The Cartographic Propositions of Raumforschung und Raumordnung, 1936-1955: from Territorial Expansion to Defeat and Division

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Abstract
This paper examines shifts in the design of, use of and rhetoric accompanying maps published in the periodical Raumforschung und Raumordnung from 1936 through 1955. In the discussion of these maps published prior to and during the Second World War, special attention is paid to the depiction of the German Empire, the incorporation of Austria into maps of the Third Reich, and cartographic portrayals of Poland and other eastern European territory. Particularly in-depth investigation into articles and maps written and drawn by Reinhold Niemeyer and Rudolf Hoffmann is also undertaken here. In evaluating the maps published in Raumforschung und Raumordnung after Germany’s defeat, this paper focuses on depictions of the new Federal Republic of Germany and the mapping of its relationship, geographically, to the German Democratic Republic. While the content of the maps published in RuR reflected the territorial reality of its German cartographers and authors – from violent expansionism to defeat, territorial diminution and a split into two distinct nation states –, this paper argues that many of the cartographic strategies employed in its pages remained relatively consistent over time.

Keywords: Raumforschung und Raumordnung • History of cartography • Lebensraum • Reinhold Niemeyer • Rudolf Hoffmann

Die kartographischen Aussagen von Raumforschung und Raumordnung 1936-1955: von der territorialen Ausdehnung zu Niederlage und Teilung

Zusammenfassung
Dieser Beitrag untersucht die Veränderungen in der Gestaltung, Verwendung und Rhetorik der in der Zeitschrift Raumforschung und Raumordnung von 1936 bis 1955 veröffentlichten Karten. Bei der Erörterung dieser Karten vor und während des Zweiten Weltkriegs wird besonderes Augenmerk auf die Darstellung des Deutschen Reiches, die Einbeziehung Österreichs in die Karten des Dritten Reiches und die kartographische Darstellung Polens und anderer osteuropäischer Gebiete gelegt. Besonders intensiv werden hier auch die von Reinhold Niemeyer und Rudolf Hoffmann verfassten und gezeichneten Artikel und Karten analysiert. Bei der Auswertung der nach der Niederlage Deutschlands in Raumforschung und Raumordnung veröffentlichten Karten liegt der Schwerpunkt auf der Darstellung der neuen Bundesrepublik Deutschland und der Kartierung ihres geographischen Verhältnisses zur Deutschen Demokratischen Republik. Während der Inhalt der in Raumforschung und Raumordnung (RuR) veröffentlichten Karten die territoriale Realität der deutschen Kartographen und Autoren widerspiegelt – vom gewaltsamen Expansionismus über die Niederlage und die territoriale Verkleinerung bis hin zur Aufspaltung in zwei verschiedene Nationalstaaten –, wird in diesem Beitrag die These vertreten, dass viele der in den Kartenblättern angewandten kartographischen Strategien im Laufe der Zeit relativ konstant blieben.

Schlüsselwörter: Raumforschung und Raumordnung • Historische Kartographie • Lebensraum • Reinhold Niemeyer • Rudolf Hoffmann
1 Introduction

In February 1942, Budapest’s Palace of Art hosted a German exhibition titled “Autobahn und Wasserstraßen”. Organized by Fritz Todt, chief engineer of the Autobahn and the Third Reich’s first Minister of Armaments and Munitions (Milward 2015: 57–58), the exhibition’s displays focused on several areas of interest for both the Germans presenting the material and the Hungarians viewing it: the Danube River as a pan-European waterway, intra-European traffic patterns, and hydraulic engineering and shipping in Hungary. One of the civil servants tasked with preparing “Autobahn und Wasserstraßen” was Rudolf Hoffmann. During the initial stages of setting up the exhibition, Hoffmann became concerned that the importance of what the Germans were proposing would be lost on the audience. Perhaps they would fail to recognize the Nazi war effort – well underway by 1942 – as an important step toward replacing the old European order with something new and better. Perhaps they would fail to understand that European connectedness...
and a fundamental shift away from reliance on maritime transportation were the prerequisites for the new potential regime of rail, water and motorway consolidation on display in Budapest (Hoffmann 1942: n.p.). To make all of this clearer, Hoffmann designed some maps.

The maps produced, as described by Hoffmann (1942: n.p.), projected two very different European continents to the Palace of Art’s attendees. The first – *Das alte Europa: Zerrissen und abhängig von England* (see Fig. 1) – depicts an “old Europe” that is “torn apart and dependent on England”. According to Hoffmann, a plaque accompanying this map pointed out “Old Europe’s” heavy reliance on sea travel and lack of land-based traffic. Hoffmann chose to colour the various European nation states in a variety of hues, a decision meant to emphasize their differences and disagreements. The Soviet Union was very deliberately cut off from the rest of Europe, as well. This map projects a Europe that is inefficient, chaotic and under the imperial control of a once-great maritime power.

Hoffmann’s second map – *Das neue Europa: ein freier Organismus* (see Fig. 2) – shows its audience a European cartographic order far superior to its “old” counterpart. Here, the “new Europe” is “a free organism” with shipping and traffic patterns connecting all the people and nations of Europe to one another. There is no differentiation in colour between any of the nation states, and an eastern German border is conspicuously absent. Hoffmann attached a plaque to this map as well, using it to explain that, in this new Europe, continental routes – railways, waterways and highways – would carry the bulk of traffic.

In his retelling of this exhibit in the pages of *Raumforschung und Raumordnung* (*RuR*), Hoffmann brags about the popularity of both the exhibition as a whole, and these...
maps in particular. Indeed, “Autobahn und Wasserstraßen” was largely seen as a successful exhibition – so successful that it was recreated in several other eastern European cities throughout 1942 and 1943, including Belgrade, Sofia and Bucharest (Kerschner 1944: 372; for more information about the exhibition in Bucharest, in particular, see Gruber 1943: 3–4). These maps are also an excellent example of how Germans interested in area research – and, specifically, contributors to RuR – understood the relationship between cartography and their national identity. The presentation of an ever-evolving Greater Germany, with flexible borders and an eye toward territorial expansion, dominates the maps of the RuR from the publication of its first edition through the Second World War. After the defeat of the Third Reich and the partitioning of Germany, a new territorial order required the re-creation of the German national map. Hoffmann, in fact, would contribute some of the first articulations of this new map in the pages of RuR – eleven years after presenting his *alte/neue Europas* in Budapest. As discussed at length below, Hoffmann’s maps, and many of the maps in RuR, reflect the context of Germany’s territorial reality: a reality that rapidly shifted from expansionism before and during the Second World War, to cartographic confusion in the immediate post-war years, and finally, by the mid-1950s, to a solidification of German territory into two separate and distinct nation states.

2 Maps in Raumforschung und Raumordnung: by the Numbers

This paper focuses on how maps were utilized by the authors and cartographers who published work in Raumforschung und Raumordnung from its initial October 1936 edition through 1955. Originally established by the Nazi agronomist Konrad Meyer, RuR was meant to serve as...
a primary publication of the Reichsarbeitsgemeinschaft für Raumforschung (the Reich Association for Spatial Research, or RAG). Created in December 1935 with Konrad Meyer as its founding director, the RAG was committed to coordinating spatial research among the academic faculty in Nazi Germany so as to contribute to the centralized planning efforts of the Third Reich (Rössler 1987: 179–181). The material published in RuR did not always necessarily promote National Socialism, but the journal very clearly pitched itself to potential readers and contributors as a forum for Nazi ideas.1

While illustrations, graphs and (often aerial) photographs fill the pages of RuR, attention here will not primarily be paid to geographic depictions that fail to incorporate what Monmonier (1996: 5) identifies as the “three basic attributes” of maps: namely “scale, projection, and symbolization”. Adopting this understanding of a map, however,

1 The first edition of the first volume of RuR opens with a signed endorsement by Bernhard Rust, Nazi Germany’s Minister of Science, Education and National Culture, in which he claims that spatial research and planning invariably lead to questions about “Blut und Boden, Volk und Raum” – “core questions of National Socialism”; see the cover page of Raumforschung und Raumordnung 1, 1 (October 1936). For a broad breakdown of ideological trends engaged with by the early contributors to RuR, see Strubelt (2009).
still leaves an incredible number of images to evaluate and assess. From the publication of its first volume through to the release of its thirteenth, the writers and editors of RuR included no fewer than 956 maps among their various editorials, academic articles, book reviews and featured essays (see Table A in online supplementary material for a detailed listing of the number of maps, by edition/date). These maps were authored by a variety of individuals and institutions, helpfully listed at the end of many RuR volumes by thematic category (along with the corresponding volume, edition and page number for each map). Typically, when utilizing a map from an outside source in an article, the author cited the source relied upon directly underneath the map used. Otherwise, as confirmed by the end-of-volume map listings, the editors of RuR attributed maps published in the journal to the author submitting the material for publication. As noted below, especially in the discussion of Reinhard Niemeyer, these attributions can sometimes be misleading.

Fig. 3 depicts the number of maps included in editions of RuR by year. One of the most obvious and immediate data points made clear by this visualization is the steep decline in the number of maps produced by RuR through the final years of the Second World War. In fact, by early 1944, the Reichsarbeitsgemeinschaft für Raumforschung (RAG) – that is, again, the organization responsible for editing and publishing the RuR – halted publication of the journal due to wartime destruction and the scarcity of available paper. After the war, publication resumed intermittently, with editions released in 1948 and 1950, but not 1949, 1951 or 1952. Regular publication began again in 1953. All of these changes, of course, influenced the number of maps published by RuR.

**Figure 8. Wilhelm Fischer: Die Planungsräume für die Reichs- und Landesplanung**

Source: Fischer (1938: 228), no scale given
Fig. 3 is somewhat misleading, however. While the number of maps included in each edition of RuR appears to peak in 1941 and then seems to nosedive in tandem with Nazi Germany’s diminishing military prowess thereafter, map production – relative to the number of pages in each edition of RuR – actually continued to increase after 1941. Fig. 4 shows the rate of maps produced peaking in 1943, the final full year of RuR’s publication before German defeat. Interesting, as well, is the decrease in both the raw number of maps produced, and the rate of maps produced, from 1939 to 1940. This suggests that there is no direct and constant correlation between the successes or failures of the Wehrmacht (which was doing quite well, of course, from the autumn of 1939 through to the summer of 1940) and RuR’s production of maps. While Fig. 4 makes clear the increased publication of maps during the Second World War, that rate recovers fairly well after RuR’s return in the 1950s. By 1954 and 1955, the percentage of maps included in those years’ editions is greater than those printed in the 1940 volume. That being said, even if the rate of map publication did not always mirror the goings-on of the Nazi war effort, the journal’s cartographic rhetoric certainly did.

3 Maps of Territorial Expansion

Emblazoned across the cover of Raumforschung und Raumordnung’s March 1938 edition are the words, “Österreich ist ein Land des deutschen Reiches” (see Fig. 5). Underneath this triumphant announcement is a map
From the March 1938 Anschluss onward, the island-style mapping of a greater German empire is still routinely employed, but with Austria being cartographically integrated into the larger German whole to varying degrees. In Fig. 7, for example (so, in the same edition as Fig. 5), Austria is presented as both a part of Germany and as still somewhat separate, or different, from the traditional German states.

In later 1938 editions of RuR, Germany is still occasionally presented as it was before the Anschluss (see Fig. 8). Sometimes, depending on the argument or information being presented by the cartographer, the German Empire is presented as completely including Austria (see Fig. 9), and also not including Austria (see Fig. 10), within the same journal article.

Interestingly, as Nazi Germany became more aggressive in its foreign policy throughout 1939 and 1940, maps of the German Empire are featured less and less frequently in the pages of RuR. In fact, while a map of the German empire – usually with very clear imperial borders – is featured on at least sixty-five occasions (or, 23% of the maps published) in RuR editions from the summer of 1937 through the summer of 1939, only seven maps (3% of the maps published) feature a German Reich from August/September of 1939 through the summer of 1941. In those seven maps, often, attempts are made by their respective cartographers to show the fluidity and potential expansion of imperial borders. See, for example, Figs. 2, 11, 12 and 13.

This is in stark contrast to maps made prior to the summer of 1939, which had much stronger, less flexible boundary lines – even when portraying potential territorial expansion (see, for example, Figs. 14, 15 and 16).

The inability of RuR contributors to offer a uniform articulation of a German map is unsurprising; mapping Germany has been problematic since the inception of Germany as a national idea. German assertions of control over Mitteleuropa date back to the 1848 revolutions and reached a fever pitch after the defeat of the Central powers in the First World War (Mingus 2017: 3). From the interwar period through the Third Reich, Germany’s territorial positioning allowed its citizens to understand their nation state, simultaneously, as both the dominant power in central Europe and as a victim of geographic circumstance. Depending on what was more convenient for any given political narrative, Germany could be described as a territory with ill-defined borders arbitrarily drawn by its enemies along the European continent’s periphery, or it could be portrayed as the only territory that could possibly produce a Volks capable of saving and unifying Europe (Schultz 2002: 354–355). Moreover, from 1938 through to the end of the Second World War, the Nazi government of Germany was in the process of planning and building a new Reich, territorially. It makes sense that RuR and other publications with ties to the Nazi

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2 While the authorship of this map is not formally attributed, it was likely created by the German demographer and statistician Kurt Horstmann. This map directly precedes an article written by Horstmann and includes maps attributed to him that share a very similar style to the one presented here.

3 For a great example of this from the 19th century, and how the creation of a national map can contribute to the creation of a national community, see, in particular, the cartographic “pearl” of Switzerland in Gugerli and Speich (2002: 99–101).
regime would fail to offer their readers an unambiguous proposition of a mapped Germany. Cartographic ambiguity has often served as a useful strategy when remapping a new or altered nation state over the traditional boundary lines that previously divided Europe (Gugerli/Speich 2002: 100–101).

As the German military prepared to invade Poland in September 1939, so too did the editors and authors of Raumforschung und Raumordnung prepare images of Poland for academic dissemination. Indeed, Konrad Meyer, who remained editor of RuR through the July 1939 edition, was, already in 1938, charged with running the Planning and Soil Department of the Reichskommissariat für die Festigung deutschen Volkstums (the Reich Commission for German Resettlement and Population Policy). This brought him into close contact with Heinrich Himmler and, eventually, Generalplan Ost – the secret planning of German colonization in the Polish territories occupied by the Nazi regime. By the spring of 1941, Himmler appointed Meyer as one of the principal contributors to Generalplan Ost and, after the invasion of the Soviet Union in the summer of 1941, the subsequent planning of other eastern European territories (Barnes 2015: 195–196). Many geographers worked for Meyer on Generalplan Ost, (literally) plotting the Germanization of eastern Europe and the displacement (as well as, often, the murder) of the Slavs, Roma and Jews living there prior to Nazi occupation (Rössler 1987: 187). It seems almost predictable, then, that the focus of RuR would shift eastward as academics directly involved in its publication became more heavily entrenched in the very real application of Nazi Lebensraum policy.
Maps of Poland and historically contentious borderland territory – notably, Silesia and the (at the time, German) cities of Breslau and Oppeln – were the focus of the August/September 1939 edition of RuR. Cartography was used, for example, to bolster the claims of Herbert Knothe’s article “Der schlesische Raum und seine Gliederung” (“The Silesian Area and Its Structure”) (Knothe 1939). Above the article is a series of four small maps designed by the German geography professor Gustav Braun (see Fig. 17). The maps depict a Silesian territory that, since the 16th century, has remained largely static, relative to its regional neighbours. Whether bordering the Habsburg kingdom of Bohemia to its southwest, Friedrich Wilhelm II’s kingdom of Prussia to the northeast, the Weimar Republic to its northwest, or Hitler’s Third Reich along its western border, Silesia is depicted as a region that has been distinctly influenced by German-ness throughout modern history. This, of course, is an oversimplification of Silesian territorial history, but one with the clear intention of portraying Silesia as something separate from Poland, historically and geographically.

In this same August/September 1939 edition, Egon Freiherr von Eickstedt published a study of race in Silesia titled “Rassen im schlesischen Raum” (“Races in the Silesian Area”) (von Eickstedt 1939). Von Eickstedt, who – in 1939 – was the director of the Institute of Anthropology and Ethnography at the University of Breslau, had undertaken a study (funded by the Deutsche Forschungsgemeinschaft) in the 1930s to “prove the predominantly ‘Nordic’ character of [Silesia’s] population” (Klautke 2007: 28). Von Eickstedt developed a “race formula” which he claimed scientifically and objectively categorized Silesians into different races, and the majority of people living along this German/Polish borderland were, according to von Eickstedt, German (Klautke 2007: 35). His article in Raumforschung und Raumordnung focuses on this same racial question, and includes several maps to help prod the readers of RuR into accepting his conclusions. In Fig. 18 we see a map of Upper...
Silesia that uses different degrees of cartographic shading to show the density of the “Nordic race” across the region. The western parts of Upper Silesia, according to von Eickstedt’s cartography, contain more ethnic Germans than the eastern parts. Drilling down to the more local level, Fig. 19 presents a series of maps depicting race in the Neustadt district. The top map, in a sort of choropleth style, points out the population density of “Nordic” peoples, while the bottom map depicts the distribution of Neustadt’s “Dinaric”, or southeastern European, population. In-between these maps is another map showing traditional open spaces for potential German settlement. Von Eickstedt is obviously asking the reader to compare the densities of each population with these open spaces.

The final three maps in von Eickstedt’s article are the only maps in which he acknowledges the assistance of another mapmaker (see Figs. 20 and 21). Ilse Schwidetzky, a student of von Eickstedt, drew these maps of the Oppeln, Kreuzburg, Rosenberg and Guttentag districts, outlining – through a variety of methods – each district’s racial makeup with an eye toward German colonization (made most explicit in the Oppeln district map).

Even before the August/September 1939 issue, though, contributors to Raumforschung und Raumordnung had routinely attempted to justify German claims to eastern European territory. One of the more interesting of these contributors was Reinhold Niemeyer. An urban planner with a particular interest in traffic patterns, Niemeyer contributed three featured articles to RuR: one focused on the eastern German city of Frankfurt an der Oder (Niemeyer 1937), one discussed traffic in eastern Germany (Niemeyer 1939), and a final essay that studied German expansion into eastern Europe (Niemeyer 1940). Niemeyer’s publications in RuR are a fascinating case study for two reasons. First, despite focusing – broadly – on the same geographic area, one can see

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* For more on Niemeyer’s urban planning career, see Diefendorf (2011), for more on his work involving city traffic, see Diefendorf (2014).
interesting shifts in his cartographic choices from his first article in 1937 through to his final 1940 article. Secondly, he regularly appeals to the territorial history of Germany to justify German boundaries and/or expansion, mirroring the emphasis placed by Nazi leadership on earlier German empires.5

Niemeyer’s first article, “Frankfurt a. d. Oder und seine Aufgabe im Rahmen ostdeutscher Landesplanung” (“Frankfurt on the Oder and Its Function in the Context of East German State Planning”), was published in August 1937. It includes eleven maps. Most of these maps deal with relatively benign or seemingly scientific subjects: traffic, water management, rail lines, etc. But Niemeyer also includes several historical maps meant to help justify potential German claims to chunks of eastern Europe and solidify Frankfurt an der Oder as an eastern hub of German-ness. Fig. 22, a map attributed to the Nazi publisher “Volk und Reich”, shows Frankfurt as a Hanseatic city along the “Hauptwege

5 One historian has, in fact, recently argued that “the Middle Ages lay at the heart of the Nazis’ self-conception” (Diebold 2019: 105). We should be careful, though, not to attribute every concept/term utilized by the Nazis to the interest of their leadership in the Middle Ages. For more on how problematic that can be, see Maier (2019).
Niemeyer goes on to discuss German colonization of eastern territories as having been most effective during two distinct periods: the (somewhat ambiguous time period of the) Middle Ages and the era of Friedrich the Great. He argues that in both situations, the geopolitically driving force of German settlement and cultural expansion was the “north-east German funnel” (the epicentre of which was Frankfurt an der Oder). German-ness, then, spread along the Oder River in the northeast and through the Pomeranian-East Prussian watershed in the southeast. Niemeyer claims that German settlement and expansion between these “two large wings” was hampered by the swamp areas surrounding the Warta River. He uses a map showing the expansion of German municipal law codes (Fig. 23) to hammer home this point. For Niemeyer, the most effective and peaceful way to exert influence over eastern European territories is through the maintenance and dissemination of German culture and the German legal framework. He believes precedent for this was set by how effectively Maria Theresa and the Austrian government encouraged the immigration of ethnic Germans in the territory southeast of the Danube River in the 18th century (see Fig. 24).

Niemeyer’s second contribution to Raumforschung und Raumordnung was a series of nine maps, unaccompanied by any text, in the April/May 1939 edition of the journal. Titled “Der Verkehr und Ostdeutschland” (“Traffic and East Germany”), the maps all – unsurprisingly – address the topic of transportation and traffic. As with his 1937 article, the first map Niemeyer chose to display here is one that works to ground his cartographic propositions in medieval history. The map, entitled “Mittelalterliche Handelswege in Europa” (“Medieval Trade Routes in Europe”) and attributed to “Volk und Reich”, depicts the seemingly robust trade routes of central Europe (Fig. 25). This map does not try to hide its political message: the Germanic lands made up the territorial hub of trade occurring during the Middle Ages. The English in the north, the Italians to the south, European territories east of Breslau and Vienna, and European territories west of Paris – all are shown as far less congested than the densely networked cities of the medieval German kingdoms. Niemeyer’s reliance on a map produced by a publisher with clear ties to the Nazi state (Herb 1997: 161–162), and the vagueness of the time period the map references, suggest that Niemeyer’s cartographic choices here were not made for any scientific purpose. Rather, this map sets the historical framework that Niemeyer hopes the reader will reference and recall when considering the eight subsequent maps in this series.

Those eight subsequent maps are something of a strange selection. Despite the title of Niemeyer’s series focusing on...
east Germany, several of the included maps do not do that. One depicts Russia ("Das russische Flußsystem"), another is cartographically centred on eastern Europe ("Wasserstraßen des Ostrumes"), while a third shows how goods flow – by water and rail – throughout the whole of the German nation state ("Die Güterströme auf Wasser- und Schienenwegen in Deutschland"). The five maps that do

key in on parts of Germany’s eastern territory all zoom in on Berlin and its immediate surrounding area.

In the spring of 1940, Niemeyer published his final essay in Raumforschung und Raumordnung. This essay combines three presentations Niemeyer had given in the autumn and winter of 1939 to the Deutsche Akademie für Städtebau, Reichs- und Landesplanung (German Academy for Town, National and Regional Planning). Niemeyer explains to the

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6 The titles of these four maps (with their respective page numbers) are: "Das Reichsstraßen- und Autobahnnetz im Raum Berlin-Brandenburg" (217), "Die Jahresbelastung der Ostdeutschen Wasserstraßen 1934" (218), "Das jetzige Eisenbahnnetz im Raum Berlin-Brandenburg" (218), "Der Kurmarkring der Schiene" (219), and "Die Befahrbarkeit der Märkischen Wasserstraßen" (219).
reader, in a kind of preamble, that he hopes his findings will help lay the groundwork for a study that the Akademie is undertaking on behalf of the Reichsarbeitsgemeinschaft für Raumforschung (RAG), and that this is not a comprehensive or complete piece of work. What is really fascinating about this introductory prelude to the journal article, however, is how forcefully Niemeyer insists that any information related to nation states along the borders of Germany exists solely to help draw conclusions about spatial planning in eastern Germany itself (Niemeyer 1940: 151). It makes sense that a German regional planner might make this claim, particularly after the September 1939 invasion of Poland, the outbreak of the Second World War and the continual aggressive posturing of Nazi foreign policy. It makes even more sense when one considers the maps selected to accompany the text of Niemeyer’s article.
The article itself – “Deutschland und der osteuropäische Raum” (“Germany and the Eastern European Area”) – routinely includes maps of territories along Germany’s eastern border, as one might imagine. Eighteen maps – one of the largest collections of maps in any RuR selection from 1936 to 1955 – are scattered throughout Niemeyer’s piece. Some of them, such as his map of medieval trade routes (Fig. 25) and map of the 18th-century Austro-Turkish border (Fig. 24), are reprints from earlier maps Niemeyer published in RuR. Several new maps are introduced to complement a “historical overview” of the “struggle of the Germans to recapture” the Vistula and Danube regions of eastern Europe. These attempts at Germanization occurred, according to Niemeyer, in three distinct periods: during the Middle Ages, from the end of the Thirty Years’ War (1618-1648) until the beginning of the French Revolution (1789), and during the 19th century (Niemeyer 1940: 152–153). At the outset of his analysis, Niemeyer includes a map that attempts to capture each of these historical precedents of German expansion – Fig. 26.

Unlike several other maps included in this article, this particular map, titled “Die deutsche Wanderung nach dem Osten” (“The German Migration to the East”), has no legend. Instead, the map relies on a few different variants of arrow symbols to demarcate German penetration into eastern Europe. Note that the only territory with a border is an area meant to specify traditional German lands. While the East is ripe with natural water features, it is represented here as an otherwise blank space into which waves of Germans, during different time periods, moved and settled.

Niemeyer takes a special interest in the territories directly east of medieval Germania in his map “Ausfallsrichtungen der mittelalterlichen Ostkolonisation” (“Deployment Routes of Medieval Colonization in the East”) (Fig. 27). Here again, without any legend, it is easy to see what the author was hoping readers would infer from this map: streams of German settlers (their paths traced with arrow symbols) came out of the German lands and populated the eastern ter-
ritories of Poland, Hungary, Bohemia and the Baltic states long before the modern age. In this sense, Niemeyer’s map heavily resembles a map published two years earlier by “Volk und Reich”: Arnold Hillen Ziegfeld’s “87,545,000 Deutsche in Europe” (Fig. 28). Ziegfeld – a proponent of “suggestive cartography” (Hagen 2010: 69) – uses this map to depict the presence of the German diaspora in eastern Europe since the Middle Ages. As with Niemeyer’s map, all place names carry their German titles. The density of German-ness is also characterized in both maps with the aggregation of dots. Niemeyer, however, as with Fig. 26, refuses to establish definite boundaries in eastern Europe on his map. It is a region awash in places but, for Niemeyer, also a region without clear political borders. Even when depicting what he considers to be one of German expansion’s greatest setbacks – the Mongolian invasion of the 13th century – Niemeyer depicts the military incursions, territorial exchanges and battles occurring in eastern Europe as taking place in a region of the continent with vaguely defined boundaries (certainly more ambiguous, at the very least, than the texturized spaces denoting German ethnicity).

Niemeyer offers only one map characterizing the second wave of German settlement in eastern Europe. This second wave lasted, according to Niemeyer, from the 17th century through the 18th century – a period dominated by three “Great Colonizers”: Jean-Baptiste Colbert, Prince Eugen of Savoy and Friedrich the Great. Each leader consolidated state planning and infrastructure in their respective kingdoms, and each worked to expand their territorial holdings for the benefit of their homeland (Niemeyer 1940: 154–156). The sole map used to help explain this pe-

7 For more on this map, in particular, see Black (2020: 22–23).

8 This map is titled “Der Mongoleneinfall in Europa” (Niemeyer 1940: 155).
period of western European expansion is the aforementioned reprint of Fig. 24. The reprint is an exact copy of the map from Niemeyer’s first article in Raumforschung und Raumordnung, with two exceptions: the name of the map itself and an attribution of the information presented in the map to Roman Heiligenthal, a professor of state planning in Karlsruhe. The 1937 version of the map was given the title “Die Siedlungsgrenze Österreichs nach Südosten 1740” (“The Austrian Settlement Border to the Southeast 1740”), while this 1940 reprint has been retitled “Österreich um 1740 mit der Militärgrenze gegen die Türken” (“Austria around 1740 with the Military Border against the Turks”). This is, at least in part, due to Niemeyer’s focus in his essay on the geopolitical debt owed by Maria Theresa and Joseph II to Prince Eugen, who he credits with first realizing the importance of establishing German settlements along the militarized Habsburg-Turkish border in southeastern Europe. By doing so, Eugen (and the Austrian monarchs who heeded his geopolitical principles) staved off future Turkish and Asian incursions into Europe (Niemeyer 1940: 155).

By the 19th century, Germans began emigrating in large numbers to the United States and to territories controlled by Russia, including the Congress of Poland. For Niemeyer, this third wave of Germans “colonizing” eastern Europe failed to maintain the sense of religious and national unity that made the first two waves relatively successful (Niemeyer 1940: 156–157). Simultaneously, more and more Russians and Poles began moving into western Prussia, complicating German policy toward its eastern border (Niemeyer 1940: 157). No map depicting this third wave accompanies Niemeyer’s text, but he does include a contemporary map of Russia’s natural resources. Ultimately, for Niemeyer, any future German expansion should be predicated on the history of those first two waves of settlement in the East – waves that succeeded because of the application of technology and the uniformity of administrative and

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9 “Bodenschätze Rußlands” (Niemeyer 1940: 158).
Figure 25. Volk und Reich: Mittelalterliche Handelswege in Europa
Source: Niemeyer (1939: 216), no scale given

Figure 26. Reinhold Niemeyer: Die deutsche Wanderung nach dem Osten
Source: Niemeyer (1940: 153), no scale given
legal structures, and that relied on a single, comprehensive national identity (Niemeyer 1940: 170).

Niemeyer’s “historical overview” of German colonization into eastern Europe makes up a little less than half of his “Deutschland und der osteuropäische Raum” article. After presenting his history to the reader, he goes into a pretty straight-forward assessment of the relationship between eastern Europe’s mineral resources and its industrialization, the quality of its soil and the potential for the expansion of rail and road transportation that could more effectively connect the region to Germany.

At one point, Niemeyer writes about how one of the biggest problems facing the development of territories to the east of Germany is population density, especially in agricultural areas. The more people who live on a square kilometre, the smaller their agricultural property, and the more difficult it is to then maintain that small farm’s viability. Complicating this matter, Niemeyer points out, is the problem of the Jews. They make up a substantial part of urban populations in most predominantly-Polish cities and – in some of the eastern parts of what was once Poland before the Second World War – they make up a majority of the entire population. He goes on to lament the fact that the Jews are not inclined to leave, citing the Polish government’s interest in shipping them all to Madagascar and the largely unsuccessful attempt by the Russians to settle them in Siberia. Niemeyer includes a choropleth map – from what I can tell, the only map in RuR to directly represent a Jewish population during the Third Reich (see Fig. 29) – entitled “Verbreitung der Juden in Europa” (“Prevalence of the Jews in Europe”). Niemeyer’s map, despite being attributed to Niemeyer, is clearly derivative of a map with the same title that had been featured in Karl Haushofer’s 1934 publication, Raumüberwindende Mächte (Haushofer 1934) (Fig. 30). In both maps, the population density of Jews correlates to the density of a nation state’s shading. Poland, of course, is shown by Haushofer and Niemeyer as having the largest proportion of its population made up of Jews.

Throughout the early 20th century, German geographers had been critical of the non-German use of choropleth maps, especially when measuring population density. Choropleth maps, many argued, too often displayed a population count uniformly distributed within an arbitrary (or disputed) administrative boundary line (Herb 1997: 39). Niemeyer’s map of the population of Jews in Europe transforms these earlier criticisms into propositional features: there is no distinction between urban and rural areas within these nation states, nor any recognition of regional diversity within these countries. The map is making as much an argument about each nation state as it is about Europe’s Jews; if the Jews are a problem, here are the countries more or less deeply tied to that problem.

4 Maps after Defeat: Confusion, Retrenchment and Division

As with maps published in Raumforschung und Raumordnung during the Third Reich, maps published after the defeat of Nazi Germany mirrored and reiterated the territorial changes imposed on the cartographic landscape of Europe. However, where there was once an expanding “Gross-
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Figure 28  Arnold Hillen Ziegfeld: 87 545 000 Deutsche in Europa
Source: Black (2020: 22–23), no scale given

Figure 29  Reinhold Niemeyer: Verbreitung der Juden in Europa
Source: Niemeyer (1940: 167); no scale given

Figure 30  Verbreitung der Juden in Europa (map author unknown)
Source: Haushofer (1934: 121), no scale given
deutsche Reich” there was now – after May 1945 – a diminished, truncated and occupied German state. Representations of this new postwar state often relied on some of the same approaches to mapmaking that the Nazis had utilized before and during the Second World War.

As mentioned earlier in this paper, because of a lack of resources (especially paper), RuR had only managed to publish two issues of its eighth volume in 1944. The economic situation in 1945 and in the immediate postwar period did not see any quick improvement. Indeed, after their initial invasion of Germany, the Allied powers were primarily interested in demilitarization and denazification – clear indicators of total German surrender. While the policy of the Western Allies shifted toward one of potential reconstruction and rehabilitation after the autumn of 1946 (Jarausch 2015: 415–416), the RuR was only able to resume publication in 1948. The published editions of the journal itself were surprisingly similar in size to those published during the Third Reich, but the content was significantly different. Only two maps were published in the pages of RuR during its five-edition run in 1948, and both were used to show the potential usefulness of “Raumforschung” in resettling postwar populations (specifically, in Thuringia). Maps of a German nation state are noticeably absent, although the territorial upheaval of Germany, and its partition into American, British, French and Soviet zones, is acknowledged by the journal’s authors and editors. In fact, no maps of Germany would be published in the pages of RuR for five more years, leaving a choropleth-style soil quality map from 1944 (Fig. 31) as its final depiction of Germany until regular publication resumed again in 1953.

12 These maps were both designed by Joachim H. Schultze and are titled “Thüringen: Zonen günstiger und ungünstiger Faktoren” and “Thüringen: Gebiete für die Umsiedlung” (Schultze 1948: 24).

13 “Verwaltung und Organisation: Zur Organisation der Landesplanung in Deutschland – Anschriften der Dienststellen der Landesplanung nach dem Stand vom 1. März 1948” in Raumforschung und Raumordnung 9, 1 (1948), 36–38.
This is not to say that Raumforschung und Raumordnung stopped printing maps altogether before 1953. Despite financial difficulties and some bureaucratic wrangling between the Akademie für Raumforschung und Landesplanung (Academy for Spatial Research and Planning; ARL) and the Institut für Raumforschung (Institute for Spatial Research; IfR) over control of RuR, four editions of the journal were published in 1950. While this tenth volume features cartographic studies of various German cities and regions, no national maps of Germany appear. And because publication paused again through 1951 and 1952, RuR did not initially have to address the question of how to present a post-Nazi Germany, divided and occupied by foreign powers.

That changed in 1953, when Raumforschung und Raumordnung returned to regular publication under the joint editorial leadership of both the ARL and IfR (Becker 2006: 516). Maps of Germany – in some form – returned, and while the number of maps included in the pages of RuR from 1953 to 1955 never reached the rate of maps-per-edition undertaken during the early stages of the Second World War, the number of maps published was certainly comparable to what it had been before the war (see Fig. 4 above).

These problems are expertly explained and addressed by Becker (2006: 515–518).
The first maps to appear, in the first edition of *RuR*’s 1953 volume, are two maps of Germany. They are included in Rudolf Hoffmann’s article, “Die wirtschaftliche und politische Entwicklung in Deutschland im Spiegel des Eisenbahnnahrfahrplans” (“The Economic and Political Development in Germany as Reflected in the Railways Timetable”), which compares the number of high-speed rail connections in the summer of 1939 – right before the outbreak of the Second World War – to the number of those same connections in the winter of 1952/1953 (Hoffmann 1953). Hoffmann’s argument is easily captured in the cartographies he includes here: before the war (see Fig. 32), Germany (and Berlin, in particular) was in an excellent geographic position to benefit from, and contribute to, the development of railway travel in Europe. After the division of Germany, as shown in Fig. 33, railway traffic was greatly diminished throughout the central core of what had been Germany, and was nearly decimated in Berlin and (what Hoffmann refers to as) the Soviet Occupation Zone.

Hoffmann’s maps of Germany, with a perforated internal border dividing two pieces of an otherwise clearly articulated whole, are the exception rather than the norm. Nearly all of the cartographic material portraying Germany in *Raumforschung und Raumordnung*, after the end of the Second World War, relies on the presentation of the Federal Republic of Germany (FRG) as a shaded or colorized island. Its eastern counterpart – the German Democratic Republic (GDR) – is almost always included only as a blank spot, perhaps with some vague reference to the existence of Berlin. Several different mapmaking techniques and strategies are
used to gesture toward this eastern space without entirely acknowledging its separateness. This makes sense. The government of the FRG saw their nation state as the true heir to the German national idea; its founding legal document – the Grundgesetz, passed on 23 May 1949 – made this, the specific Länder included within the boundaries of the new nation state, and hopes of German reunification, explicit (Mingus 2017: 108–109). Like the German governments before it, the Federal Republic understood the importance that cartography had in justifying its legitimacy. RuR routinely contributed to that project, often even publishing and promoting maps produced by government agencies.

Occasionally, as in Fig. 34, RuR’s maps of the FRG did adopt a style that completely ignored any territory outside of the contiguous states of West Germany. The Federal Republic, as mapped here, is presented as if there is no other Germany; its borders better resemble a coastline than boundary lines within a shared European continent.15 Examining this map alongside its accompanying text is an exercise in reading contradiction: the author includes the map to show a correlation between a German area’s proximity to the “Sowjetzonengrenze” (“Soviet Zone border”) and the unemployment rate. The cartography is complementing an essay about a German “zone” that the map itself refuses to acknowledge! A similar technique – but, certainly, a bit cleverer – used by postwar cartographers in the RuR was to draw the German nation state as a whole, but then obfuscate the GDR with an inset graph or legend. Fig. 35 does this brilliantly. The reader can see that there is something clearly there, under the graph. Presumably, any reader (particularly of an academic journal disseminating articles about spatial/ regional planning and geography!) would know that Berlin

15 Guntram Herb has written extensively on this style of mapmaking in East and West German textbooks after the Second World War (see Herb 2004).
and the GDR were smothered somewhere under the inset’s stacked bars, especially when one considers why so much agricultural and forest land have been allocated to “Verteidigungsmassnahmen” (“defence measures”). One of the most important reasons for those “defence measures” has been literally stamped out by the stylistic choices of this map’s cartographer. So, while Fig. 35 suggests that there is German territory to the east of Lower Saxony and Hesse, and while Fig. 34 just straight-up ignores the existence of that territory, both maps use cartographic techniques to clearly focus on the FRG as something separate and distinct from its surroundings, despite both maps proposing values related to something obscured by, or left off, each map.

Another notable map of the FRG frequently used in Raumforschung und Raumordnung is a base map drawn by the Institut für Raumforschung. Initially appearing in the first edition of the 1953 volume (Fig. 36), eight different versions of this same map were used for a variety of purposes through 1955. While only the Federal Republic is colorized here, the German Democratic Republic is clearly acknowledged – albeit as a largely empty space. In many renditions of this particular map (as in Fig. 36), inset maps and legends are inserted on top of the GDR, emphasizing its uselessness in evaluating the data of the cartography presented. And while natural features, like the Elbe River, traverse the East German landscape, the only political boundaries drawn within the GDR are the ones encompassing and dividing Berlin. There is only one IfR map of this design that does not contain an inset map, and that more clearly defines East Germany – along with territories east of the Oder-Neiße line – as having been within the 1937 borders of a unified Germany (Fig. 37).

The final development of national German maps in RuR that I want to address here, occurs in the thirteenth (1955) volume. In the fourth and final edition of this thirteenth volume, an article by Detlev Zöllner is accompanied by a folding map. The article, titled “Größe und Verteilung der landwirtschaftlichen Nebenerwerbsbetriebe in Westdeutschland” (“Size and Distribution of Part-time Agricultural Farms in West Germany”), focuses, as its
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name indicates, on West Germany. But the maps included are unique for the RuR insofar as they project a GDR with clear political boundaries (see, for example, Fig. 38). While the legend still overlaps a small section of East Germany, and while the FRG is the only colorized territory presented, for the first time – in the pages of this particular journal – a map shows the GDR as a space full of places. Interestingly, these detailed maps of the communist German East are included to complement an article that purports to largely be uninterested in that territory, while Figs. 34 and 35 accompany articles that heavily discuss the impact of the GDR on West Germany but are complemented by cartographies that all but ignore that territory.

5 Conclusion

In a 2011 editorial commemorating seventy-five years since the creation of Raumforschung und Raumordnung, Hans Heinrich Blotevogel called for an investigation into the concepts engaged with by RuR during its early history. Blotevogel also asked scholars to examine any continuities between those early editions of RuR – which so clearly embraced “Blut und Boden, Volk und Raum” – and later editions published after the defeat of Nazi Germany (Blotevogel 2011: 2). I hope that this paper has contributed to that project, making clear the shifts in mapped content as RuR separated itself from National Socialism after the Second World War, but also emphasizing shared cartographic practices between RuR contributors before, during and after the war. While Lebensraum-inspired expansionism reflected a distinctly different intent behind mapmaking than the postwar division of Germany, the use of particular cartographic styles and techniques was often similar. In fact, as discussed above in the case of Rudolf Hoffmann, sometimes even the people drawing the maps promoting a Nazi-occupied Europe during the Second World War also ended up drawing the maps making clear Germany’s territorial diminution after Nazi defeat. Indeed, RuR is emblematic of how maps – like any type of narrative or proposition – can be used to make arguments supporting good or bad politics, arguments advocating for racial diversity or white supremacy, and arguments bolstering claims to territorial sovereignty or imperialist conquest and occupation.

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