping, documentation, and communication using geomedial, then a (basic) discourse analysis that looks behind the structure of those arguments to get at the reasons for the artefacts being mapped.

Summing up from our documented experiences, we suggest students learned a wide variety of ideas and geographical concepts through this educational activity. This includes, but is not limited to:

- the acquisition of basic lay mapping activities, and how their strategies in mapping and interpretations of collected data could be critically reflected;
- they developed a sense of place in terms of 'feeling' the risks of mapping, as well as opening their eyes to seemingly minor phenomena, changing their appropriation of space; and
- they understood that research may, and should be, centred around changing current implicit or explicit rules through (spatial) communication of results.

These findings can be directly linked to the dimensions of the spatial citizenship approach. Beyond this, we also suggest that the learning environment also contributed to individual research into laws and current political movements; and the collaborative nature of the mapping also led to the pooling of knowledge for interpretation.

5. Conclusions: The Role of Geomedia in Secondary Education

Based on the insights and experiences outlined above, we may draw a few conclusions that are relevant both theories regarding geomedia-based education in general and for the role geomedia plays in these specific learning environments.

With respect to the spatial citizenship concept [36,41], it has been shown that geomedia have the potential to promote an activist citizenship approach in education. This is true for the dimensions of reflexivity and reflection on representations of space. The learners widely discussed their own appreciation and criticisms of the geomedia produced in the mapping process, as well as the possibilities of individual benefits and risks for themselves. The second implementation especially can also be deemed successful in making learners aware that “another politics is possible” [42]. We also support the statement that similar learning environments can therefore be used to foster the establishment of the political subject [41]. The current initiative is mainly an educational endeavour. With its cartographic backend and addressed at law enforcement institutions, the learning environment can also be considered a form of service learning [50,51], albeit from an emancipatory angle.

We consider the general structure and design of the learning environment transferable, with minor changes, to other topics: whether you want to map sexualized public spaces, the symbols arguing for the legalization of drugs, or offerings of sub-cultures in public space, for example, the general structure could be the same. #notmysymbol could, however, relate to a very specific set of laws that are different from those that concern what may simply be termed vandalism in public space.

Looking at the role geomedia have in this learning process, we may conclude that their strong point is remoteness from the learners’ activities. This seeming contradiction is based on a few important thoughts linked to secondary education practice, which makes the use of full-fledged GIS in the classroom less than probable. Obstacles to using GIS to its full potential include software costs, teachers’ lack of proficiency with the software, and inadequate school equipment and internal organization [52,53]. At the same time, sensitive topics are usually not welcome on local school servers. This is why solutions that use large platforms such as Instagram and open mapping platforms are especially useful.

The invisibility of the GIS to both students and teachers does not detract from its importance. Geomedia here act as a motivation to contribute to a societal cause, as a context for organizing mapping strategies, as a place for the integration of data, and as a communication platform. Coincidentally, this is very much what Vogler et al. [54] called for when redefining learning with GIS as ‘Spatially-Enabled Learning Across Subject’ (SELTAS). We consider this route to learning (with) GI(S) most promising.

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