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## **Learning to Look Beyond the Frame: How Is the “Blind Field“ of a Photo Filled?**

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gefüllt?**

**Markus Hilander** 

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## Learning to Look Beyond the Frame: How Is the “Blind Field” of a Photo Filled?

*Was jenseits des Rahmens liegt: Wie wird der „blinde Fleck“ des Fotos gefüllt?*

**Markus Hilander**

### Abstract

This article discusses the processes of the interpretation of photos from a semiotic perspective. The main data-set covers drawings by Finnish high school students. These drawings depict the “blind field”—that is, the empty space surrounding the photo’s frames—of a photo taken in New York City. Every photo is framed in some way as it reveals only a part of the landscape it attempts to depict. Theoretically, it is argued that one’s life experience, education, and social relationships among other things affect how the viewer fills in the blind field. Therefore, the blind field is said to be the source of meanings in relation to a photo. Ontologically, photos are not understood as objective re-presentations of the world, but as subjective worldviews as photos are always taken by somebody and looked at by someone. This interaction between the photographer and the viewer is approached by asking: to what extent do the blind field and the students’ drawings in the blind field explain the meanings of the photo? This is a relevant question when taking into consideration the fact that a student’s way of interpreting photos in, for instance, geography textbooks might differ from that of the geography teacher. Therefore, the main argument of this study is that photos should not be taken for granted. Moreover, the elements that are not made visible in the photo also form an important part of the interpretation of photos.

**Keywords:** blind field, cultural geography, interpretation of photos, punctum, semiotics, visual methodology

### Zusammenfassung

*Den Gegenstand der vorliegenden Arbeit bildet die Interpretation von Fotos aus einer semiotischen Perspektive. Finnische Schülerinnen und Schüler der Sekundarstufe fertigten Zeichnungen an, auf denen diese den sogenannten „blinden Fleck“ (den nicht abgebildeten Raum um einen Bildausschnitt herum), eines in New York City aufgenommenen Fotos ergänzten. Auf jedem Foto wird jeweils nur (ein vom Fotografen bestimmter) Ausschnitt einer Szene abgebildet (in diesem Fall einer Stadtlandschaft). Auf welche Art und Weise ein Individuum den „blinden Fleck“ füllt, wird unter anderem von individueller Lebenserfahrung, Bildung und sozialen Hintergründen beeinflusst. Vor diesem Hintergrund kann an der Art und Weise, wie der „blinde Fleck“ zeichnerisch ausgefüllt wird, auf Bedeutungszuschreibungen des Fotos geschlossen werden. Ontologisch bilden Fotos keine objektive Darstellung der Welt. Von Individuen aufgenommen und von Individuen betrachtet, spiegeln Fotos deren subjektive Weltwahrnehmung wider. Die Interaktion zwischen Fotograf und Betrachter lässt sich am Beispiel der Schülerzeichnungen des „blinden Fleckes“ erschließen. Hier wird der Frage nachgegangen, zu welchem Ausmaß die zeichnerischen Ergänzungen der Fotos im „blinden Fleck“ Bedeutungszuschreibungen der Fotos erklären. Die Relevanz dieser Frage lässt sich anhand einfacher Beispiele, wie der unterschiedlichen Interpretation eines im Schulbuch abgebildeten Fotos durch die Lehrkraft einerseits und die Lernenden andererseits erklären. Vor diesem Hintergrund sind für die Deutung des Fotos solche Elemente der Schülerzeichnungen besonders relevant, die auf dem Fotoausschnitt nicht abgebildet und somit dort nicht sichtbar sind.*

**Schlüsselwörter:** Blinder Fleck, Kulturgeographie, Interpretation von Fotos, punctum, Semiotik, visuelle Methoden

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## 1 Introduction: A Desire to Apply Semiotic Concepts to Practice

Photographs have always played a major role in geographical studies (BEHNKE, 2014; SANDERS, 2007). However, photos are repeatedly used in geography as descriptive illustrations of arguments instead of as active players in the construction of a range of different kinds of geographical knowledge (ROSE, 2008, 151). Photos are presented as unproblematic pictures of how places appear, and it seems to be assumed that everyone will interpret the photos in the same way. Using photos as simple illustrations of what a place looks like avoids thinking about the representational qualities of photos, the meaning-making processes (i.e. semiosis), and the invisible aspect of photos. In a highly visual world, the place of the image in the education and training of geographers should be rethought (HOLLMANN, 2014).

Verónica HOLLMANN (2014, 144) argues that “[v]isual training should experience a shift from a technical to a critical and interpretative approach oriented to the acquisition of knowledge and methodologies to place images in relation to practices of looking, geographical knowledge, and power.” My study also highlights the importance of promoting visual literacy in order to allow geography students to recognize images as much more than illustrations. The research gap that this study engages in filling originates in the fact that the combination of geography and semiotics is rather rare. In this article, semiotic concepts are transferred into practice in the context of cultural geography and geography education. Consequently, this article addresses questions concerning the

visual culture and introduces new, deeper and more imaginative methods to interpret photos for geographers to employ in both teaching and research (RYAN, 2003).

Although geographers use photographs in their research, they tend to be interested in the “final” meanings of visual re-presentations rather than the processes through which the meanings are produced. To approach these processes, a photo taken in New York City was printed on paper, and Finnish high school students, Finnish university students, and members of Finnish and international conference audiences were asked to draw the surroundings around the photo (i.e. the blind field). In the field of semiotics, a composition analysis is frequently used in order to approach one particular photo or another piece of art and its meanings (SEPPÄ, 2012, 154). This sort of analysis can also address innovative ways of using photos in geography education; such as, how photos can work as tools to enhance students’ geographical thinking skills and geographical media literacy skills (CIAN, 2012; HILANDER & VÄLIMAA, 2014; HILANDER, 2016). As a consequence, the main questions this article addresses, are: When people are asked to draw their mental images around a given photograph, what sort of signs are those drawings? To what extent do these drawings explain and transfer meanings to the photo itself?

This article examines the idea of a blind field (*champ aveugle*) by Roland BARTHES (1981); that is, considering the surroundings of a photo that have been cut off from the photo itself (KNUUTTILA, 2007). The frame that is constructed around the picture marks

the limits not only of the picture, but also of the real world around the picture. However, it is impossible to decide logically where the borders of the frame stop and the photo begins (LITTLEFIELD, 2001, 63). The hypothesis of this research is that the photo provided is an object of a particular exercise of the semiotic act (TARASTI, 2000); that is, the process of drawing offers the opportunity to alter the meanings of the photo. Therefore, this article does not only examine the already made photo in the case of cultural geography, but visual re-presentations are also made in the form of drawings.

This article is divided into four sections: Theoretical background, Method and sample, Results and discussion, and Concluding remarks. As the semiotic approach is based on a qualitative and interpretative content analysis that is executed using the terminology of semiotics, it works both as theory and methodology. Both the chapter on theory and the chapter on results and discussion have been divided into three units respectively to help the reader relate semiotic concepts in theory to those applied in practice. The first unit (1) considers whether a photograph depicts the worldview of the photographer or the viewer; that is, whether the photograph dominates the drawing or vice-versa. In the first unit, the first phase of the content analysis is introduced; that is, the drawings are categorized either into signified or signifier. The second unit (2) is concerned with the redefinition of the section of reality

that the photos may alternatively show. In the practical part of this unit, high school students were asked to delineate a new border frame for the photograph in question. This procedure highlights the elements in the photo that have gained most attention from the students (i.e. the punctum). The third unit (3) asks whether a content analysis could be built on the elements not shown in a photograph or a drawing; this question is concerned with how to approach the invisible aspect of images. In the third unit, the second phase of the content analysis is introduced; that is, the invisible elements of the drawings are tracked by comparing questionnaire data (i.e. written text) with the content of the drawings (i.e. visual text).

The main research questions of this article are as follows:

1. Previous studies on geography education have shown that quite often people, or even stick figures, are not drawn into landscapes depicting cities; therefore, have the participants included people in their drawings in this study? And if so, why?
2. When it comes to the relationship between the photo and the drawings collected, which one dominates: the photographer and the meanings of his photo or the viewers of the photo and their drawings?

## 2 Theoretical Background

### 2.1 Which One Dominates: The Photograph or the Drawing?

In the new branch of semiotics, called “neo-semiotics,” already-existing ideas are twisted in order to build new concepts and meta-languages. This research contributes to these new philosophical and methodological discussions of signification conceived in the 2010s (TARASTI, 2012, 316). In this debate, the semiotic functions, such as denotation and connotation, remain the same but are embedded and used in a new context; for instance, they can form the basis to conduct a content analysis. Why is the concept of connotation used in this study, then? Already in the 1970s, BARTHES (1977, 85) stated that connotations are likely to be important in semiology. He continued that “[c]onnotative phenomena have not yet been systematically studied” (BARTHES, 1977, 90). Furthermore, a Finnish researcher, Virpi BLOM (1998, 212), claimed that the analysis of connotations is at the heart of interpretation (see, HILANDER, 2012a, 76). It is the processes of interpretation of photos and the geographical content of photos that are in focus in this article.

In relation to the drawings studied here, it is possible to focus on what sorts of connotations the students and the members of conference audiences have drawn around the photo. In this context, the photograph plays the role of denotation, showing all the elements in the photo that can be seen and named. The drawing, then, expresses ideas and feelings that the subject may have experienced personally and may thus have attached to the photo; or as John BERGER (1973, 9) puts it, “[...] we are always looking at the relation between things and ourselves.” at

It is in this dialogue that the meaning can be found rather than being situated in some particular place, for instance, in a photo, sign, or text (TARASTI, 2000, 18; VOGLER & HENNIG, 2014, 189). Hence, the drawings play the role of connotation (HILANDER, 2012a; SEPPÄ, 2012).

Furthermore, denotation and connotation can analytically be split into two parts, the signifier (*signifiant*) and the signified (*signifié*) respectively. In *Decoding Advertisements*, Judith WILLIAMSON (1978, 31–36) approaches advertisements as both signifiers and signifieds. This division can also be used for drawings. On the one hand, when a photo dominates the drawing and its meanings, the photograph itself is the signifier; on the other hand, when the drawing is the signifier, the subject rejects the ready-made signified (i.e. the photo and its meanings), and thus a semiotic act will take place (TARASTI, 2000, 139). Next, these two cases are studied in more depth following WILLIAMSON’S (1978) argumentation.

WILLIAMSON (1978, 31) states that a “[...] product, which initially has no ‘meaning’, must be given value by a person or object that already has a value to us, i.e. already means.” Therefore, the product being advertised is the signified, and the correlating thing is the signifier (BLOM, 1995, 17–18). In a case where the photograph’s elements continue smoothly to the drawing, the drawing is dominated by the photograph; hence, the photograph is the signifier (TARASTI, 2000, 139). Gillian ROSE (2012) says that these sorts of signs are synecdochal signs. She writes that this “[...]”

sign is either a part of something standing in for a whole, or a whole representing a part” (ROSE, 2012, 121). There is an advertisement for a Finnish shipping company that is a good example of a synecdochal sign; even though only the letters “NG LI” can be seen, Finns will understand that the letters stand for Viking Line (HILANDER, 2013).

When meanings are transferred to the product from other objects that co-exist in the advertisement, the product itself comes to mean something. In this process, the product often becomes the sign itself, the signifier, which gives meanings to its surrounding elements and events (WILLIAMSON, 1978, 34–36; BLOM, 1995, 18–20). The product, or the drawing, now has the power to dominate (TARASTI, 2000, 139), whereas the role of the photograph is reduced to the signified. ROSE (2012, 120) calls these kinds of connotations metonymic signs; essentially, photographs are metonymic signs because they depict only a part of the landscape by the *pars pro toto* principle (KNUUTTILA, 2007, 47). In more detail, metonymic signs are something associated with something else, which then re-presents that something else; that is, an attribute is given the name instead of the object itself. Or as BARTHES (1977, 55) would put it, all the other signs around the photo (i.e. in the blind field) are more important than the photo itself. In this case, the drawing explains the photograph’s connotations by filling the blind field with the subject’s own ideas, thoughts, and mental images.

However, the blind field can only be filled if the photo succeeds in touching the viewer physically and emotionally (KNUUTTILA, 2007, 47). In order for a photo to profoundly speak to its viewer, he or she needs to have some sort of a personal or intentional relationship

with the photo and its object. It is the viewer’s knowledge, culture, time and place that make images speak (HOLLMANN, 2014, 144). It is then that the viewer cannot be sure if he or she is looking at the photo (e.g. of a friend) or its real-life object (i.e. the friend is standing in front of the viewer) (BARTJES, 1981, 45). Indeed, the viewer is usually given the freedom to interpret a photo according to his or her own beliefs (HILANDER, 2012a; PIENIMÄKI, 2013), which indicates that most of the drawings in this study should dominate the photo (i.e. be signifiers). Nonetheless, there tend to be great similarities in the ways people interpret photos because “[...] the systems of cultural conventions which link signifier and signified are thought of as being relatively stable over time and within a community” (WINDSOR, 2004, 182).

## 2.2 Arguing a New Framing for the Photo

The Finnish Professor Janne SEPPÄNEN (2008, 16) states that arguing for one’s own interpretation is one of the most essential skills where visual literacy is concerned. This, too, means that the viewer can interpret visual images as he or she pleases as long as there are strong arguments behind the interpretations made (HILANDER, 2013). People can interpret a certain photo in different ways if the relationship between the photo and the viewer is seen as an indexical connection; that is, if the viewer is communicating with the photo and establishing a subjective relationship with it (HILANDER, 2012a, 75–76). In this process, the photo first promotes specific connotations as the signifier, but later the viewer himself or herself becomes the signifier (i.e. in this research, the

drawings). That is, the denotations of the photo remain the same, but the blind field and its connotations change with each of the countless moments when the photo is interpreted; this is called the unlimited semiosis (KNUUTTILA, 2007, 35; HILANDER, 2013). The enablement of this process can be explained, for instance, by the concept of punctum. BARTHES (1981, 27) describes the punctum as a detail of a photo that “pricks and bruises” the viewer and makes him or her add some subjective content to the photograph. Hence, the viewer has the opportunity to alter the meanings of a photo to be closer to his or her own worldview and values. Even though the punctum of a certain photo may vary from viewer to viewer, the concept of punctum is universal in that it does exist in spite of variation. Paradoxically, while remaining a detail, the punctum has the power to expand and fill the whole picture and, especially, its blind field in a metonymic manner (BARTHES, 1981, 43–45). However, every attempt to express the punctum linguistically is more or less problematic because it cannot thoroughly be reached in verbal language (SEPPÄNEN, 2014, 164). BARTHES (1981, 51) himself stated that “[w]hat I can name cannot really prick me.”

Another type of arguing and an important aspect of visual literacy is the skill of delivering alternative interpretations for a photo (SEPPÄNEN, 2008, 148). These can include, for instance, exercises where students imagine they lived in the landscape depicted by a photo or that they were on holiday there. It was BERGER (1973, 11) who stated that when people see a landscape, they situate themselves in it. In addition, BARTHES (1981, 38) argued that photographs of landscape must be habitable, not “visitable.”

### 2.3 A Landscape Is Not About a Man

*Helsinki smells of the sea, Paris of the dust of the metro and Gaulois tobacco, Bahia of dendeé oil, and Imatra of the wood industry.*

(TARASTI, 2000, 9)

Very often the invisible aspect of images is left out of the discourse of visual methodologies. However, the elements not shown in images are as important as those one can see for the interpretation of photos (HILANDER, 2012a, 74). BERGER (2001, 217) argues that “[t]he true content of a photograph is invisible.” While photos with their semiotic functions, such as the indexical and metonymical aspects, possess an inherent credibility of recording what has been seen (KANWISCHER & GRYL, 2014), a photograph always and by its nature refers to what is not seen (BERGER, 2001, 217). BARTHES (1981, 6) has also said that “a photograph is always invisible.” A practical example from children’s photography illuminates the invisible aspect of photos. When it comes to children and photography, children do not find anything wrong or missing in their photos even though, for instance, an insect that was the target flew too fast and did not materialize in the photo. Even though the insect might be invisible to the common viewer, this is not the case for the young photographer (SETÄLÄ, 2012, 181–182). WILLIAMSON (1978, 24) elaborates the idea by arguing that the identity of an object depends more on what it is not than what it is. This sort of approach that emphasizes what is not re-presented in the drawings—that is, hidden phenomena—deserves special attention (KANWISCHER & GRYL, 2014).

Among these hidden phenomena are “people” themselves. For example, in a research conducted by BÉNEKER, SANDERS, TANI and TAYLOR (2010) less than half of the young people in every participating country—England, Finland, the Netherlands, and the USA—drew people in their urban landscapes when they were asked to imagine that they were in a city and looking out of a window. Therefore, the anticipation that “people” should be included in drawings comes from the fact that usually they are not. However, although people or even stick figures are not drawn, people are usually seen to be an interesting element of a photo. For instance, in a previous study (HILANDER, 2012a, 78), a photo taken in the subway station of Times

Square, New York City, was shown to students ( $n=106$ ) at a high school in Finland, and they were asked what they would do if they were in the place and space depicted in the photo at that moment. The result was that 65 per cent of them would have stayed in the subway station and watched the dancing boys in the picture in order to find out what they would do next. Noticeably, the most intriguing element in the picture was the dancing boys, that is, people. However, only 37 per cent of the students included people in their own drawings when they were asked to draw on a blank piece of paper whatever comes first to their mind when thinking about New York City before they were shown the photo of the dancing boys (HILANDER, 2012b).

### 3 Method and Sample

#### 3.1. Finnish High School and University Students

To approach the processes through which meanings are produced when interpreting a picture, a photo (FIG 2–4) taken by Hilander in New York City in 2008 was printed on an A3-sheet and a total of 64 students from an upper secondary school located in Helsinki were asked to draw their ideas around the photo. The main results of this article are based on the work with this group of high school students. The data collection took place on May 15<sup>th</sup>, 2013. 44 girls and 20 boys between 16 and 19 years of age took part in the study. 84 per cent of them reported they would not be taking the matriculation examination in geography. Interestingly, 44 per cent of them ( $n=63$ ; that is, one student did not answer this question) thought that the skills in interpreting images were sufficiently

taught in geography lessons and the same amount (44 %) hoped that it would be taught more intensively compared to the present situation (question number 8 on TAB 1). The students were given no time limit to draw the blind field of the picture handed over to them. That is, the students finished the questionnaire well before the lesson (75 min) ended.

In addition, more drawings and questionnaire data were collected from Finnish university students attending a course on Visual Methodologies at the Department of Teacher Education, University of Helsinki in April 2014 ( $n=18$ ) and 2015 ( $n=20$ ). 36 females and two males between 22 and 55 years of age took part. The participants were studying to become class teachers ( $n=17$ ),



craft teachers ( $n=9$ ), home economics teachers ( $n=5$ ), kindergarten teachers ( $n=3$ ) and special education teachers ( $n=2$ ). In addition, one Ph.D. student in education and one multicultural teacher-training student were attending the course.

The wording of the main task for the students was as follows: *Imagine that you could expand and/or continue the photo and the landscape it depicts by drawing. What sort of things and mental images do you relate to the photo? Draw your mental images around the photo on the A3-sheet. Your skills in drawing do not matter!*

In addition, the students were asked to fill in a questionnaire (TAB 1). The first task in the questionnaire was presented before the students saw the photo. The results of the first question are used as the basis for the second phase of the content analysis; that is, in tracking the invisible elements of the drawings.

### 3.2 Finnish and International Conference Audiences

In addition to the Finnish high school and university students, a number of participants ( $n=65$ ) in subject-specific conferences (TAB 2) were asked to draw their ideas while listening to a presentation. In this case no questionnaire data had to be filled in. This task had a time limit of about 15 to 20 minutes and the aim was to see to what extent the results of students could be compared with specialists in the field. Consequently, the drawings made by the members of the conference audiences required special attention. However, the conference audiences were not shown any drawings that were already collected. A more general reason for using this kind of data-set was to explore whether conference audiences could be seen as suitable participants for this kind of research in the first place.

**TAB 1** *The main tasks in the questionnaire (Source: author)*

1.	Imagine that you are walking in a city center and pass a McDonald's. Make a list of things that come to your mind about what you would find next to the McDonald's.
2.	Look at the photo I gave you and name three details that catch your attention in it.
3.	What would you do in the place that the photo depicts, if a) you were living there, and b) you were on holiday there?
4.	What would you now do in the landscape that both the photo and your drawing depict?
5.	a) Make a new frame for the photo below. b) Give your reasons for leaving certain things outside your frame.
6.	Have you been to New York City?
7.	How often do you pay attention to road signs and street names?
8.	In your opinion, to what extent should interpretation of photos be taught in geography lessons at the high school level? By interpretation of photos I mean, for example, thinking about the reasons why the photo has been taken.

**Tab 2** *Conferences where additional drawings were collected (Source: author)*

Conference	Country	Year	Number of participants
Educational Research Methodology in an European Context	Jindřichův Hradec, Czech Republic	August 2013	25
International Geographical Union regional conference	Krakow, Poland	August 2014	9
World Congress of Semiotics	Sofia, Bulgaria	September 2014	11
Annual Meeting of Finnish Geographers	Oulu, Finland	October 2014	17
Annual Meeting of the Association of American Geographers	Chicago, USA	April 2015	3

Although the drawings collected during the conference presentations might possibly distort the data-set—because the members of the audiences were told about the theoretical background of this research while they were drawing—still only a quarter of their drawings were classified as signifiers (see

the Results and discussion chapter). That is, one might have expected them to implement the semiotic act by using their geographical imagination and life experiences even more. The whole data-set covers 167 drawings and 102 completed questionnaires (TAB 3).

**Tab 3** *The three groups of participants and the type of data collected (Source: author)*

High school students	<i>n</i> =64	Drawings and questionnaires
University students	<i>n</i> =38	Drawings and questionnaires
Members of conference audiences	<i>n</i> =65	Drawings

### 3.3. Analyzing the Data-Set

In order to ensure that all the drawings were analyzed similarly, none of them were examined between the years 2013 and 2015 until all of them were collected. In spite of this, it can be said that the saturation point was achieved because when the analysis started it came clear that the same elements in the drawings more or less repeat themselves. Unlike in a classical research in which visual methodologies are used, a researcher-based analysis of the drawings was conducted (cf., MITCHEL, THERON, STUART, SMITH & CAMPBELL,

2011), because the “clinical analysis” aimed at the drawings themselves (i.e. the visible). The entire set of drawings (*n*=167) was categorized into signifiers and signifieds by Markus Hilander and Aino Tanttari. As a geographer who has visited New York City twice, the expertise of Tanttari offered the possibility of discussing the most challenging cases. It also ensured that the principles for the categorization of the drawings into signifiers and signifieds remained the same throughout the analysis. Accordingly, in cases where the drawing noticeably changed the atmosphere and the meanings of the photo,

the drawing was classified as a signifier. In these cases, the subject who produced the drawing could be seen as a co-author of the work.

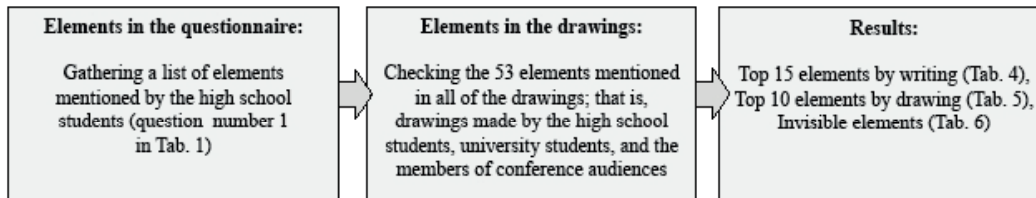
A different set of results was derived from the high school and university students ( $n=102$ ). In both of these groups the aim was to identify the punctum. Because the punctum cannot easily be represented in verbal language, the punctum of the photo in this study was approached by asking the students to make a list of three details that caught their attention (question number 2 in TAB 1). With this procedure, the diegesis (i.e. a list of denotations) of the photo is established (SEPPÄ, 2012, 146). In the results section, the top ten denotations or details (i.e. the elements that were mentioned most by the students) are presented, and special attention is paid to the top three details. The next step to get closer to the idea of punctum was to ask the high school and university students ( $n=98$ ; i.e. four participants did not answer this question) to redefine the frame of the photo, meaning that they were asked to produce their own picture (question number 5 in TAB 1). An average frame was calculated from all of the individual frames made by the students (FIG 4). Measurements in centimeters were taken to see how much smaller in size each of the four edges were from the edges of the original photo in each case. As might be expected, the new frames were smaller than the original photo in most cases, but few students had made one of the edges of their frame larger than in the original photo, and this was taken into account.

The next step of the analysis was to compare the top 3 details with the new average frame. The question is: are the top three details left inside the new frame? The

hypothesis is that the elements should be inside the new frame considering that the students have themselves chosen which of the photo's elements they find the most intriguing; that is to say, why frame the elements which one finds the most attractive in the beginning of the study outside the photo? Nonetheless, as stated earlier in this article regarding unlimited semiosis, people can interpret the same photo differently each time they look at it. Thus, the question is whether unlimited semiosis also takes place between answering questions number 2 and number 5 in the questionnaire (TAB 1). If an element is framed out, although it is mentioned most in question number 2 and has made its way to the top 3 list of the details, the element is categorized as a mere denotation of the photo. On the other hand, if the element in the top three list is left inside the new, average frame, it is categorized as the punctum of the photo. From a geographical perspective, it is rather exciting to find out which kind of element is the main punctum of the photo; for instance, is it a stable or a dynamic element by nature?

Additionally, the high school and university students were asked to imagine and describe what they would do in the landscape depicted in the photo (a) if they lived there, and (b) if they were on a holiday there (question number 3 in TAB 1). In addition, it was asked (c) what they would do in the landscape depicted by both the photo and their own drawings around it (question number 4 in TAB 1).

The supporting idea behind the second phase of the content analysis of the drawings is that a city may be remembered because of one's first impression of it (i.e. Firstness in the language of semioticians), which can be some passing sign apparently without any



**Fig 1** Steps of the second phase of the content analysis (Source: author)

context (TARASTI, 2000, 9). In the first phase of content analysis, both the drawings and the photo and, especially, their relationship were placed under theoretical examination. Thus, the photo was seen as the denotations and the drawings were seen as the connotations of this photo. In the second phase of the content analysis, only the drawings and their elements are inspected, which is why the drawings are now understood as mere denotations.

In order to approach the invisible aspect of images—that is, to detect the elements that the participants did not draw at all—the drawings were compared with external information offered by the questionnaire data. This information was gathered from the high school students’ written answers of the elements they think could be found in a city center (question number 1 in TAB 1). The

high school students mentioned altogether 53 elements in their answers, and these 53 elements or items were then checked in all of the 167 drawings. In other words, the list of the 53 elements that the high school students mentioned formed the basis for conducting the second phase of the content analysis of the drawings. In the next section, the top 15 elements mentioned by the high school students in writing are presented in TAB 4. In addition, the top 10 elements drawn by the high school students, university students, and the members of the conference audiences are presented in TAB 5. When comparing these two tables, a list of invisible elements when depicting an urban landscape are presented in TAB 6; that is, TAB 6 shows elements that were mentioned by the high school students but which nobody in the three groups drew (FIG 1).

## 4 Results and Discussion

### 4.1 Which One Dominates: The Photograph or the Drawing?

The printed photograph depicting the city of New York with people, cars, and skyscrapers can be seen in the middle of FIG 2. The 16-year-old girl added people, buildings (including the arch of McDonald’s on the left side), a car and also a continuation of

the pedestrian crossing as her blind field. Considering the fact that 80 per cent of the high school students reported they have not visited New York City (question number 6 in TAB 1), it is not surprising that 91 per cent of their drawings were categorized as signifieds (i.e. dominated by the photo); that is, there is no personal linkage between the students and the photo.

When taking into account the whole sample (i.e. all the 167 drawings collected), 83 per cent of the drawings were categorized as signifieds. This means that the photo dominates the meanings of the drawings in 83 per cent of the cases. Therefore, it seems that BARTHES (1977, 91) was right when arguing that connotation (i.e. the content of drawings) is "general, global and diffuse"; that is, there are great similarities in the ways people perceive an urban landscape.

In contrast, the student who drew the blind field in FIG 3 has implemented the semiotic act and abandoned the ready-made meanings of the photo; leaving the other sides of the paper almost totally blank, the 17-year-old girl drew a pond and a Ferris wheel that do not exist in the real, physical world of Broadway, New York City. That is why the relation between the photo and the drawing seems to change; in the drawing,

the amusement park, or at least the Ferris wheel, works as a connotator for a "space of consumption" (see, BARTHES, 1977, 91). It is certainly a fact that the pond and the Ferris wheel have been connected with the urban landscape through the continuation of the building and the street sign in the drawing, but that does not mean that they are logically connected with it. The idea of the drawing is not to invent meaning for the photo, but to introduce meaning into it by means of a sign system that is already known. The student has selected certain elements from the ordinary world and then rearranged and altered them to create a new world, the world of the subject herself (WILLIAMSON, 1978).

What other extraordinary elements that challenge the ordinary routines of depicting an urban landscape in addition to the Ferris wheel and the pond in Fig. 3 did the participants draw that made us classify their



**Fig 2** Drawing by a 16-year-old girl categorized as signified  
(Source: author and the high school student)



**Fig 3** Drawing by a 17-year-old girl categorized as signifier  
(Source: author and the high school student)

drawings as signifiers? All in all, the use of geographical imagination that altered the relation between the photo and the drawing was identified in 17 per cent of all the 167 drawings; that is, the semiotic act happened in 17 per cent of the cases. In more detail, nine per cent of the high school students' drawings were classified as signifiers. These drawings included elements such as a volcano, a shantytown and amusement parks. In addition, one student depicted the feeling of insecurity while another turned the photograph into an object that was eaten by a monster. With the university students, 13 per cent of their drawings were categorized as signifiers. They drew a sailing boat, a snow covered mountain, zoos, and amusement parks. From drawings made by the members of the conference audiences, 26 per cent were classified as signifiers. One member

drew a road that suddenly ended at a cliff while others drew a zoo and a roller coaster. In addition, two of them had altered the photo into the shape of a lamp and a television.

Here, the fact that the conference audiences were told about the research while they were drawing is noticeable (17% and 13% vs. 26%). Of course, there might be other reasons, such as the question of age and life experience, why the drawings made by the members of conference audiences challenge the meanings of the photo more than the drawings made by the high school and university students, but it cannot be stated for certain because none of the participants were interviewed (see, HILANDER & VÄLIMAA, 2014, 48). In the next section, the topics of punctum, making a new frame for the photo, and the habitable nature of photos are examined in more depth.

## 4.2 Arguing a New Framing for the Photo

In the search for the punctum of the photo, the high school and university students were asked to mention three details in the photo that caught their attention (question number 2 in Tab 1). The diegesis of the photo is as follows: the number one detail was the “yellow wall” on the right side of the photo as 45 per cent of the students mentioned it. The red “Sleepy’s” text on the left side of the photo took second place with 43 per cent of the references. People in general were in third place with 36 per cent of the references. The list of the top ten continues as follows: buildings in general (34%), the tall red building in the middle of the photo (29%), traffic lights (26%), the crosswalk (19%), [Bro]adway sign in the upper left-hand corner (14%), cars and taxis (12%), and plants on the top of the buildings (9%).

The next step is to compare the diegesis with the new frame produced by the high school and university students. The average new frame is marked with a black line in Fig. 4. The new frame is smaller than the original frame by 2.5 centimeters on the left side, 1.5 centimeters from the bottom, 2.9 centimeters on the right side, and 1.2 centimeters from the top. When compared to the top three details, people are the only thing that remained inside the new frame while the “yellow wall” and most of the “Sleepy’s” text is framed out. Hence, the punctum of the photo is people because they remained as an intriguing element of the photo during the unlimited semiosis that took place between answering questions 2 and 5 (Tab 1) in the questionnaire. But as seen in Fig. 4, some of the people are also outside the new frame; however, most of the

people are inside the average frame, and at least more frequent than the “yellow wall” and “Sleepy’s” text. In addition, it is worth noticing that the new frame alone does not depict the punctum; that is, the punctum of the photo is the people and not everything inside the new frame. From the geographical point of view, it is rather unfortunate that the [Bro]adway sign, which works as a geographical hint regarding the location, did not make its way inside the new frame.

When explaining the decisions in making the new frame, the arguments by the high school students were as simple as cutting the most unattractive and unnecessary objects off and leaving the most beautiful buildings inside the frame. For instance, a 17-year-old girl wrote: “I wanted to concentrate on the buildings and, therefore, framed people out; because the people are the same but the buildings differ from those in Finland.” But, there are also opposite arguments as people are seen to be the most attractive punctum of the photo. For instance, a 16-year-old girl argued: “What interests me most is on the ground level *where people are on the move*” [italics added].

When the students were asked what they would do in the landscape depicted in the photo (a) if they lived there and (b) if they were on a holiday there, they answered almost the same for both situations with going shopping (a 38% vs. b 39%), walking on the streets (a 29% vs. b 27%), and visiting restaurants or cafeterias (a 15% vs. b 30%) as the most often mentioned activities. The only difference here is that twice as many students would go to restaurants and cafeterias if they were on a holiday. Dwelling and spending free time



**Fig 4** *The average frame made by the high school and university students*  
(Source: author)

differ the most when it comes to working (38%) and studying (15%); these activities are only mentioned as part of the everyday life. Instead, seeing tourist attractions (44%) and taking photos (23%) only happens during vacation; interestingly, in this study, young people seem to associate photography only with holidays and not with their everyday life (cf., SINTONEN, KYNÄSLAHTI & KAITAVUORI, 2014). The students were also asked a third question about (c) what they would do in the landscape depicted by both the photo and their own drawings around it. In addition to the activities already mentioned—shopping (21%), visiting restaurants or cafeterias (20%), and walking on the streets (4%)—they would now visit

parks (23%) and enjoy being at home (5%). In the next section, the drawings are examined in more detail in relation to the elements that have and have not been drawn.

### 4.3 A Landscape Is Not About a Man

The second phase of the content analysis is based on the comparison of the written and visual data-sets. The top 15 elements that the high school students mentioned in writing in the questionnaire (question number 1 in Tab 1) are shown in TAB 4. From the 53 elements that the high school students mentioned in total, the most drawn



elements by the high school students, university students, and the members of conference audiences are “buildings” (91%), “roads” (84%), and “crosswalks” (74%). The rest of the top ten elements drawn by the three groups are shown in TAB 5. When comparing TAB 4 and TAB 5, one can see that almost the whole top ten list of the most drawn elements is included in the top 15 list of the most mentioned elements. The only exceptions are “road signs” and “sky”; to be exact, “road signs” were mentioned by only 2 per cent of the high school students but half of the three groups drew them and “sky” was mentioned by only 2 per cent of the high school students, but 39 per cent of the three groups drew it.

The large number of crosswalks and road signs might be explained by the fact that

there is a crosswalk and the [Bro]adway sign in the photo itself. A technical reason might explain why the sky was depicted in so many drawings; namely, there was plenty of space to depict the sky with airplanes, clouds, and the sun at the top of the paper on which the photo was printed. However, because the participants were not interviewed, this question remains open (HILANDER & VÄLIMAA, 2014, 48). Another intriguing feature in TAB 5 is that 41 per cent of the participants drew “parks, trees, and flowers.” Especially Finns have also drawn parks and open spaces in previous studies (BÉNEKER et al., 2010, 130; TANI, 2012, 162–164).

After the 53 elements which the high school students mentioned (question number 1 in TAB 1) in the questionnaire were checked in all the drawings, it was evident that not

**TAB 4** *The most mentioned elements in the questionnaire (Source: author)*

Top 15 elements mentioned	High school students mentioning these elements in the questionnaire (%)
Stores	78
Roads	45
Cars and buses	31
Bus stops	23
Garbage and litter bins	23
Restaurants	20
Buildings	20
People	19
Metro stands	19
Trams and tram stops	19
Parks, trees, and flowers	16
Traffic lights	13
Parking lots	13
Crosswalks	13
Billboards	11

**TAB 5** *The most drawn elements (Source: author)*

Top 10 elements drawn	High school students, university students, and members of conference audiences drew these elements (%)
Buildings	91
Roads	84
Crosswalks	74
People	61
Road signs	50
Cars and buses	47
Parks, trees, and flowers	41
Sky	39
Stores	25
Restaurants	17

all of the written elements were depicted in the drawings. These elements are what have been called in this article invisible elements. Tab 6 shows the invisible elements; that is, elements that were mentioned by some of the high school students, but which nobody from the three groups drew. The percentages in Tab 6 describe how many high school students mentioned the particular element in the questionnaire. For instance, 19 per cent of the high school students mentioned trams, as they are used in Helsinki, Finland, but nobody drew them. The lack of trams in the drawings could be explained by the challenging nature of drawing them. The reason might also derive from the fact that there are no trams in New York City. However, only a few drawings show evidence of being situated specifically in the city of New York. When it comes to elements such as “asphalt”, “teenagers”, and “hustle,” they are rather difficult to identify from the drawings. While in the previous sections routine elements were classified as signifieds and elements that challenge these routines of depicting urban landscape as signifiers, here, the elements not drawn can be understood as truisms; that is, elements that are taken for granted and, therefore, not included in the drawings. Another reason for not including these sorts of elements, such as “cigarette butts”, “dog feces”, and “spit,” might be that the drawings are to be understood as ways of showing not what is, but how things are seen (ROSE, 2008, 152). In this manner, the city is re-presented not as experienced, but as perceived ideal (HILANDER, 2012a, 80). However, in the research by BÉNEKER et al. (2010), mentioned earlier in this article, Finnish youths were not shy to depict a city as a place of social and environmental problems (TANI, 2012).

**Tab 6** *The invisible elements of the drawings*  
(Source: author)

Elements not depicted in the drawings	High school students who mentioned these elements in the questionnaire (%)
Trams and tram stops	19
Teenagers	8
ATMs	6
Asphalt	3
Cigarette butts	3
Gas stations	3
Hustle	3
Awnings	2
Dog feces	2
Escalators	2
Mailboxes	2
Spit	2
Street fundraisers	2
Taxi stands	2
Video rental shops	2

The most intriguing element in the drawings might, however, be the one chosen as the main punctum: people. It is quite surprising that people were included in 72 per cent of the high school students’ ( $n=64$ ) drawings and in 61 per cent of all the drawings ( $n=167$ ). Comparing these results to the earlier study (HILANDER, 2012b) and its drawing task—referred to in the theory section—using a cross-tabulation procedure, the difference between drawing and not drawing people is statistically significant (Fisher’s Exact Test  $p<.05$ ). Why do participants sometimes draw people and sometimes not? Quite often it is suggested that people are somewhat difficult to draw (TANI, 2012, 162), which could explain the lack of them in the city view drawings. In the context of this research, it seems that because there are people in the actual photo,

it lures the viewers to continue to draw them in their own landscapes. In the earlier study (HILANDER, 2012b), the students did not see a photo with people before the drawing task, and were instead asked to draw on a blank page.

Therefore, it is almost as if the existence of people is not thought of when depicting an urban landscape. Thus, it is suggested that students do not include people in their drawings of urban landscapes not because a human being is rather difficult to draw, but instead because, when asked to draw a “landscape” or a “city view,” people are a detail, which—rather like the “garbage” or “cigarette butts” in this study—will be left in the shadow of elements which are bigger in scale. First, bigger and more stable elements, such as buildings, roads and cars are drawn, after which dynamic people are seen to “float” between them. In real life, people are constantly on the move, which is what makes people interesting, as suggested by the 16-year-old girl in the previous section. This is also reflected in how young people communicate via “SnapChat.” In a Finnish research conducted by SINTONEN, KYNÄSLAHTI and KAITAVUORI (2014), “transience” and “rapidity” were found to describe the use of “SnapChat” the best. Sometimes even

landscapes themselves are defined as “something active” (HORTON & KRAFTL, 2014, 104). The constant movement and rapidity of people is, however, rather difficult to illustrate in a drawing. That is why it is suggested that although people are invisible to the common viewer—like the insect that flew too fast to be photographed—they might not be invisible to the one drawing the landscape.

In the photo of New York City, there is also spatially referenced meaning, such as the geographical hint in the upper left-hand corner regarding the location where the photo has been taken (BEHNKE, 2014; VOGLER & HENNIG, 2014). Although only 16 per cent of the high school students listed the [Bro]adway sign as a detail in the task introduced previously, 34 per cent of them completed the [Bro]adway sign. Consequently, 34 per cent of them reported that they pay attention to road signs on a daily basis and 41 per cent on a weekly basis in their everyday lives (question number 7 in TAB 1). A lower percentage (28%) of university students and members of the conference audiences extended the [Bro]adway sign. In addition, 36 per cent of all the participants ( $n=167$ ) completed the frame of the sign, but either named it otherwise or left it as an empty sign box.

## 5 Concluding Remarks: What Is the Source of Meanings in the Photo?

Metonymic signs and indices are emphasized as the most important aspects when it comes to teaching visual literacy to young people (SEPPÄNEN, 2008, 191). These semiotic functions also explain why photographs “do not lie” and why they are very powerful tools

(SEPPÄNEN, 2014). Nonetheless, BARTHES (1977, 61) stated that “there is an abundant literature on metaphor, but next to nothing on metonymy.” In this study, the punctum and its way to expand metonymically over to the blind field is approached with the help of

drawings. However, in semiotics, combining a photo and a drawing into one syntagm is problematic because they are produced in different ways. BARTHES (1977) finds these sorts of syntagms temporarily dead. However, here the photo and the drawings are not examined together but in relation to each other. ROSE (2012, 216) argues that in order to analyze a photo it is necessary to look at the image which it is in relation to. At the same time, these relations and what organizes them are important connotations (SOMOV, 2010, 167).

Urban environments are the settings for everyday life for most Western young people (BÉNEKER et al., 2010, 123). Therefore, researchers, at least those interested in the geographies of young people, are increasingly interested in the mental images of cities that young people have. These mental images can be approached with visual methodologies; however, drawings made to depict a city do not tell how the young people would experience the city in a real-life scenario (HILANDER, 2012b). One problem with the “clinical analysis” of the drawings is that the researcher cannot know whether the student associates positive or negative connotations with an element drawn; that is, not without interviewing the students (HILANDER & VÄLIMAA, 2014, 48). Nevertheless, a crucial aspect of semiotics is the notion of interpretation where objects and events furnish the researcher not only with information about themselves, but also about other objects and events (WINDSOR, 2004, 179). Therefore, the drawings introduced in this study do tell us about the ways in which people visualize urban space. Nonetheless, the fact that the different skill levels in drawing might affect the answers

cannot be ignored. Quite the opposite, it launches questions, such as how would the drawings differ, if color, different materials, or focus groups were used? For instance, how would drawings produced during a geography lesson differ from those produced during art, biology, or history lessons?

There are two major results that are emphasized in this study. The first is related to the visualization of urban space; namely, why are people included in drawings depicting urban landscape in this study, although usually they are left out? The most obvious explanation is the simplest one: because there are people in the actual photo, the blind field of which the participants were asked to complete. Therefore, the instructions concerning the task itself work as a hint guiding participants to continue to draw elements seen in the actual photo. As a pedagogical research tool, visual methods should be executed with clear and well-thought-out instructions because “you get what you ask for.” However, even if it is the case that the instructions used in this study did guide the participants to include people in their drawings, it is actually not a problem. On the contrary, it proves another hypothesis correct; that is, a man or a stick figure is not too difficult to draw. Therefore, it is asked: is it not more severe to not draw people because one thinks they do not belong to an urban landscape than draw them because the photo itself depicts people? The fact that only 19 per cent of the high school students mentioned people as part of the things found in city center backs the idea that participants do not think of people when imagining a city landscape (see TAB 4). The Danish architect Henriette Vamberg (GEHL & SVARRE, 2013) argues that this also takes

place in city planning; that is, buildings and market squares are planned and built without any understanding of how the locals might actually use them. Afterwards it is only hoped that people will come and find the ways to use the place. As a result, it is suggested that the very word "landscape" refers to objects that are bigger in scale than a human being. It is also evident that meanings fluctuate depending on the medium used to re-present the world, that is, between verbal and visual worlds.

The second result of this study answers the question whether the photo or the drawing dominates. In a study where only 17 per cent of the drawings challenge the meanings of the photo, the answer appears quite clear. On the one hand, the result goes hand in hand with the notion that different audiences do not react differently to the same image (ROSE, 2012, 348). On the other hand, this result disagrees with the view that people construct meanings for an image in ways that differ from the author's intent. The photo used in this study seems to work as most of the maps and diagrams in geography textbooks which are designed for pupils to be read in one specific way only (JEKEL, 2014, 177). The question is, because a photo never completely re-presents the world, that is, it can never re-present the world objectively; does it then re-present the worldview of the photographer or the viewer? Even if the answer might depend on the point of view of the respondent, there is a growing demand for studying and understanding the processes of interpretation of visual re-presentations in the era of "geo-media" and visual applications, such as "SnapChat" and "Periscope" (HILANDER, 2016).

In an image-rich world, young people need to be able to interpret photos from different views, including the geographical one, and to give strong arguments for their interpretations. Many factors come together to frame what students see in a photograph. In this article, the meanings of the photograph constructed by attending to what is in the viewer's head have been the main focus. When filling the blind field from a geographical perspective, students should be trained to look with intention; for instance, to find punctums, which work as geographical hints regarding location, such as the [Bro]adway sign, in photographs. This can be called "directed observation" (SANDERS, 2007) or "geographical vigilance" (HILANDER, 2016). In addition, geography students should be encouraged to take into consideration the elements that the photo does not show; this is important because cutting certain elements off from the photo (i.e. making paradigmatic selections) is perhaps the easiest way to manipulate the photo. Students can then be asked to draw the missing elements in the blind field or at the top of a given photograph. They can also be directed to read the photo from different views; such as, imagining they were living in the landscape depicted by the photo or being on holiday there. These procedures enlarge geographers' and geography students' toolkit to challenge the dominance of the picture taker and take a more participatory role in interpreting photos. There is a call for it as the results of this study indicate; that is, the semiotic act did not take place in most of the drawings. Thus, there is much to be done in thinking through geographical media literacy skills.

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