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## ATTITUDE CHANGE: THE CASE OF ATTITUDES TOWARDS THE "GREEN CARD" IN GERMANY

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### ABSTRACT

*THE SLEEPER EFFECT IS A DELAYED INCREASE IN ATTITUDE CHANGE WHEN A MESSAGE IS PROVIDED BY A NON-CREDIBLE OR BIASED SOURCE. IN AN EXPERIMENT, WE EXAMINED THE INFLUENCE OF A BIASED SOURCE ON THE LONG-LASTING IMPACT OF ARGUMENTS AGAINST THE IMPLEMENTATION OF A "GREEN CARD" FOR SKILLED EMPLOYEES IN GERMANY. EXTENDING PREVIOUS STUDIES ON THE SLEEPER EFFECT, WE VARIED THE COMPLEXITY OF THE SOURCE INFORMATION. WE HYPOTHESIZED A DECREASED SLEEPER EFFECT WHEN SOURCE INFORMATION WAS COMPLEX, WHEREAS WE EXPECTED THE USUAL SLEEPER EFFECT WHEN SOURCE INFORMATION WAS SHORT AND EASY. UNEXPECTEDLY, WE FOUND AN ATTITUDE CHANGE IMMEDIATELY AFTER PARTICIPANTS HAD READ THE ARGUMENTS THAT WAS NOT AFFECTED BY THE SOURCE INFORMATION. HOWEVER, WHEN THE ATTITUDES WERE MEASURED AGAIN AFTER SIX WEEKS, A RELATIVE*

*SLEEPER EFFECT OCCURRED. THE RESULTS ARE INTERPRETED IN THE LIGHT OF MECHANISMS TO REDUCE DISSONANCE.*

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Numerous representatives from politics and the media agree that the debate about German immigration policies played a pivotal role in state elections in North Rhine-Westphalia in 2000. The discussion was dominated by the question of whether the government and domestic industries should recruit highly skilled experts from foreign countries in order to address a labor shortage in specific areas (e.g., internet technologies) and thereby strengthen the German economy. The debate culminated in an ad campaign by the Christian Democratic Party that used the slogan "Children instead of Indians" ("Kinder statt Inder") to emphasize its view that Germans should support the education of their children rather than hire immigrant experts. However, this slogan was seized by the Republicans, a right wing party, who used it in an extensive campaign of their own. Considering that arguments in this debate were provided by clearly biased communicators, it seems to be an interesting question whether the reasoning from such sources leads to attitude change and how enduring this attitude change is.

We know from the considerable research on the "sleeper effect" that under certain circumstances messages from biased or non-credible sources may lead to delayed attitude change (absolute sleeper effect) or to a reduced decline of attitude change over time (relative sleeper effect) (e.g., Gillig and Greenwald 1974; Gruder, Cook, Hennigan, Flay, Alessis, and Halamaj 1978; Hovland, Lumsdaine, and Sheffield 1949). Hovland and Weiss (1951) argued that an unfavorable persuasion cue (e.g., a negative source) becomes dissociated from the message over time. Since sleeper effects were primarily observed when recipients were informed about the message source after reading the message, Pratkanis et al. (1988) suggested that the message itself and the discounting cue are regarded as two separate communications with opposite impact. Although the influence of these communications might be roughly equal immediately after the presentation, Pratkanis et al. assume that the decline of the influence of the latter communication is faster over time. To support their explanation, they refer to findings that prior received communications decay somewhat more slowly than subsequent communications (Miller and Campbell 1959).

A point that was not of main interest in previous research pertains to the length and complexity of information about the communicator. In most studies, specifications about the communicator or the message source were very short. Considering the various explanations offered, the question arises whether a sleeper effect may be observed when specifications about the communicator are extensive and complex. It seems plausible that extensive information about the communicator is stored better in memory and is therefore easier to retrieve when recipients

process the given information deliberately. If we follow the explanation of Pratkanis et al. (1988) that the sleeper effect is based on a differential decay of information in memory, we should expect a decreased sleeper effect for extensive source information.

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Kruglanski and Thompson (1999; cf. Kruglanski, Thompson, and Spiegel 1999) already demonstrated the relevance of the complexity of information about the message source. In contrast to the widely held assumption of two-process models that source characteristics and message arguments have a different impact on attitudes if participants process the given information heuristically or systematically (e.g., Eagly and Chaiken 1993; Petty and Cacioppo 1986), Kruglanski and Thompson regard source characteristics and message arguments as functionally equivalent in the persuasion process. They assume that the length or extent of such information will interact with contextual factors that are known to promote cognitive elaboration, and that in past research have differentially moderated the persuasive impact of different information types when information type has been confounded with information length. Supporting this assumption, they showed in a series of experiments that participants who were motivated and able to systematically process the given information were more likely to be convinced by an expert than an inexpert source when the source information was long, but not when the source information was short.

Thus, in the case of systematic processing, the impact of source characteristics on persuasion depends on the complexity of information about the source. Therefore, we assumed that, in addition to variables highlighted in previous research, the complexity of information about the communicator would have an influence on the stability of attitude change. In keeping with the reasoning presented above, we expected a sleeper effect for participants who are able and motivated to process the given information systematically if information about a biased communicator is simple, but not if it is complex.

We tested these predictions in an experiment with German students. Inspired by the debate about the green card, we had participants read a short article that included arguments against the implementation of the green card for foreign experts. Once they had read the piece, participants were given either no description of the message source, a short description, or a long description. With the exception of the control condition, the source was clearly biased in its view. The attitude of the participants was measured twice. Once immediately after they had read the arguments and the author note, the second time six weeks later. A fourth group of participants received no arguments and no information about a source. They were merely asked about their attitude toward the green card.

We assumed that the attitude change would be stronger immediately after the reading of the article in participants who were not informed about the communicator as compared to participants who were informed about the biased source. Furthermore, we expected a sleeper effect for participants who received a short author note. Six weeks after the reception of the message, its persuasive influence should be strongest for those participants who had received a short author note at the first measurement. Since complex information should be better represented in memory, we expected no sleeper effect for participants who had received an extensive author note.

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## **METHOD**

### **Procedure and Participants**

Participants were 69 students of the University of Münster. In their regular courses, they were asked to participate in a survey about the implementation of the green card in Germany. At the time of the first measurement, they were randomly assigned to one of the three experimental conditions or the control group. With the exception of the control group, all participants received a booklet. The booklet included all materials, instructions, and questionnaires. First, participants read an introduction to the topic. They were informed that Germany was experiencing a shortage of trained workers in the IT market and that there was a current debate over whether experts from countries outside the European Union should be hired for a fixed period of five years. Afterwards, participants read the message that included arguments against the implementation of the green card in Germany. In two conditions, participants then received a short or a long description of the communicator. Finally, all participants answered a questionnaire which, aside from the manipulation check, included the attitude measure. Participants who received information about the communicator were also asked whether they believed the communicator to be biased on the topic under discussion. Six weeks after the first measurement, the courses were visited again by different experimenters, who were allegedly recruiting participants for a survey unrelated to the first study. Participants now answered a questionnaire about several different topics, which also included an assessment of their attitude towards the green card. Participants in the control group answered the questions relevant for the attitude measure only at the first measurement. To identify the participants at both times of measurement, we used a code that was generated by personal data of the participants. After the second measurement, all participants were debriefed about the goals of the present study.

## **Materials**

### *Message*

Participants received an article that contained numerous arguments against the implementation of the green card in Germany, arguments that were not clearly attributable to a specific political party. For example, one argument maintained that there were projected shortages of highly trained experts in various fields, and that it was important for the country to educate its own people to resolve the problem in the long run. Furthermore, the author argued that it would not be reasonable to recruit the elite from countries with a low level of education to begin with. To assure that all participants read the article carefully, they were asked to list three arguments specified by the author.

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### *Communicator*

The article was identified as an excerpt from the newspaper "Münchener Anzeiger." The author was identified as the executive director of an advertising agency responsible for an election campaign by the Christian Democrats. Furthermore, it was stated that this agency also created advertisements for an Austrian right wing party. This information was completely fictitious. However, it would guarantee that participants perceived the communicator as biased on the topic of immigration. The information about the communicator was varied according to its length and complexity. The short version contained 46 words. The long and detailed version contained 202 words. Altogether, the short and long version provided a similar description of the communicator, but the long version included more details (e.g., concrete examples for political activities).

## **Dependent Measures**

### *Communicator Credibility*

Participants indicated on a 9-point scale (1 = disagree; 9 = agree) whether they agreed with the following statement: "The author is not biased against the topic." Low values indicate that the author was perceived as biased. The measure was only applied when participants received an author note.

### *Attitude Measure*

At both times of measurement, participants answered the same questions about the introduction of the green card in Germany. They indicated on a 9-point scale (1 = disagree; 9 = agree) their agreement with the following items: "The implementation of the green card benefits Germany as a place for doing business;" "The need for experts should be covered by qualified German labor;" "First of all, the implementation of the green card has disadvantages;" "The immediate employment of foreign specialists is a reasonable step." In consideration of the item poles, the item scores were averaged (first measurement: Cronbach Alpha = .87; second measurement: Cronbach Alpha: .89). High values on this scale indicate a favorable opinion towards the implementation of the green card in Germany.

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## **RESULTS**

### **Communicator Bias**

Participants who received the long version of the author information ( $M = 2.33$ ;  $SD = 1.82$ ) did not differ in their assessment of the communicator from participants who received the short version ( $M = 2.53$ ;  $SD = 1.36$ ),  $t(31) < 1$ , ns. In both conditions, the mean assessment of the communicator's credibility was at the lower end of the scale which had the end points 1 and 9.

### **Attitudes Towards the Green Card**

A single factorial ANOVA with the attitude scores at the first time of measurement as dependent variable reveals differences between the experimental conditions and the control condition,  $F(3, 64) = 2.96, p < .06$ . As expected, participants were more likely to reject the implementation of the green card when they received the message without any information pertaining to the source as compared to participants who received no such message,  $t(64) = 1.93, p < .05$ . However, in contrast to our expectations, the same effect was found when participants who read a short ( $t(64) = 2.62, p < .05$ ) or long description of the biased communicator, ( $t(64) = 1.98, p < .06$ ) were compared with participants who received no message. The conditions with no author note, a short note, or a long note did not differ from each other as regards the attitudes towards the green card,  $t_s(64) < .1, ns$ . The mean values of the attitudes towards the green card are depicted in Table 1 for both measurement points.

**Table 1: Means and Standard Deviations (in parentheses) of Attitudes towards the Implementation of the Green Card**

	Experimental Conditions			
	No Message	Message Only	Message + Author Note (Short)	Message + Author Note (Long)
1. Measurement	5.87a (1.15)	4.87b (1.15)	4.51b(1.60)	4.98b (1.99)
2. Measurement		5.34a (1.25)	4.29b (1.43)	4.94ab (2.21)

Note: Means with different letters differ significantly at  $p < .05$ .

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Six weeks after the first experimental session, the rejection of the green card was higher in participants who had read a short description of the biased communicator compared to participants in the non-factorial control group,  $t(64) = 2.93, p < .01$ . No difference was found between the non-factorial control group and the message only group,  $t(64) < 1, ns$ . This relative sleeper effect is also confirmed in an ANOVA with the point of measurement as dependent factor (immediately vs. after 6 weeks) and the author information (no information vs. short information) as independent factor,  $F(1, 28) = 3.06, p < .10$  ( $F(1, 27) = 5.56, p < .05$ , after removal of one outlier with a suspicious data profile). There was a decay in attitude change for participants of the message-only condition,  $t(14) = 1.66, p < .07$ , one-tailed, but not for participants who had read a short author note,  $t(14) < 1, ns$ . However, this interaction

disappeared when, additionally, the condition with complex author information was considered,  $F(2, 45) = 1.60$ , ns. Furthermore, we found no interaction when only participants were considered who had read a short or long author note,  $F(1, 31) < 1$ , ns. Thus, the hypothesis that complex author information leads to a diminished sleeper effect was not supported.

## DISCUSSION

The present study provides two surprising results. First of all, we did not expect that the reception of arguments against the implementation of the green card in Germany would lead to an enhanced rejection of the green card even though participants were informed that the author of the arguments was closely linked to conservative parties. Furthermore, it seems amazing that a relative sleeper effect was found. Six weeks after the reception of the arguments, in an ostensibly unrelated second experimental session, participants indicated more positive attitudes towards the green card when they had received no information about the author than when they had received a short author note. Thus, there was a stronger decay of the attitude change when participants had no source information as compared to when they were aware of the biased source. How can we explain these results?

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It is a well known phenomenon in persuasion research that source credibility has a diminished impact on attitudes when participants are motivated and capable of checking arguments deliberately (Chaiken 1980; Johnson and Scileppi 1969; Petty, Cacioppo, and Goldman 1981). Indeed, there are some reasons which lead us to assume that participants of the present study were motivated to scrutinize the arguments given. First, participants may have felt a conflict between social norms or internalized standards of equality and activated negative affective evaluations (Gaertner and Dovidio 1986). To reduce this conflict, they may have scrutinized the given information extensively. Second, participants were explicitly asked to read the text carefully and, afterwards, to list three arguments provided by the author. A similar instruction was used in a study by Pratkanis et al. (1978). In that study a communicator effect failed to appear as well. In sum, it seems reasonable that participants in the present study reviewed the arguments elaborately and that, as a consequence, the arguments were more central to participants than the author bias.

However, it remains unclear why there is no effect from the complexity of communicator information. The results of Kruglanski and Thompson (1999) suggest that complex information has a greater impact on attitude change than simple information when individuals scrutinize the



given information. Admittedly, it should be noted that Kruglanski and Thompson for the most part used messages with few and simple arguments. Thus, participants of these studies may have focused more on the author information than on the message, whereas participants of the present study may have paid more attention to the message itself. It seems to be an interesting question for future studies whether effects from the complexity of author information depend on the focus of attention.

The main finding of the present study is the occurrence of a relative sleeper effect for participants who received a short description of the author. For those participants, the article had an immediate and enduring persuasive effect even though they thought the communicator biased. In contrast, the impact of the message decreased over time for participants who received no information about the communicator. The consideration of the processes which lead to a persuasive impact of the message at the first time of measurement may help to explain the endurance of the attitude change. Possibly, participants made an intermediate judgment of the article before they read the author note, which was presented after reading. For participants who received a description of the author, the incongruence between their intermediate judgment and the knowledge that they were agreeing with a biased source may have led to a feeling of dissonance and mechanisms to reduce this feeling (Frey 1986; Frey and Wicklund 1978). It seems conceivable that such mechanisms accompanied a more extensive elaboration especially of arguments supporting the intermediate judgment, which resulted in a higher accessibility of the arguments six weeks later. For participants who did not receive any information about the communicator, there was no need for the reduction of dissonance and for a further confirmation of the judgment. Thus, the decrease of the attitude change for participants without source information seems reasonable.

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In our view, the "differential decay" hypothesis of Pratkanis et al. (1998) does not offer a feasible explanation. Following this hypothesis, we should expect a more stable attitude change for participants who received simple in contrast to complex arguments. However, the complexity of the author note had no significant effect on the attitude towards the introduction of the green card in Germany either at the first measurement or the second. Since there was no difference between the message-only condition and the condition with a complex author note, we cannot make any inferences about the significance of the complexity of source information. Future research would benefit from a more sophisticated analysis of the role of source information. For example, a replication of the present study with an additional variation of the message length would yield some more insights into the boundary conditions of communicator effects.

In sum, the present study shows that long-lasting attitude change is possible even though a source is perceived as biased and that, under certain circumstances, such changes in attitudes may be more enduring than the mere reception of arguments without a reference to the source. Further experiments are necessary to test the specific explanations offered in the discussion section of the present paper.

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