Connected Routes: Migration Studies with Digital Devices and Platforms

Natalia Sánchez-Querubín and Richard Rogers

Abstract

The article builds upon critical border studies for the study of the European migration crisis that take into account the digital, both in terms of telecommunications infrastructure and media platforms. In putting forward an approach to migration studies with digital devices, here the emphasis is shifted from “bordering” to “routing.” First, the current analytical situation is sketched as one where the “connective” route is contrasted to the “securitised” one, made by European policy and monitoring software. Subsequently, we ask, how are connective migrant routes being made into accounts and issues in social media? Two case studies are presented, each describing routing in terms of the distinctive accounts made of migrant journeying. In the first, routes are seen from the point of view of its curation in Getty Images, and in particular of the images privileged by its social layer. In the image collection, the “sanitised route” (as we call it) gradually leads to a soft landing in Europe, cleansed of anti-refugee sentiment. In the second, we ask how camps and borders are problematized from the point of view of the traveler using TripAdvisor. In the “interrupted tourist route,” would-be visitors are concerned with a Europe made unsafe, thereby rerouting their own journeys on the basis of social media commenting. We conclude with reflection about the advantages of employing social media in migration and border studies for the study of “media journeys” as routes from multiple vantage points, developing the idea that route-work also can be understood as platform-work.

Keywords
migration studies, digital methods, actor network theory, issue mapping, TripAdvisor, Getty Images

As a result of conflicts intensifying in West Asia, most notably Syria, the number of refugees and migrants arriving at the external borders of Europe hit new peaks in 2015 (International Organization for Migration, 2017, p. 8). Taking into account the European migration wave, with more than one million entries documented, the percentage of displaced populations worldwide is also the highest ever as reported by the United Nations Refugee Agency (Edwards, 2016, para. 1). As a consequence, the routes running from these troubled regions into and through Europe (e.g., a Mediterranean route that connects Turkey to Greece as well as the in-Europe route from Greece to Germany via Hungary) have become urgent matters of concern as well as dispute. Issues pertaining to their “regularisation”—from delineation and regulation to safety and policing—currently reverberate through human rights, transnational migration, and European security agendas (Jansen, Celikates, & de Bloois, 2014). The European Union (EU), more generally, has performed broader policy (and routing) interventions; in its agreement with Turkey, the EU declared routes apart from the Turkish “irregular,” making those following them subject to deportation (European Commission, 2016). The outcome of these interventions is a securitized route, allegedly made safer and regular (so to speak) with the aid of digital infrastructure and software for automated vessel tracking and detection (see Latonero & Kift in this Special Issue).

“The route[s] may be rugged and the journey harrowing,” writes another non-governmental organization (NGO) active in what we conceive as an issue space (Cogan, 2016, para. 21). “But it’s also ripe with device access, connectivity and electricity” (Cogan, 2016, para. 21). Indeed, migrants “[are coming] to Europe the WhatsApp way” (Frouws, Phillips, Hassan, & Twigt, 2016 p. 1), which involves following routes enriched by user-generated, networked, and real-time updates. For example, migrants have “access to recommended routes by fellow migrants, safety advice and GPS coordinates for family and friends, and smuggler boats” (Frouws et al., 2016, p. 4). Facebook groups help circumvent...
securitized EU routing when people on the road warn those following behind that a border has been closed (Frouws et al., 2016, p. 4) and humanitarian workers make available information about asylum procedures and where to find water. Here, one may speak not only of “connected migrants” (Diminescu, 2008) with smartphones, but also, we suggest, of connective routes with stronger and weaker signals. While both socio-technical and intertwined, “connected” would refer more to one’s relationship with the infrastructure, while “connective” emphasizes the sociality of the route and information sharing made possible in part by media. Ultimately, when one contemplates that often “migrant deaths occur in areas with no mobile phone coverage,” mobile networks, platforms, and data plans become in the strict sense of the word vital (Gillespie et al., 2016, p. 10).

As the emergent discussions concerning securitized and connective routes illustrate, there is a need for reflection on migration routes and the implications of taking each of them, as well as the difference that connectivity and digital media make. Infrastructure, devices, and platforms are indeed significant for those involved in the migration crisis as well as for those who are studying it. Further exploring this idea, this article asks, what are the consequences for Europe of the journeying of refugees and the routes they take, as captured by (social) media? How is forced displacement making issues and how are these issues becoming Europeanised? Which is also to ask, how else are migrant routes being framed as matters of public concern? And, which other accounts exist apart from the securitized and the connective route, and how may they be (made) significant to the study of the crisis? In the following analysis, we build upon critical borders studies, however, we shift from the border toward the problem of illegal immigration. To Africans attempting to enter Europe illegally by land or sea, the borders managed by Frontex may appear as an insurmountable barrier (Rajaram & Grundy-Warr, 2007), “borderzones” (Squire, 2011), “sociopolitical relations” (De Genova, 2014, p. 6) and “process” as much as “product” (Wilson & Donnan, 2012, p. 13). Indeed, there has been a shift in the discussion from border to bordering, with nation-states but also citizens (and non-citizens) engaging in ‘borderwork’ (Rumford, 2008) and ‘bordering practices,’ or activities that have ‘the effect of [. . .] constituting, sustaining or modifying borders’ (Parker & Adler-Nissen, 2012, p. 776). Among them are, for example, “a military action so as to clear and fence a border, to its reversal in a treaty of union with the neighbouring state’ (Parker & Adler-Nissen, 2012, p. 776), as well as interventions from smugglers, tourists, protestors, and migrants alongside organizations supporting them. Here, a so-called ‘vernacularisation of borders’ is increasingly associated with media practices (Perkins & Rumford, 2013, p. 270).

Constituting, sustaining, modifying, and resisting borders (for brevity, borderwork) is consequential in that it not only determines the right to cross and occupy a space. It also grants “access to rights and resources” selectively (Amilhat Szary & Giraut, 2015, p. 2). “To apprehensive European citizens, the creation of Frontex, the EU’s border regulation agency,” for example, “may represent a necessary response to the problem of illegal immigration. To Africans attempting to enter Europe illegally by land or sea, the borders managed by Frontex may appear as an insurmountable barrier” (Rumford, 2008, p. 2). In other words, borders are “polysemic” (Balibar, 2002, p. 79) and become disputed matters of concern embedded with meaning, which is also to say, issuefied. In this vein, border critique aims at “illuminating the changing reality of borders; determining the associations between that and our broader spatial and governmental imaginations; subjecting border-making practices to critical scrutiny; evaluating the ethical and political aspects of border regimes and control” (Parker & Vaughan-Williams, 2009, p. 583). Border studies, that is, enable critique of the implications of inhabiting worlds in which limits are constantly
produced, managed, and redefined. One can ask, “who is doing the enclosing and who is in a position to create a border? […] Who performs the borderwork?” (Rumford, 2008, p. 2).

Of late performing and studying borderwork involves software and hardware. Indeed, with the introduction of digital technologies “we experience, visualize and theorize borders” rather differently (Ponzanesi & Leurs, 2014, p. 4). The use of smartphones by connected migrants are becoming central to the study of migration. Navigation and information-seeking involve media journeys—as the description of connective routes illustrates—while e-diasporas can be studied with hyperlink and network analysis (Ben-David, 2012; Diminescu & Loveluck, 2014; Kok & Rogers, 2017). It also holds for the other deployment of the digital: the ubiquitousness of state-led surveillance and securitization. Europe’s technological borders, or e-borders (Dijstelbloem & Meijer, 2011), are “turning electronic signals into barriers” (Bigo, 2014, p. 62) with migration industries providing surveillance and biometrics and “data-ready” travelers (Gordano Peile, 2014; Vukov & Sheller, 2013, p. 226). Citizens, in turn, employ online petitions and hashtags such as #welcomerefugees or its anti-program, #refugeesnotwelcome, to push for the opening or closing of borders, and may engage in cyber-bullying and racism, the latter of which may be studied, for instance, using reverse image search and social media analysis (Farkas, Schou, & Neumayer, 2017; Horsti, 2016). In short, attending to borderwork increasingly involves also capturing and analyzing digital traces (Gillespie et al., 2016). In view of these theoretical and analytical efforts, the notion of Europe as a stable and well-defined, bordered fortress is perhaps just as accurately conceptualized as a digitized e-topography in flux, comprised of internal as well as invisible borders that themselves include and exclude. There are thus multiple regimes of crossings as well as nearly uninhabitable spaces among the habitable within Europe. Being added to the discourse of a fortress Europe, in other words, are accounts of how physical and digital infrastructures throughout the Union are (temporarily) constructed, in practices of extra-bordering, and how telecommunications infrastructures and social media platforms have been enabling and shaping forms of (circum)navigation as well as communications and descriptions that may be studied.

Given that borders “are more than lines,” we argue in this paper, that migrant routes are also more than vectors traversing locations. We ask about the way in which migrant routes are produced, sustained, and framed as diverse matters of concern and how European places, landscapes, and infrastructures are becoming significant by the journeying of migrants, thus enabling a critique of route-work. For example, Mediterranean shores become places of memorialization, railway stations are fenced in to prevent displacement, hangars shelter refugees, and cities become known as points of arrival or destination for migrants. Furthermore, for each space and each route to them, there is copious refugee-led social media and other documentation, together with that of the press, NGOs, and governments. It is in joining the call for “sustained attention to the technocultural and communicative infrastructure of these bordering [but also routing] devices and technologies” (Vukov & Sheller, 2013, p. 227) that we propose to use digital methods to distill or extract the issues that accompany the routes through an issue mapping in social media, a framework informed by actor-network-theory and its study of controversies. In more detail, we set out to examine routes not as geographical fixities but rather we call for an analysis of their associated issues as indicated discursively in the (social) media that discusses or accompanies them. Here, we move from tracing migrant routes in maps to describing issue-work, or more precisely, route-work that makes issues.

Border and route-critique are urgent in relation to the present humanitarian crisis, but also more generally, to the proliferation of discourses and practices that go “hand in hand with the normalization of the idea that migration is irregular—as are the lives of those who attempt to cross borders,” justifying detention, deportation, and drowning (Jansen et al., 2014, p. ix). Within this discourse, migration is framed as a risk to nation-states and digital infrastructure as a matter of border security. Mapping securitized routes can thus involve surveillance when led by agencies and counter-surveillance at hands of migrant organizations. Connective routes, on the other hand, help understand “routing” from the perspective of migrants and humanitarianism; somewhat at odds with the discourse of securitization, technology is deployed to aid in crossing. For example, mapping “media journeys” helps describe the overlap of physical and digital routes (and their issues), and intervenes in the crisis by way recommending how such an overlap can be made safer and more effective. One study asks, “When and where is most info provided —In the Middle East before they leave, or in camps, or on arrival in Europe?” (Gillespie et al., 2016, p.21).

The two platforms addressed in the case studies are relevant, even if understudied, in that they are participating in transnational flows of meaning. More commonly, stock photography has been critiqued with respect to the visual curation of “the meaning(s) of Europe . . . fiercely produced and reproduced” with respect to issues of national identity (Aiello, 2012, p. 11); we bring the critique to route-work, and then extend it also to the review platform, TripAdvisor, which is also performing as a new (social) space for political debate around the route. To conclude, we consequently develop the idea that route-work can also be understood as platform-work. Routing is not only aided and enriched by social media. Some forms of it may also be studied as media, which is to say, that they develop through action formats, vernaculars, and logics that are of the medium, thus making routing in part a platform-specific affair. Consequently, the traces left by route-work online can potentially be repurposed not only for securitization or aid. Rather, through
issue mapping and digital methods, they can be used to advance bordering (and routing) critique, as proposed in critical border studies. Platforms offer a rich and active ground for doing so.

**Mapping Route-Work Using Digital Methods**

We make migrant routes, and more specifically, route-work, the object of an issue mapping and suggest that they too can be mapped along with their issues using digital methods for social media analysis. What we call “issue mapping” is the practice of describing issue-making activities or issue-work, the actors involved with it, and their associations. The latter do not necessarily refer to institutional affiliations (though important too) but rather to the connections that emerge between actors when one attends to what they are concerned with (their issues), how they act with regards to them, and how they form active, topical assemblages. In more detail, the approach is an empirical elaboration of actor-network-theory (Latour, 2005), following some of the guidelines for undertaking actor-oriented studies of controversies, which are affairs in the making and not yet agreed upon. Issues are approached (and mapped) as matters of public concern. Their activities (and thus what we describe and account for) are the efforts invested in or through actors for sustaining diverse and often clashing understandings of what is at stake and what needs to be done about it. The actors involved in issue-work may include policy workers, activists, engaged citizens, and governments, as well as their tools, including the media platforms they use. After all, it is when an “actor” is merely that which acts that one may account also for the non-humans too, which is another guideline. One final guideline of the approach, emanating from the credo “follow the actors,” concerns guarding against the impulse to organize, over-interpret, and impose categories too quickly when doing research. As Latour (2005) points out, “analysts are allowed to possess only some infra-language whose role is simply to help them become attentive to the actor’s own fully developed meta-language, a reflexive account of what they are saying” (p. 49). It is especially applied in the case how a matter of public concern is depicted in Getty Images. Ultimately, the issue mapping offers opportunity for studying route-work (and border-work) in ways that account for its performative, polysemic, and heterogeneous character, thus capturing multiple accounts. By doing so, it connects also with work within critical border and migration studies—some of which we have referenced earlier—that takes advantage of (digital) traces left by journeying and bordering.

Digital methods, a framework for doing research, propose a multilayered relationship to digital media, which underlines how we study route-work. First, media is approached substantially, which is to say, it is treated as content and a source for data that can be captured with crawlers and APIs, and then analyzed (and the findings visualized). Traces of route-work online can be found, for example, in the forms of official migration policy documents, slogans, hashtags, and institutional websites with tabs displaying agenda points, or as with our case studies, in stock photography, news headlines, and travel reviews. Second, digital methods approaches media as device, platform, and environment, and together are treated as being medium-specific (Hayles, 2004). For this reason, digital methods take as fundamental considerations how a medium affords, shapes, formats, and valorizes (e.g., through algorithms) the production of content, capturing of data, and activity between users, users and interfaces, and of users with data, as well as back-end activities involving data brokers, trackers, and bots. After all, one is dealing with “platform ready data” and “programmed sociality” (Bucher, 2013; Helmond, 2015). The array of methods already embedded in the medium (here is the key point) are repurposed for the analysis; these are digital methods, per se. Thus, one learns from the methods of the medium and embraces and pushes their epistemological readiness for the benefit of social and cultural research, a form of which is issue mapping. Therefore, if actor-network-theory urges one to “follow the actors” and their infra-language, which is a light interpretation of the way actors simply say and do things (Latour, 2005), digital methods take the guidance a step further. Following the actors becomes following the medium and its infra-language.

Since route-work is being communicated but also done with and through media platforms, we ask about the places where the information is produced, how is it presented (e.g., ranked), and what story about the route does it tell when one deploys it. When studying Getty, we take into account querying, filtering, and tagging; with TripAdvisor Google rankings and the platform’s participatory features. Studying how media represents and sustains the migration crisis and the issues thereof is not uncommon, and it may involve analyzing news photographs and their captions, maps and their annotations, news frames, and discourse (Berry, Garcia-Blanco, & Moore, 2015; Laine & Tervonen, 2015; Tsoukala, 2011; van Houtum, 2012). Digital methods extends the range of approaches and critiques to include the ways in which images, documents, and statements are produced, organized, and engaged in and with online platforms. Finally, digital method approaches media performatively. The goal then is to account for, as well as critique, media platforms and infrastructures as actors involved in what is being studied, for example, issue-making (Marres, 2015). The manners in which media act matter, and one should not do them the disservice of calling them mere placeholders or content containers (Latour, 2005, p. 153). Indeed, we argue, as social media platforms are giving way to new forms of route-work and participating in the migration crisis, it becomes necessary to reflect upon how to account for their roles, which is also to
think about what social media and new media studies might have to contribute to migration studies, a point to which we return in the conclusion.

**Getty Images and the Sanitized Migrant Route**

This first mapping project departs from the assumption that visual records of the migrant routes are being produced by a diversity of actors. Among them are the migrants themselves who are creating with their smartphones “a living, expanding photo album and an archive that documents the digital passage to Europe” (Gillespie et al., 2016, p. 25), and activists and artists who visit camps or tag along the route to produce their own records. A recent example is Ai Weiwei’s photograph exhibition #safepassage, described as an “immense collage [that] reflects on all the personal encounters the artist has had with individuals and the tragic situation unfolding in the Mediterranean” (Foam, 2016). Photojournalists also intersect with those in transit and capture newsworthy scenes that they later sell to agencies such as Getty Images, which in turn create commercial repositories (another collage, so to speak) for media publications to feed from. While this form of trading is common, the role of agencies and their digital platforms is nonetheless, if not more, relevant. Critiques about the media’s representation of humanitarian crises are plentiful, with such analytical outlooks ranging from the “analytics of mediation” which guide the analysis of media representation of suffering to compassion fatigue (Chouliaraki, 2006; Chouliaraki & Stolic, 2017; Moeller, 1999). What this project does is to extend the critique often reserved for the publication and its content to the distributor’s platform. (Another example of this type of work is Lisa Parks’s analysis of the Darfur layer in Google Earth [Parks, 2009]).

The intervention of Getty, one can argue, has led to the route not only being documented, but also branded and copyrighted (watermarked), as well cataloged in thematic collections, geo-tagged, and enriched with platform metadata, including metrics that indicate the success of the images. One can go as far as to argue that the route becomes snippets and data points from multiple sources, and that they can be reorganized according to these metrics and metadata. If stock photography is already mapping the route, so to speak, what is it articulating and what is omitted? The digital methods technique employed is “search as research,” which repurposes the query capabilities of the Getty Images databases and the structured data that it produces. The first step is to query the platform, in this case using the term “refugee,” while specifying “editorial” image and sorting them by “most popular photos,” a ranking that takes into account a sum of user interactions (search, view, purchase) over time. The photographs returned by the query are further filtered using their geographic metadata, retrieving the 20 most popular images associated with the countries crossed when journeying from Syria to Northern Europe, namely Turkey, Greece, Macedonia, Serbia, Croatia, Hungary, Austria, Germany and Sweden. Finally, the images are lightly coded by following to some extent the platform infra-language. That is to say, while at the moment one can filter images based the “composition of people” (e.g., headshot or waist-up depiction), we identify instead key elements in the landscapes depicted in the photographs, with the human figure, to some extent backgrounded. That is, our case sets out to reconstruct the journeying of displaced populations and the European landscape it creates by plotting the images that are marked as “most popular” in a timeline depiction, or map. In all, the project asks how the space is transformed along the route as well as issuefied, and if this were made into a filter, what story it would tell.

The results are nine themes found on the photograph’s landscape. The first, “destruction,” pertains to the presence of damaged infrastructure and death. “Displacement” entails visual cues for movement, dislocation, and transportation. Objects such as life vests and thermal blankets evoke “survival,” the third theme. “Barrier” suggests obstacles and partitions. “Authority,” law and power, and “landscape,” nature without settlement (sea, forest, and desert). The theme “settlement” indicates the presence of places for accommodation. “Urban” emerges when social organization and community structures in cities are featured and, the last one, “expression,” emerges when coding for symbols and slogans such as signs and national symbols.

The resulting timeline, and the journey that it imagines, is then composed of three stretches, each associated with a theme, that reorganize the route and the countries it crosses. Syria, Turkey, and Greece are linked by themes of destruction and survival, with imminent danger visually present in the photos. For instance, Syrian cities are photographed in ruins, and one sees images of coffins. In Turkey and Greece, life vests and rubber boats merge danger into the theme of survival, with uninhabitable landscapes such as deserts and oceans testifying to the flight. The second leg of the route covers Macedonia, Hungary, Croatia, and Serbia, and the photograph’s main elements now evoke masses in transit. In Macedonia, one predominantly sees crowds, trains, train tracks and fences, while in Croatia, the theme of authority peaks, as seen through military figures that hinder the crowd from progressing at intervals. Interestingly, the theme barrier is not dominant in Hungary (where to significant controversy the border was temporarily closed), but rather the state of crisis is depicted in association with open fields, forests, and train tracks, as can be seen in Figure 1.

The last portion of the route hints at integration and attempts at beginning anew, at least according to the stock images. As if in a progression out of hardship the images associated with countries at the end of the route, namely Austria, Germany, and Sweden, offer signs of resettlement. Subsequently, the themes of displacement, barrier, and open landscapes decrease once reaching Austria, while images of settlements increase in Germany and as well as urban set ups
in Sweden, with playgrounds, schools, gyms, and residential neighborhoods becoming visible in these last three countries. Images of shelter are also seen at the end of the route, in Germany and Sweden, suggesting integration, an attempt at incorporating the refugees into society, as opposed to the other phases of the journey where they are mostly portrayed as passengers or invaders. Finally, the theme of popular expression peaks at the end of the journey, with pictures of citizens holding welcoming signs to the refugees, as can be seen in Figure 2.

The vector as articulated in the timeline—with clear beginning, middle and end, and a journey from ruins, oceans, roads, into accommodation in cities—is progressive. One of the more questionable aspects is the “happy ending,” when in fact the issue is ongoing and political dialogue continues as EU leaders struggle to find solutions. Therefore, we have named this route “the sanitised migrant route.” When one places the happy ending next to the news coverage of the crisis, key differences begin to emerge. More in detail, a number of headlines of articles published by BBC News and Al Jazeera that mention the migration crisis in connection with a country on the route report on themes such as the death of refugees, poor conditions, and well-being, the interruption of the journey, the welcoming of refugees, and anti-refugee sentiments. One could then produce quite a different mapping (see Figure 3). The refugees were likely to be met with negative sentiment as early as Turkey and Croatia, but the real peak can be found in Germany and Sweden. The Croatian part in anti-refugee sentiment is augmented by the rise of far-right political parties. The German and Swedish...
peak is contiguous with protests by Pegida (the far-right movement) as well as (plotted) attacks on refugee centers and on pro-refugee politicians. The sanitized route and the newsworthy route differ remarkably.

**TripAdvisor and the Interrupted Tourist Route**

The image of Europe as a safe and pleasing tourist destination is currently being unmade and remade with the journeying of migrants and the accounts thereof. For example, an article in the UK Telegraph’s Travel section, with the title, “Which Greek islands are affected by the refugee crisis?,” oscillates between refugees and tourists as it reviews nine Greek islands. Kos is, for instance, a “popular tourist destination [that] has become one of the most visible images of the situation” (Leadbeater, 2016, para 16). It is the place that Alan Kurdi, whose body was photographed washed up on the Bodrum Peninsula, was trying to reach. Chios is described as a refugee-friendly island where thanks to the United Nations Refugee Agency (UNHCR) newcomers enjoy rudimentary “homes” and connection to the island’s water system. The presence of displaced populations, the article also says, is interfering with tourism. A hotelier pleads, “We have to do something. Reservations are going down” (Leadbeater, 2016, para 10).

Through TripAdvisor, a traveler’s review platform, tourists are expressing also their worries about the effects that the crisis might have on their leisure activity. Querying Google leads one to a number of TripAdvisor “topics,” which correspond questions post by potential travelers concerns with the current situation in Europe and have received in turn numerous answers and comments posted by other users of the platform forming a thread. For this study, 100 “topics” initiated by TripAdvisor users between 2015 and 2106 were analyzed. This includes the description of the concern and questions posted by the initiator of the topic and the answers provided by other users, which in the dataset vary between 2 and 23 per post. When studying these forums, one has access to the author of the post, the question that was posed, and the responses provided, as well as to the country and city forum to which it was posted and archived, together with the time and date.

A further look reveals that questions are posted mostly about Greece, Germany, Austria, Hungary, and Italy, and include concerns such as, “Can I expect any negative impacts from the migrant crisis with 1000 migrants currently passing into Greek islands per day as reported in the WSJ and NY Times?” (StCroixR, 2015) Or, “I am thinking of vacationing in Crete in 2016 and am curious to know if anybody has a comment about the effect on the Crete island from the Syrian migrants?” (Stuart-Mansell, 2015) and “Is [the] migrant crisis affecting train travel? Train stations? I’d be safe? Germany? Austria?” (Mmher, 2015). A new type of cartography of Europe as a set of risky destinations emerges when one plots this onto the map, as it can be seen as a heat map.

**Figure 2. Sanitized Migrant Route as Stream Graph.**

On the vertical axis one finds represented as streams each of the nine themes and on the horizontal, the countries included on the route, namely Syria, Turkey, Greece, Macedonia, Serbia, Croatia, Hungary, Austria, Germany, and Sweden. The width of the stream increases depending on the frequency in which a theme is found per country. Data source: Getty.nl. Date: 3 April 2016. Analysis by Ysabel Camus, Daniela Demarchi, Elias Gorter, Ash Monzer and Denise van Kollenburg. Visualization with RAWGraphs, http://rawgraphs.io.
One can argue that TripAdvisor is enabling a type of route-work, and as such is an example of its vernacularisation as enabled by social media. Here, the migrant route is seen as a combination of mobility (migrant crossing borders) but also of immobilization (migrants are stuck in camps and train stations) changing the landscape of European destinations most permanently—this is the route interrupted (see Figure 6).

When studying a subset more carefully, the authors of these concerned posts are mostly located in the United States, Canada, and the United Kingdom, and a commonality among them is their reference to the news media as the source for their worries and a desire to receive confirmation from so-called location experts and other tourists using the platform. Underlying this mapping is then the question not of what happens to places next to borders, but what happens to places that are featured on the route, and what issues come into focus in relation to them. Four main areas of concern emerge through reading the posts, of which the most frequent is “safety.” That is to say, those potential tourists using TripAdvisor tend to ask local users about their own personal safety and express fear of negative incidents occurring during their visit. With safety as lens, places such as Germany become potentially unsafe for women traveling by themselves. “I am planning to stay in Hannover for a month in spring for a short-term research visit and as I am a single young woman”—one tourist remarks—“I have some doubts is it safe enough for me to go at this period?” (Purplefiles, 2016) and similarly about Sweden, another tourists asks, “I’ve been reading in the news a lot of stuff about refugees in Sweden, for example, gangs of refugees in Stockholm Central Station, which are making it unsafe for solo women at night” (Nattylovestravelling, 2016). Countries generally both safe and perceived as such are beginning to seen as risky and perhaps to be avoided. The second category is “transportation,” and it emerges from tourists asking other users about problems and delays with trains, buses, and/or ferries. The third is “border control,” which refers to concerns about the effect on routes for tourists regarding strict supervision at checkpoints in EU countries. What follows are general concerns with the presence of refugees and their visibility in tourist hotspots—that is their impact on these landscapes—and that cities would feel overcrowded, as well as the posts of tourists who, more subtlety, ask locals simply about the state of the situation.

TripAdvisor’s forums become a source for capturing snippets of this re-mapping of Europe as risky destination as done by tourists, but also contested by local commenters or local experts that challenge them (perhaps, counter-map them) by engaging in political debate. Some of the responses by
Figure 4. Europe as Risky Destination.
Heat map. Countries colored with blue represent the nationality of the concerned tourists who inquire in TripAdvisor about the presence of migrants on touristic destinations. Countries colored with red represent the destinations that concerned tourists inquire about. The size of the bubble reflects frequency. Data source: TripAdvisor.com. Date: 24 March 2016. Analysis by Ana Garza, Cristiaan van Wijk, Giovanni Carta and Izumi Otsuka. Visualization with Carto Builder, https://carto.com/builder/.

Figure 5. Concerned Tourists and their Potential Destination.
Stream graph. On the left side of the graph one’s sees the countries in which tourists are located (according to their TripAdvisor information) and on the right the countries that they wish to visit but are having reservations toward. Data source: TripAdvisor.com. Date: 24 March 2016. Analysis by Ana Garza, Cristiaan van Wijk, Giovanni Carta and Izumi Otsuka. Visualization with RAWGraphs, http://rawgraphs.io.
commentators that highlight the media can be exaggerated and alarmist and respondents more often than not dismiss concerns that are being instigated by the press. For example,

I have just read an article regarding the Syrian refugee crisis in the Mediterranean. Now I know it’s not wise to believe anything you read in the Daily Mail which is why I wanted to ask whether anyone who has been to Rhodes recently can confirm whether the reports are true? Apparently thousands of refugees arriving in Greece via Turkey, and overrunning the streets? (Jinnyjinb0b, 2015)

The comment is responded further by saying, “and . . . again an overdramatisation by the British press. The illegal immigrants on Kos were simply doing ‘as instructed’ [and] waiting to be processed outside the police station . . . no drama” (FugeeBlues, 2015). Others, however, reinforced the negative perceptions of the tourist and offer warnings. Still others provide a pragmatic and less politicized engagement, simply answer the question. Finally, one also finds tourists asking about charity and volunteer opportunities, which, contrary to the previous concerned tourist trying to avoid intersecting with the route, they seek explicitly to intercept it.

**Conclusion: Route-Work as Platform-Work**

We began by presenting two different accounts of migrant routes and their respective relationships with digital infrastructure and social media. The securitized route involves routes made safe by vertical state interventions, and hardware and software for monitoring and regulating the Mediterranean crossing, with the deal between the EU and Turkey playing a key role. The connective route in turn involves horizontal interventions by migrant and aid workers, for whom connectivity becomes a sort of lifeline. Here, route-work is user-generated and done in real-time by actors seeking to sustain and enrich the connectivity of the route. This same connectivity, it is argued, makes migrants vulnerable to state surveillance, making digital infrastructures and platforms both empowering and disempowering. We expanded the list (so to speak) by capturing other accounts of migrant routes, along with their issues. The route-work performed by image brokers at Getty leads us to a “sanitised route,” which is a journey telling inevitably of integration. When turning to the users of TripAdvisor and the forums dedicated to discussing the effects of the migration/refugee crisis, the outcome is an “interrupted tourist route” where the mobilization and immobilization of migrants is making European space appear inconvenient. To continue to devise the means to capture accounts of migrant routes in the making is relevant as it nuances dominating discourse of irregularisation of migration. Framings and understandings around migration may involve campaigns, lobbying and storytelling, which in turn articulate how displacement is made into a human rights crisis or as a security threat, to name some, with resources and sentiments then accordingly mobilized. Social media have further distributed and diversified this type of route-work, and its performance has become entangled too with the details of its platforms. Consequently, framing route-work (and bordering) as a form of platform-work, and offering techniques for it to be studied with issue mapping and digital methods, is our proposal for how one may do migration studies with digital devices.

![Figure 6. Destinations and Their Issues.](http://rawgraphs.io)

**Figure 6.** Destinations and Their Issues.
Stream graph. On the left side one sees countries that tourists have expressed having concerns toward and on the left the nature of their concerns, namely safety, transportation, difficulty crossing borders, presence of refugees, interruption of leisure, and chaos. Data source: TripAdvisor.com. Date: 24 March 2016. Analysis by Ana Garza, Cristiaan van Wijk, Giovanni Carta and Izumi Otsuka. Visualization with RAWGraphs, http://rawgraphs.io.
literacy (to tweak settings), and alongside it new questions emerge both for the fields of migration studies and social media studies. For example, in fear of surveillance migrants prefer to use encrypted services such as WhatsApp, making some platforms better suited for the job than others. Routes and destinations are “reviewed,” and one is left to wonder if their “likes” or “shares” contribute to the reputation of the routes or social capital of smugglers (as there is fear of scams), and if so, if one could speak of alternative migration metrics. Also, the settings of social media are repurposed strategically by smugglers and migrants to make their “media journeys” (an overlapping of digital and physical infrastructure) available to other migrants and obscure to state detection, while the role of platforms in regulating these behaviors remains open ended. Ultimately, by capturing other accounts and thus other media journeys using platforms we add to the ongoing debates about the role of social media in times of crisis, and contribute to it by informing how one may include social metrics, rankings, and user participation in order to advance a critique of borders and geographical imaginaries.

Acknowledgements

The authors would like to thank Ysabel Camus, Giovanni Carta, Daniela Demarchi, Ana Garza, Elias Gorter, Marinx Hersbach, Denise van Kollegenburg, Ash Monzer, Izumi Otsuka, Yasar Ozcan and Cristiann van Wijk, who participated in Digital Issue Mapping, University of Amsterdam, Spring 2016. Their software data visualizations are reproduced with permission.

Declaration of Conflicting Interests

The author(s) declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

Funding

The author(s) disclosed receipt of the following financial support for the research, authorship, and/or publication of this article: This project has received funding from the European Union’s Horizon 2020 research and innovation program under grant agreement no. 732942.

Notes

1. The image scraper, Import.IO, set to “suggested results,” is employed to extract the top 20 resulting images associated with the queries “refugee” in combination with geographical tagging for Syria, Turkey, Greece, Macedonia, Serbia, Croatia, Hungary, Austria, Germany and Sweden. Query made on 3 April 2016.

2. The list of countries that compose the route is compiled using a UNHCR report (The United Nations Refugee Agency, 2016). Sweden, even though not mentioned in the report, is included because of its status as a sought-after destination by refugees at the time of the writing.

3. The Web Scraper (an extension of Google Chrome) is employed to scrape the 100 most relevant results per country on both the Al Jazeera website and the BBC News website. The query employed was (Refugee + country name), with countries including Syria, Turkey, Greece, Macedonia, Serbia, Croatia, Hungary, Austria, Germany and Sweden. The headlines that discussed political issues without mention of the refugee crisis were excluded.

4. Using a research browser in Mozilla Firefox Google’s search engine is queried on 24 March 2016 for (site: www.tripadvisor.com “migrant crisis”) and (site: www.tripadvisor.com “refugee crisis”). The resulting Trip Advisor forums and their corresponding URLs (55 for the keyword “refugee crisis” and 45 for “migrant crisis”) were collected using the tool “DMI Harvester,” which extracts URLs from text, source code and search engine results. Two different types of data were manually collected, namely, the questions posted by authors of the forums and the responses posted by users of the platform.

References

Aiello, G. (2012). The “other” Europeans: The semiotic imperative of style in Euro Visions by magnum photos. Visual Communication, 11, 49–77. doi:10.1177/1470357211424686

Aiello, G., & Woodhouse, A. (2016). When corporations come to define the visual politics of gender: The case of Getty Images. Journal of Language and Politics, 15, 352–368. doi:10.1075/jlp.15.3.08ai

Amilhat Szary, A., & Giraut, F. (2015). Borderities: The politics of contemporary mobile borders. In A. Amilhat Szary & F. Giraut (Eds.), Borderities and the politics of contemporary mobile borders (pp. 1–19). Basingstoke, UK: Palgrave Macmillan.

Balibar, É. (2002). Politics and the Other Scene. London, England: Verso Books.

Balibar, É. (2004). We, the people of Europe? Reflections on transnational citizenship. Princeton, NJ: Princeton University Press.

Ben-David, A. (2012). The Palestinian diaspora on the Web: Between de-territorialization and re-territorialization. Social Science Information, 51, 459–474. doi:10.1177/0539018412456769

Berry, M., Garcia-Blanco, I., & Moore, K. (2015). Press coverage of the refugee and migrant Crisis in the EU: A content analysis of five European countries. Retrieved from http://www.unhcr.org/operation/operations/566b369c9/press-coverage-refugee-migrant-crisis-eu-content-analysis-five-european.html

Bigo, D. (2014). Death in the Mediterranean Sea: The results of the three fields of action of European Union border controls. In Y. Jansen, R. Celikates, & J. de Bloois (Eds.), The irregularization of migration in contemporary Europe: Detention, deportation, drowning (pp. 55–70). London, England: Rowman & Littlefield.

Bucher, T. (2013). The friendship assemblage: Investigating programmed sociality on Facebook. Television & New Media, 14, 479–493. doi:10.1177/1527476412452800

Chouliaraki, L. (2006). The spectatorship of suffering. London, England: SAGE.

Chouliaraki, L., & Stolic, T. (2017). Rethinking media responsibility in the refugee ‘crisis’: A visual typology of European new. Media, Culture & Society, 39, 1162–1177. doi:10.1177/0163443717726163

Cogan, A. (2016, June 9). How technology is affecting the refugee crisis. Retrieved from https://www.mercycorps.org/articles/afghanistan-greece-iraq-syria/how-technology-affecting-refugee-crisis
Squire, V. (Ed.) (2011). *The contested politics of mobility: Borderzones and irregularity*. Abingdon, UK: Routledge.

StCroixR, S. (2015, September 9). *Symi impacts of migrant* [Post in TripAdvisor.com]. Retrieved from https://www.tripadvisor.co.uk/ShowTopic-g189450-i6016-k8845510-Symi_impacts_of_migrant_crisis-Symi_Dodecanese_South_Aegean.html

Stuart-Mansell. (2015, June 10). *Migrant crisis* [Post in TripAdvisor.com]. Retrieved from https://www.tripadvisor.com/ShowTopic-g187886-i343-k8545329-Migrant_Crisis-Sicily.html

Tsoukala, A. (2011). Turning immigrants into security threats: A multi-faceted process. In G. Lazaridis (Ed.), *Security, insecurity and migration in Europe* (pp. 179–200). London, England: Ashgate.

The United Nations Refugee Agency. (2016). *Regional refugee and migrant response plan for Europe Easter Mediterranean and western Balkan Route*. Retrieved from http://rmrp-europe.unhcr.org/2016_RMRP_Europe.pdf

van Houtum, H. (2012). Remapping borders. In T. Wilson & H. Donnan (Eds.), *A Companion to border studies* (pp. 405–418). Hoboken, NJ: Wiley-Blackwell Publishing.

Vukov, T., & Sheller, M. (2013). Border work: Surveillant assemblages, virtual fences, and tactical counter-media. *Social Semiotics, 23*, 224–241. doi:10.1080/10350330.2013.77792

Wilson, T., & Donnan, H. (2012). Borders and border studies. In T. Wilson & D. Hastings (Eds.), *A companion to border studies* (pp. 1–26). Hoboken, NJ: Wiley-Blackwell Publishing.

**Author Biographies**

Natalia Sánchez-Querubín is a doctoral researcher with the Amsterdam School for Cultural Analysis, a member of the Digital Methods Initiative, and Lecturer at the New Media & Digital Culture program at the University of Amsterdam. Her research interests include social media, health, and digital media witnessing.

Richard Rogers is Chair of the Department of Media Studies and Professor of New Media & Digital Culture, University of Amsterdam. He is also Director of the Digital Methods Initiative, Amsterdam.