



REASONS FOR CHOOSING THE MIDPOINT IN RESPONSE SCALES

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DECEMBER 2019
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Why do people use the midpoint in response scales?

- Often a suspicion that people use the midpoint for other reasons than the survey designers intended
- Also often assumed that adding an opt-out, such as Don't Know removes the problem
- This study explores respondents' reasons for choosing the mid-point by asking them open ended follow up questions
- We start by a simple response scale we happen to use frequently in our surveys: five points bipolar rating scales

Very good – fairly good – neither good nor bad – fairly bad – very bad



Assumptions of uneven-numbered bipolar Likert type rating questions

- Response options are ordered and equidistant.
- The midpoint indicates a neutral or intermediary attitude

If respondents select the midpoint for *other reasons*:

- Violates the assumption of an ordered scale → Questions accuracy of estimate



Reasons for choosing the midpoint according to previous research

- Ambivalence or indecisiveness (e.g., Lam & Allen, 2010)
- Indifference (i.e. no opinion) (e.g., Sturgis & Roberts, 2011)
- No or limited interest in survey topic (Krosnick, 1991)
- Lack of knowledge (e.g., Lam & Allen, 2010; Schuman & Presser, 1996)

Our additions:

Open-ended follow ups & and comparing with and without a DK option.



Research Questions

Q1 How do survey participants motivate their midpoint responses?

Q2 Do the motivations (stated reasons) for choosing the midpoint change when a DK response option is added?



Method

Online survey experiment, 9,056 opt-in recruited members of the Swedish Citizen Panel at the University of Gothenburg (fielded September 2018).

Two different policy attitude questions used:

What is your opinion about the following policy proposal?

- Raise the level of unemployment benefits.
- Increase the number of wolves in Sweden.



Experimental design: 6 treatment groups

3 (label versions) x 2 (DK or not)

T1 (T2)	Very good	Rather good	Neither good nor bad	Rather bad	Very bad	(Don't know)
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T3 (T4)	Very good	Rather good	Neutral	Rather bad	Very bad	(Don't know)
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T5 (T6)	1 Very good	2	3	4	5 Very bad	(Don't know)
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Without DK	With DK
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Follow-up question

“On the previous page you answered [neither nor/neutral/3] on the question about whether to increase the number of wolves. We would like to know why you chose that answer.

Please tell us more here: ”

- Through previous studies and exploratory pilot coding we found 7 general categories.

The categories were not mutually exclusive, and the same answer could be coded in several categories.

7 categories (not mutually exclusive)

“True” midpoint

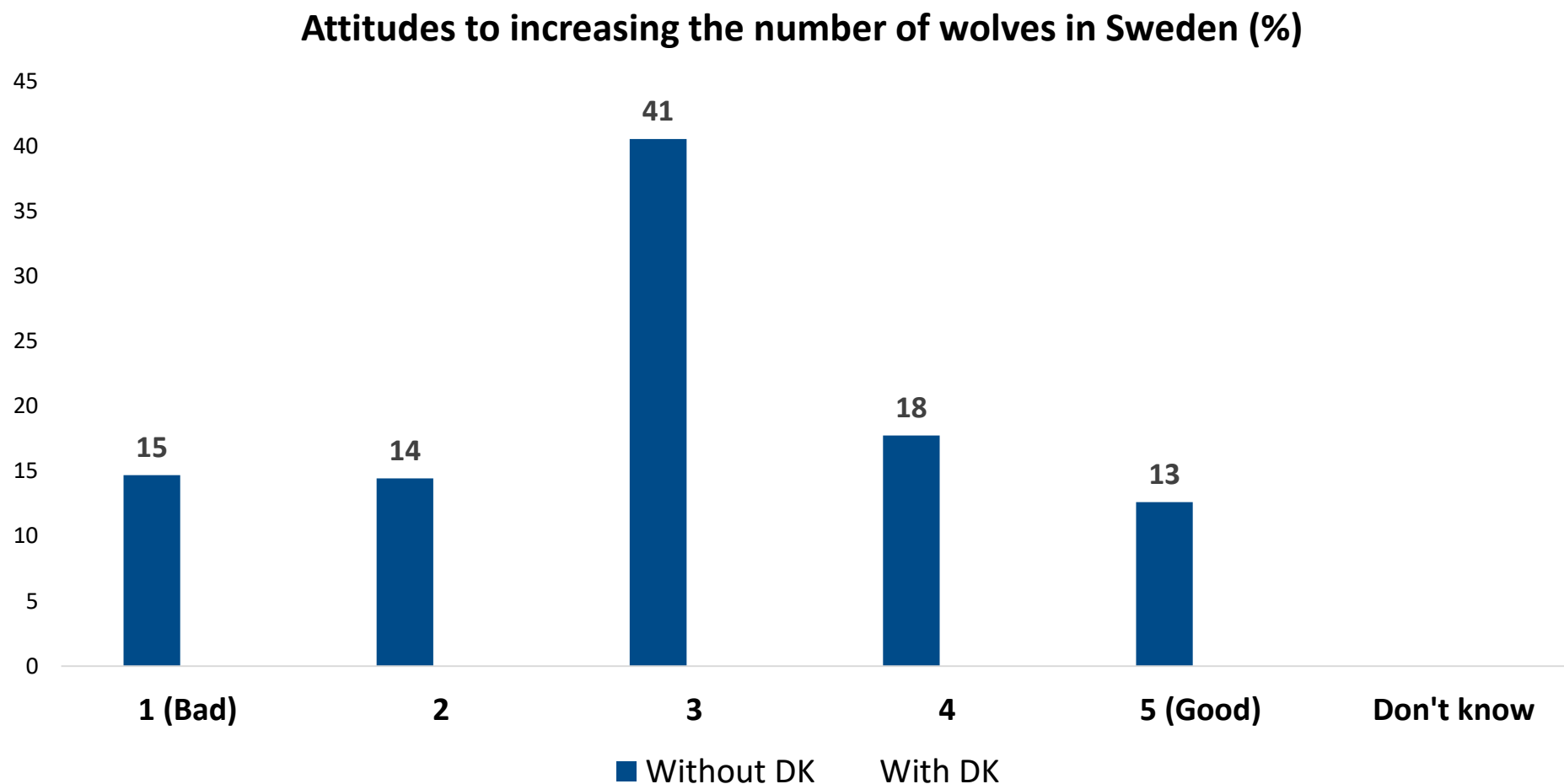
- Ambivalence (on one hand; on the other hand..)
- Maintain status quo (neither increase nor decrease..)

Other than “true” midpoint

- Lack of knowledge
- No opinion
- Unimportant issue
- Positive or negative attitude
- Don’t know why

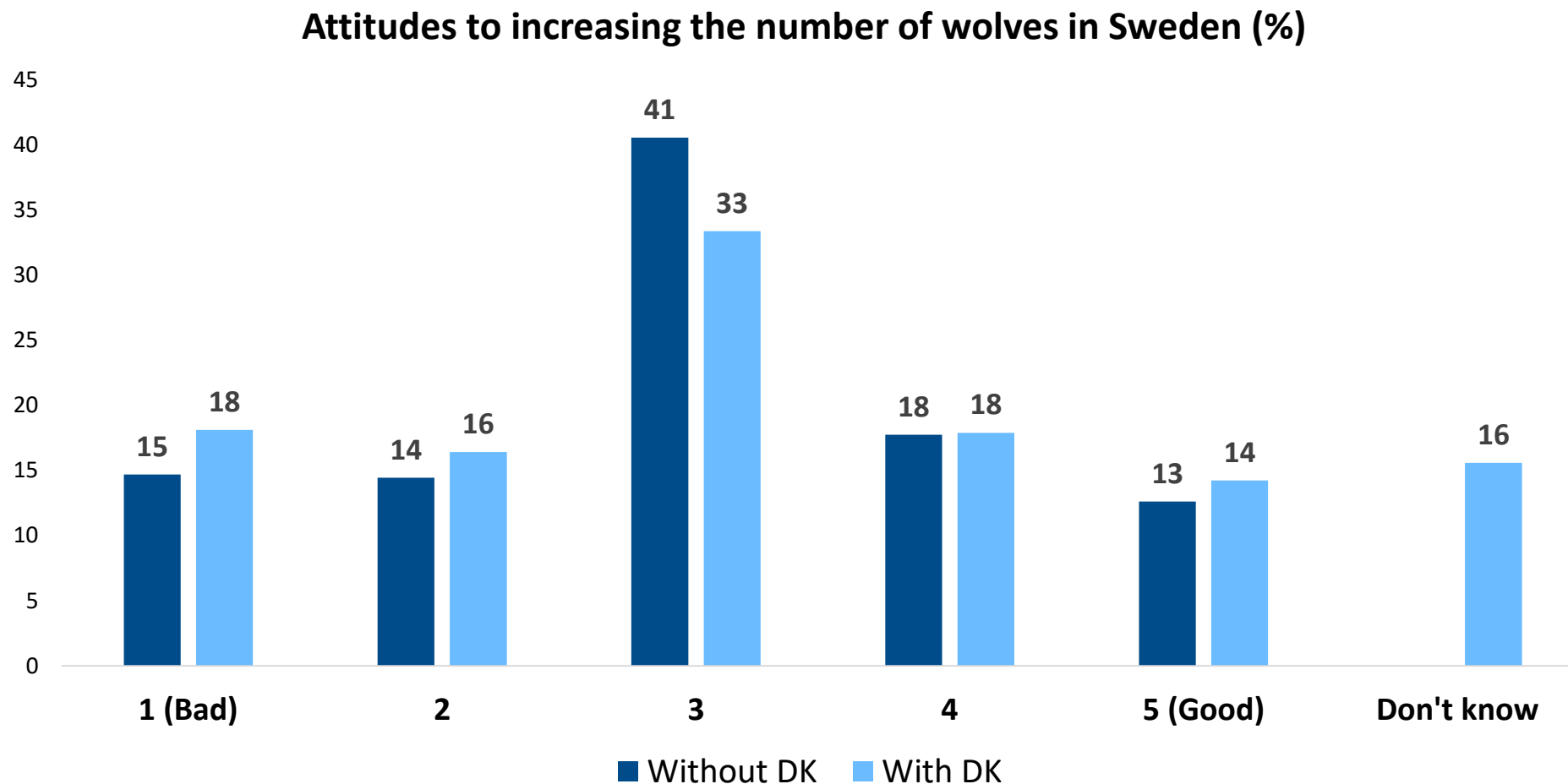


A quick look at the response distribution: did we need a DK option? And does it change the balance of opinion?





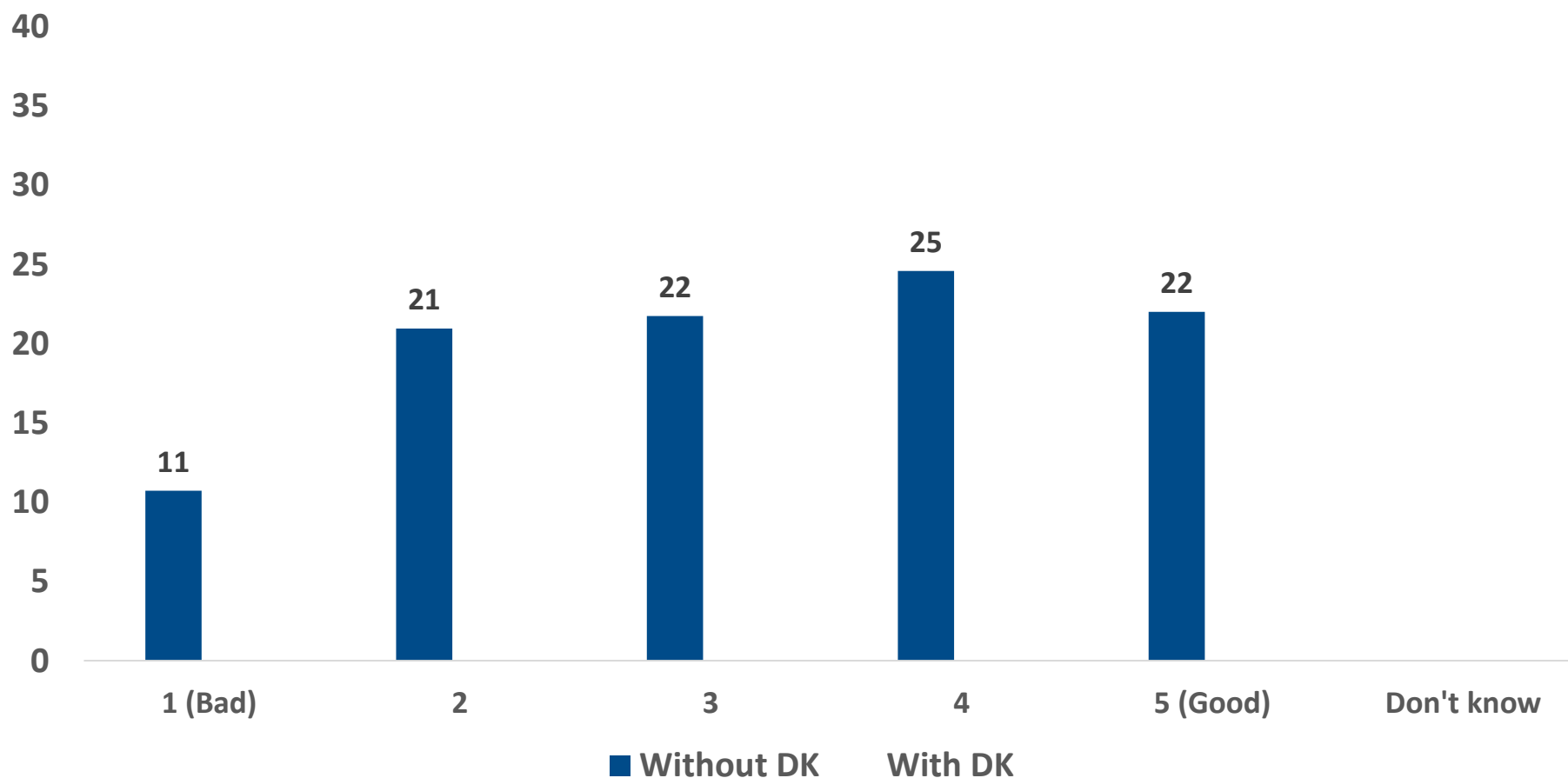
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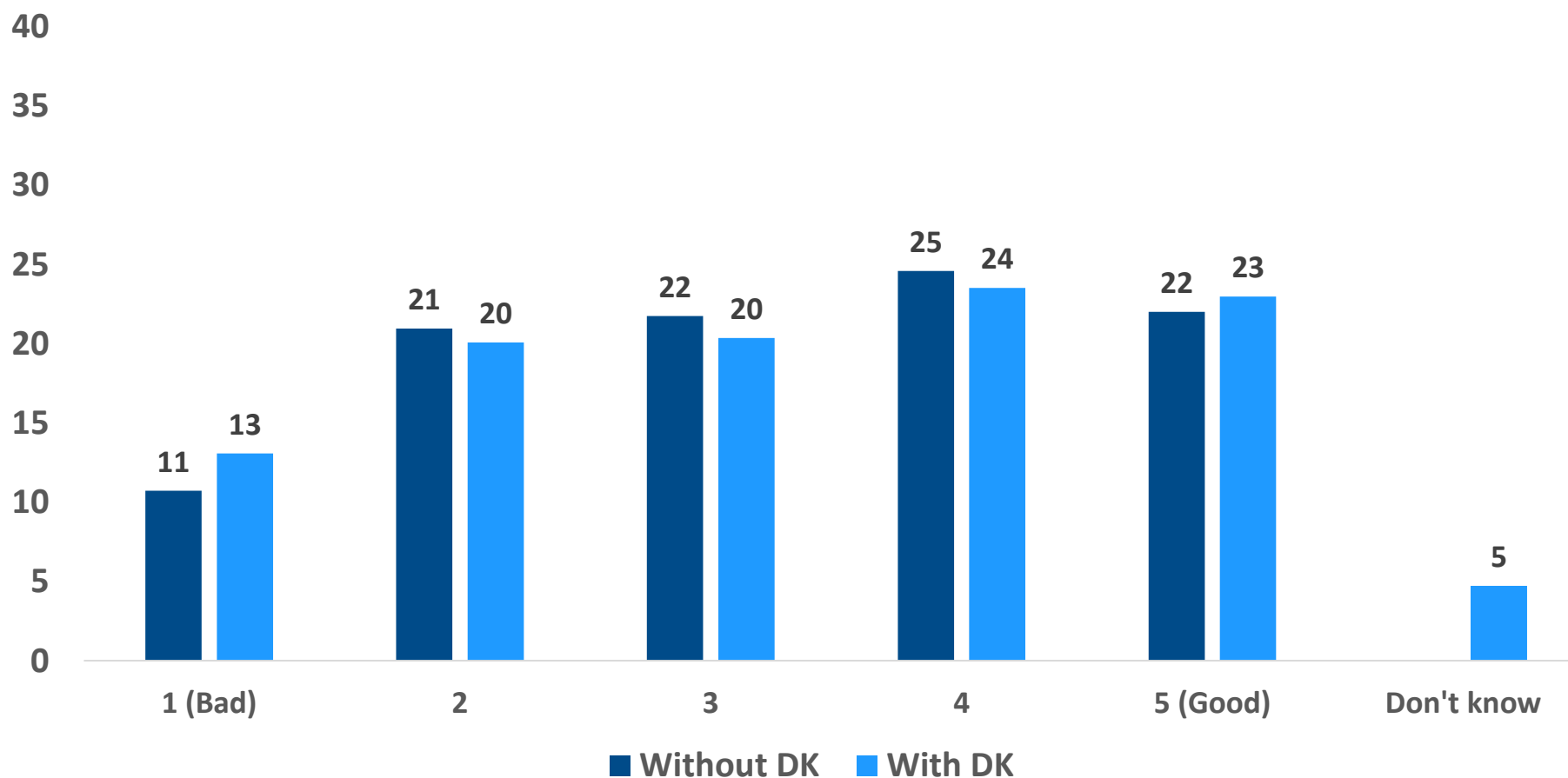
Attitudes to raising the unemployment benefits (percent)





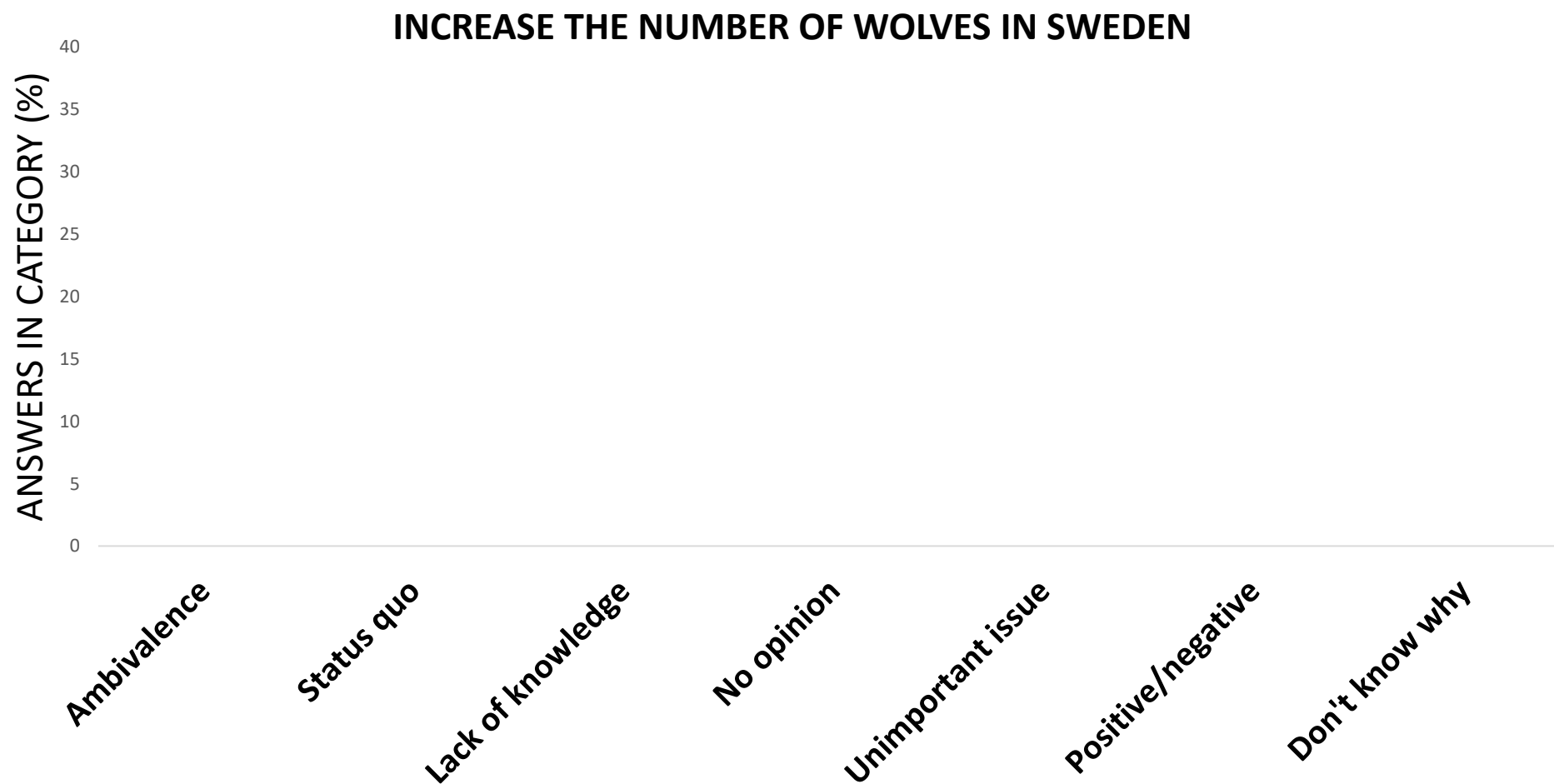
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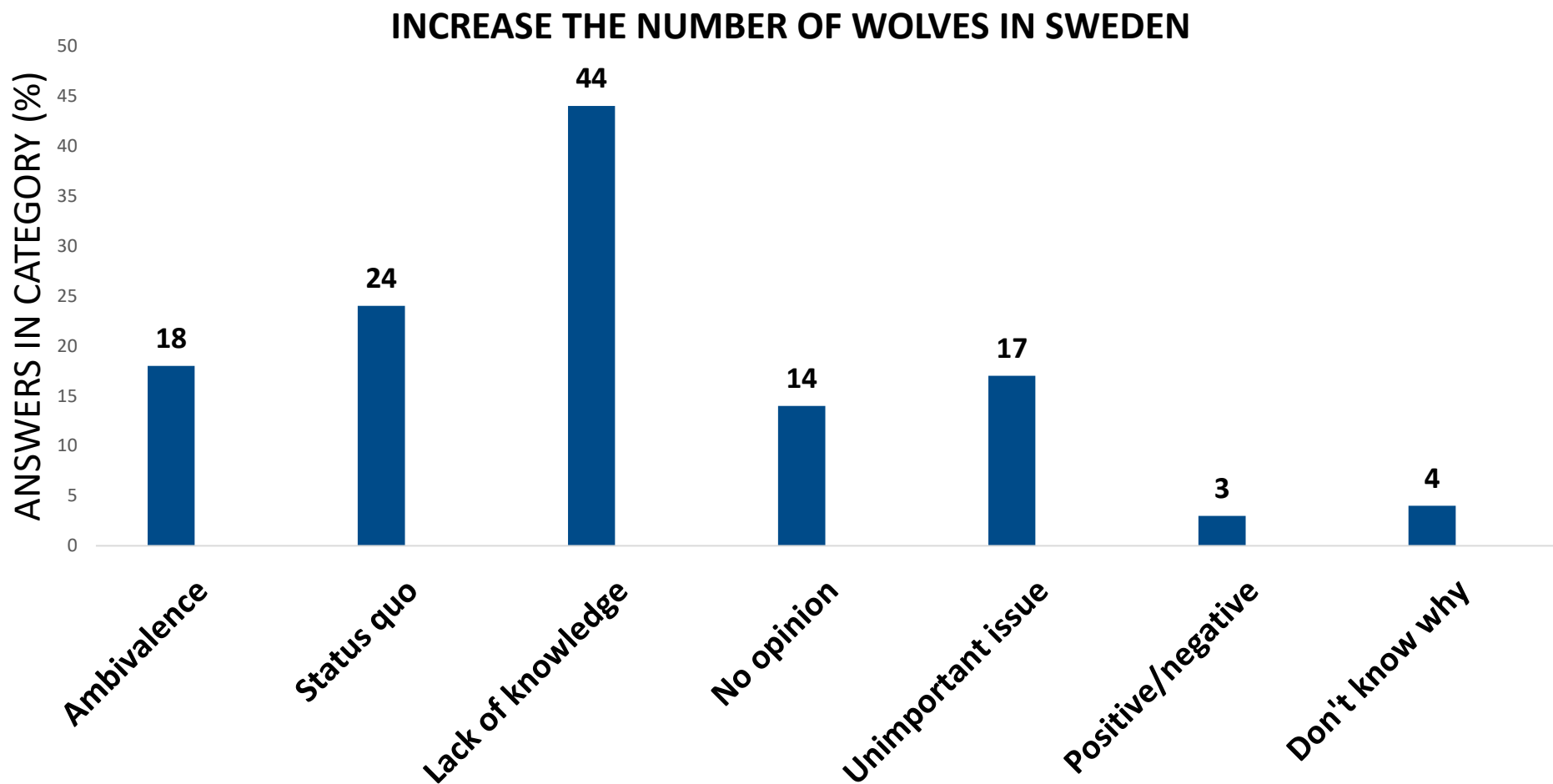


Q1 How do survey participants motivate their midpoint responses?



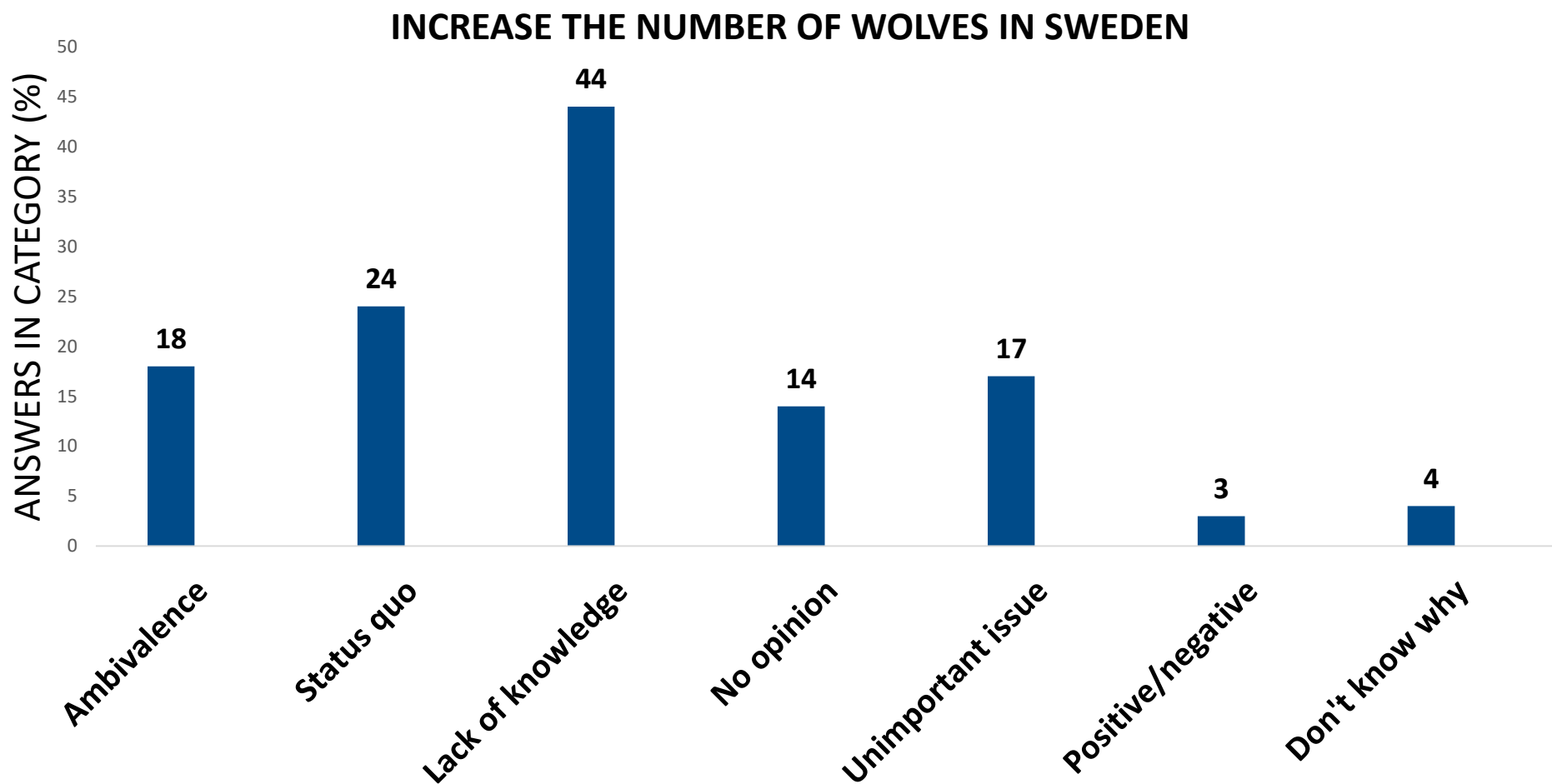


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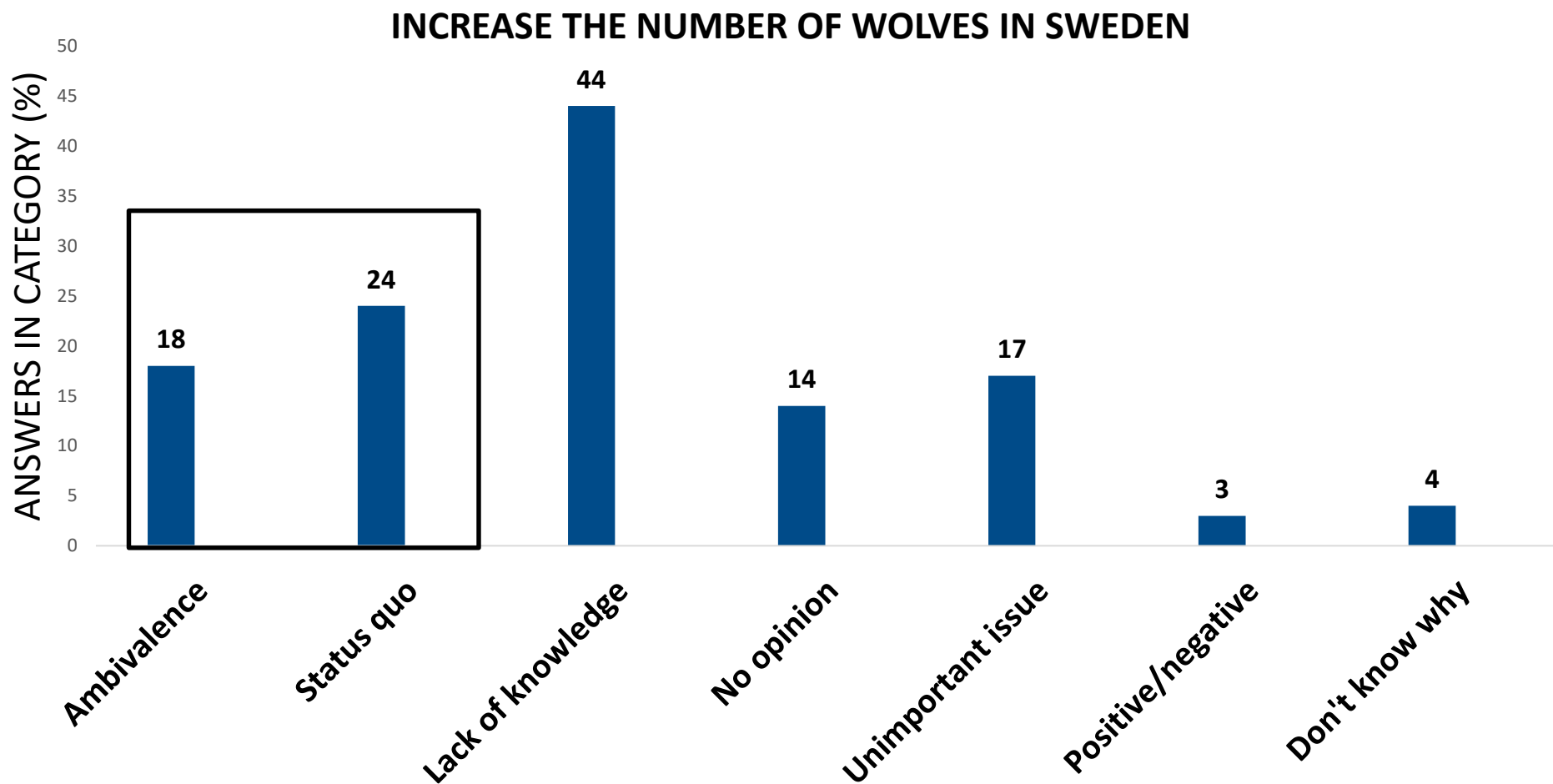


Q2 Do the motivations for choosing the midpoint change when a DK option is added?



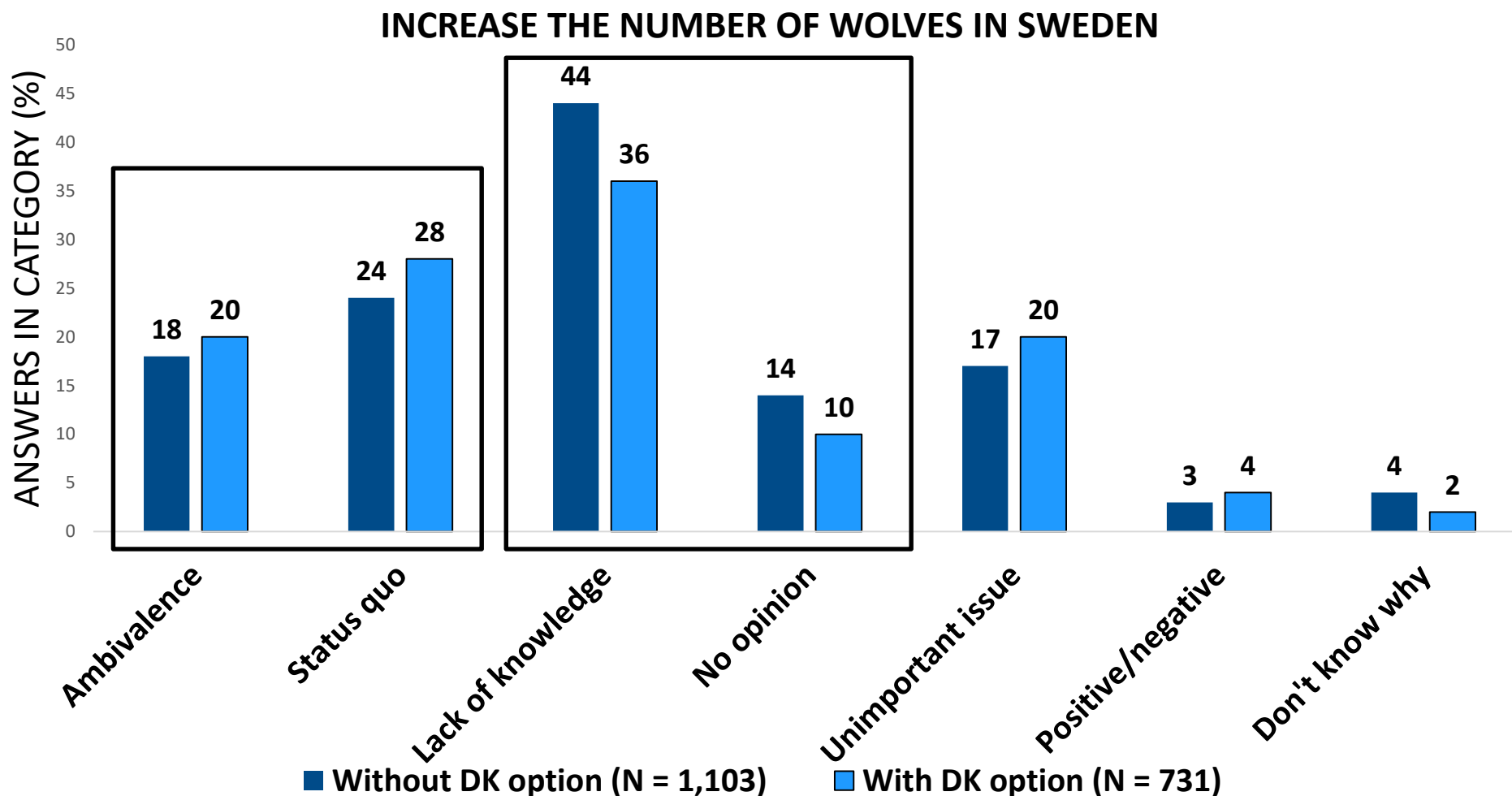


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Q2 Do the motivations for choosing the midpoint change when a DK option is added?





Q2 Do the motivations for choosing the midpoint change when a DK option is added?

“Increase the number of wolves in Sweden”
Percent stating only acceptable reasons for choosing the midpoint
(ambivalence or status quo)

Without Don't Know option	With Don't Know option
27 %	35 %



Q2 Do the motivations for choosing the midpoint change when a DK option is added?

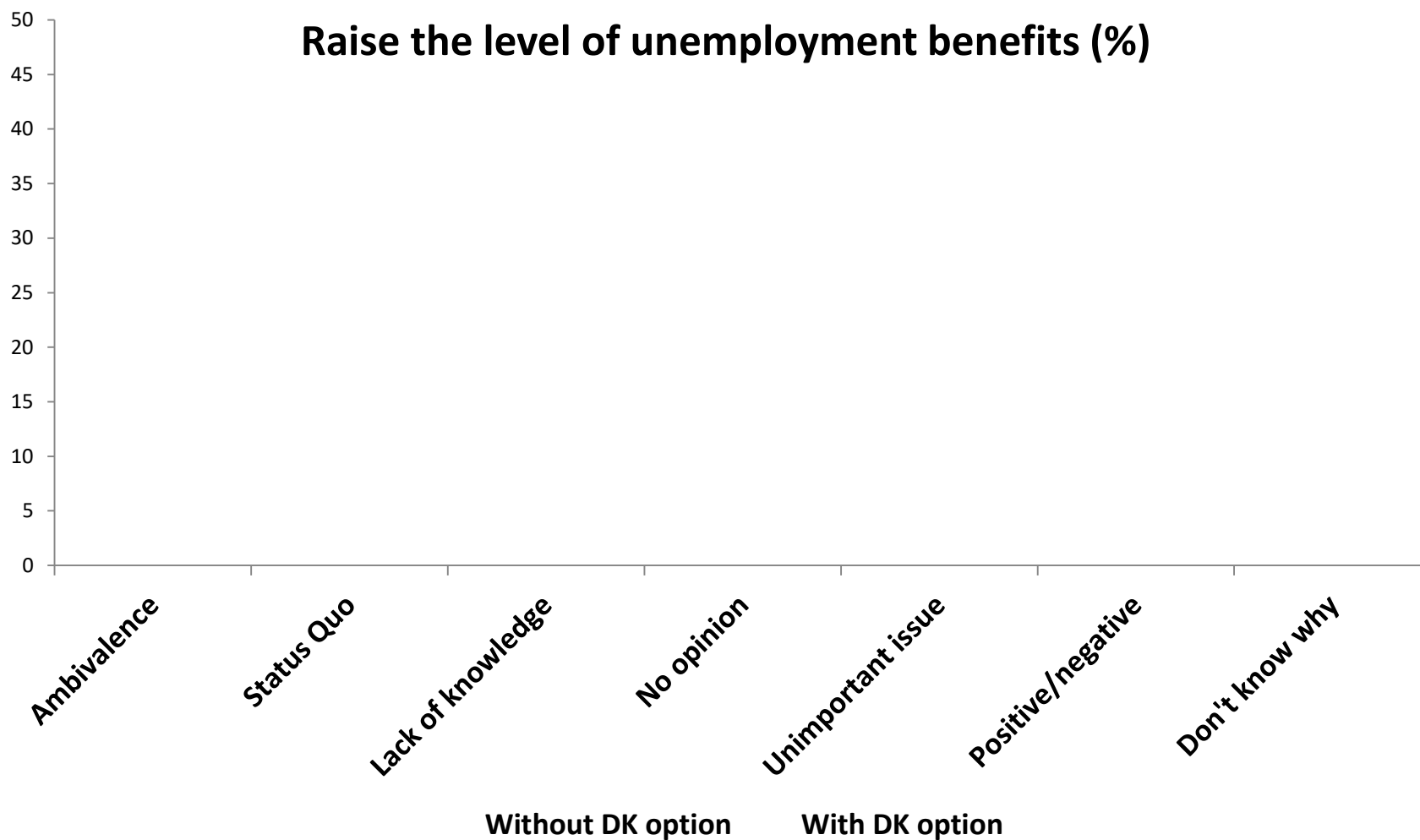
“Increase the number of wolves in Sweden”

Percent stating only unacceptable reasons for choosing the midpoint (lack of knowledge, no opinion, unimportant etc)

Without Don't Know option	With Don't Know option
61 %	54 %

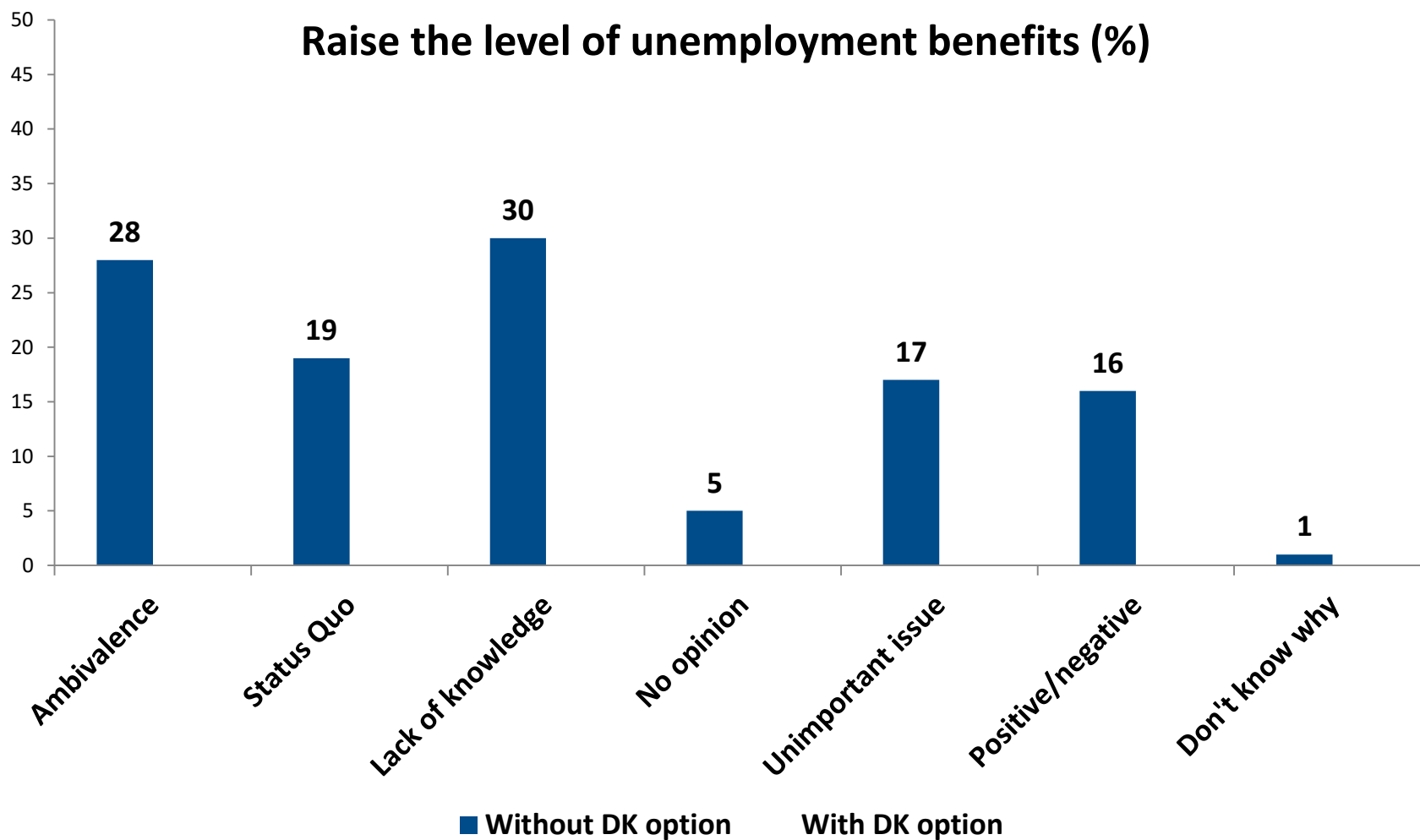


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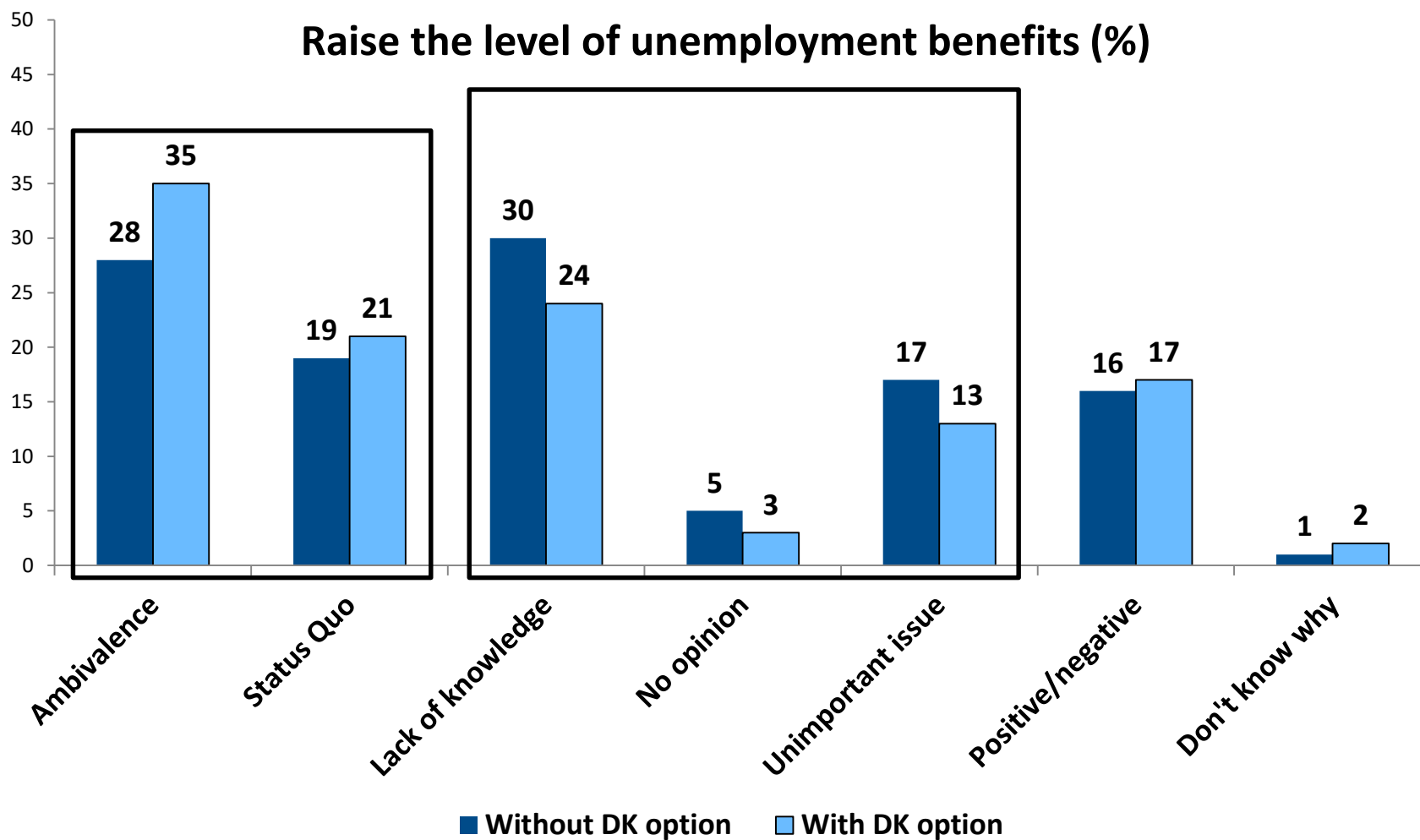


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Q2 Do the motivations for choosing the midpoint change when a DK option is added?





Q2 Do the motivations for choosing the midpoint change when a DK option is added?

“Raise the level of unemployment benefit”

Percent stating only acceptable reasons for choosing the midpoint (ambivalence or status quo)

Without Don't Know option	With Don't Know option
35 %	46 %



Summary Findings

Reasons for choosing the midpoint option

- A large share of respondents indicated other reasons for choosing the midpoint than an attitudinal middle position. (eg. Lack of knowledge, unimportant issue)
- Including a DK option increased the share of "true" midpoint responses somewhat; but a large share of midpoint responses still reflect other than a middle position

Inferences about the policy attitudes with- and without DK

- Inferences about aggregate public opinion did not change much, the balance between positive and negative attitudes remain much the same

Conclusions

- Midpoint responses on this type of policy rating scales often contain a lot of noise
- Including a Don't know option does not reduce this problem as much as many believe
- More research into this is needed, especially concerning other types of survey questions



A follow up study

- Online survey experiment in May 2019
- Opt-in sample
- Same two policy questions (wolves and unemployment benefit)
- Only “neither good nor bad” as midpoint
- Improved coding categories
- Also asked open-ended follow ups to all five response options

- All coding not done, *preliminary work*

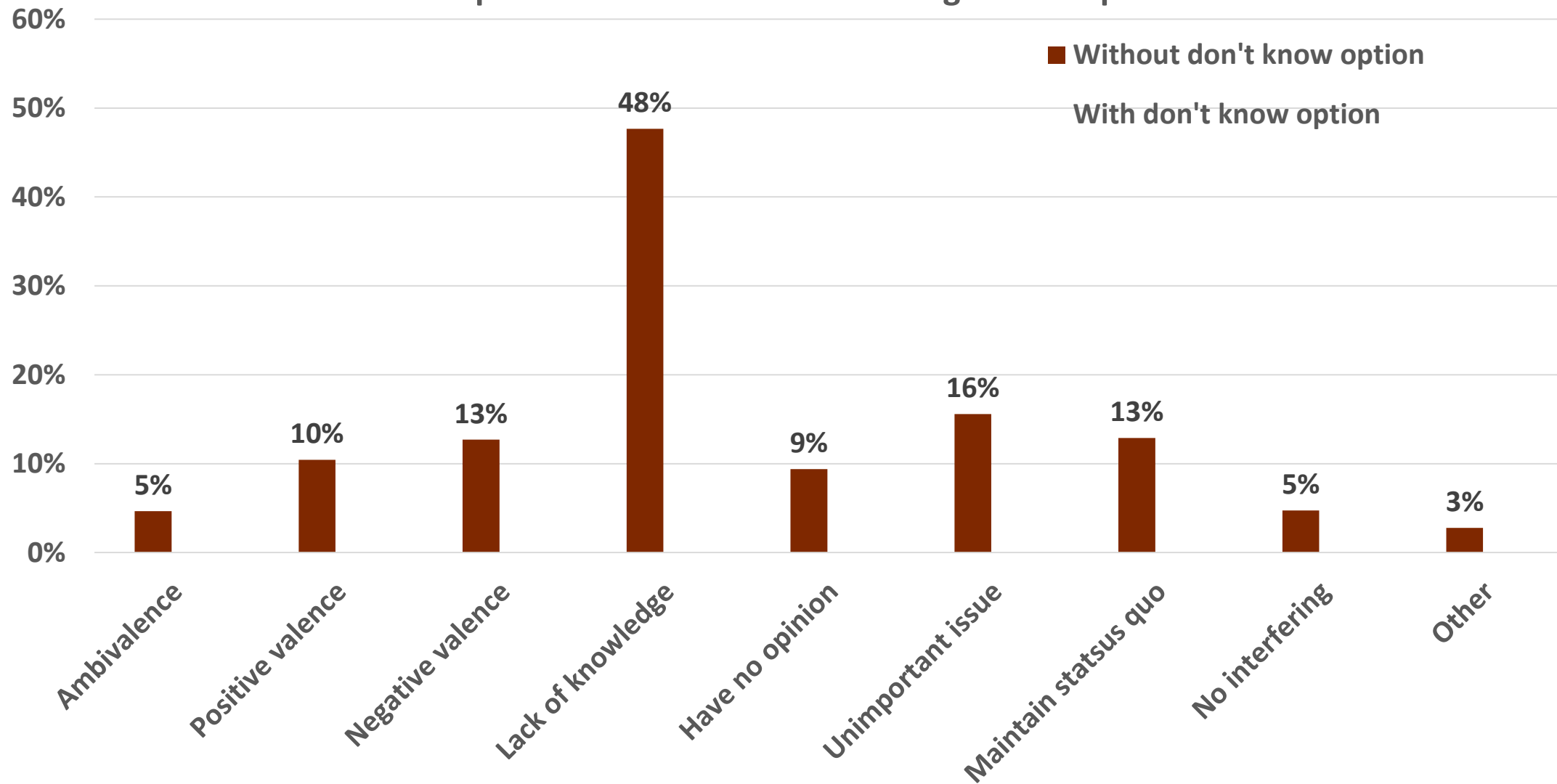


Study 2: Increase no of wolves



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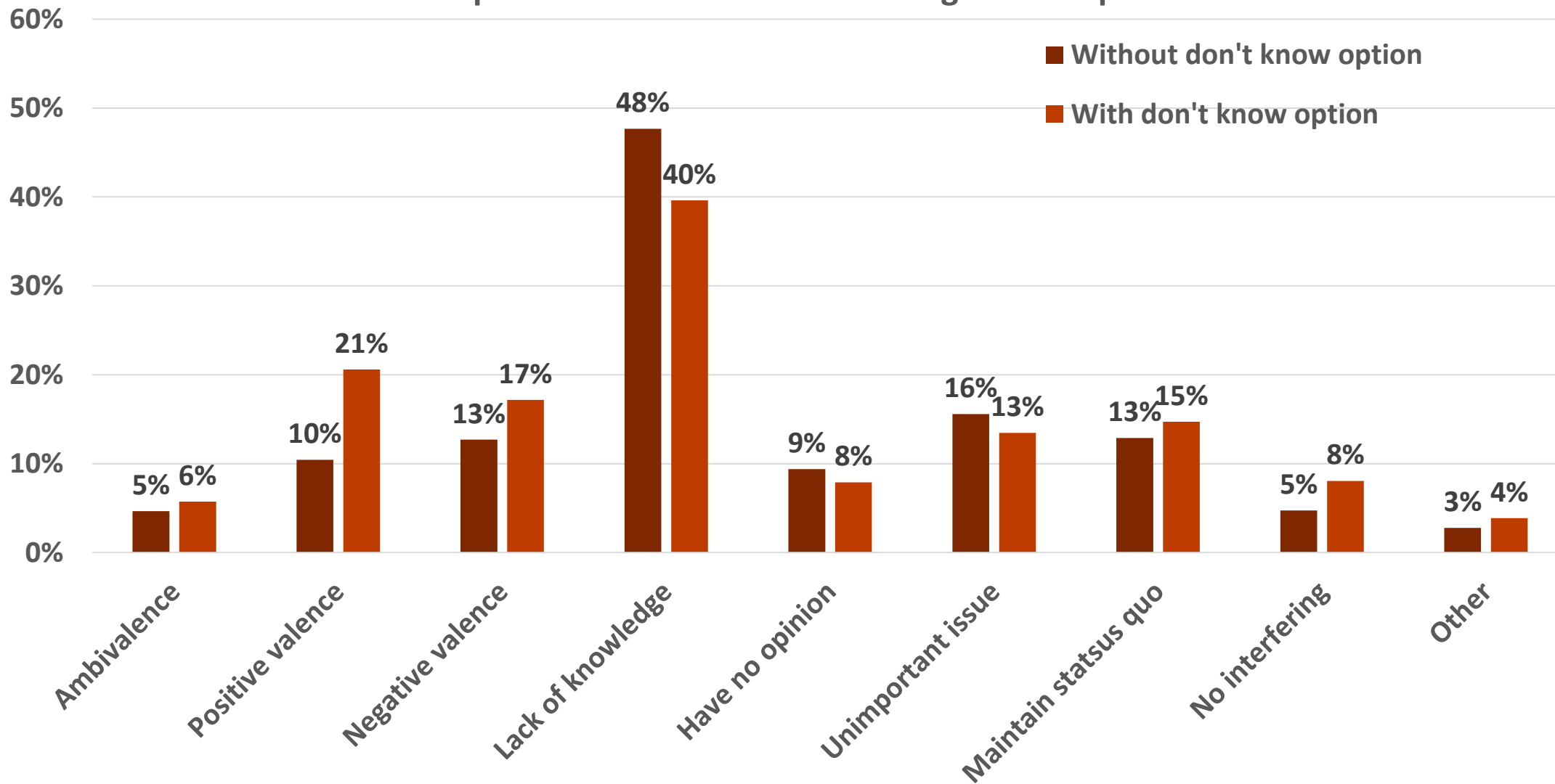
Respondents rationales for chosing the mid-point





Study 2: Increase no of wolves

Respondents rationales for chosing the mid-point





Study 2: Motivations for choosing the midpoint

“Increase the number of wolves in Sweden”

**Percent stating only unacceptable reasons for choosing the midpoint
(lack of knowledge, no opinion, unimportant etc)**

Without Don't Know option	With Don't Know option
55 %	46 %



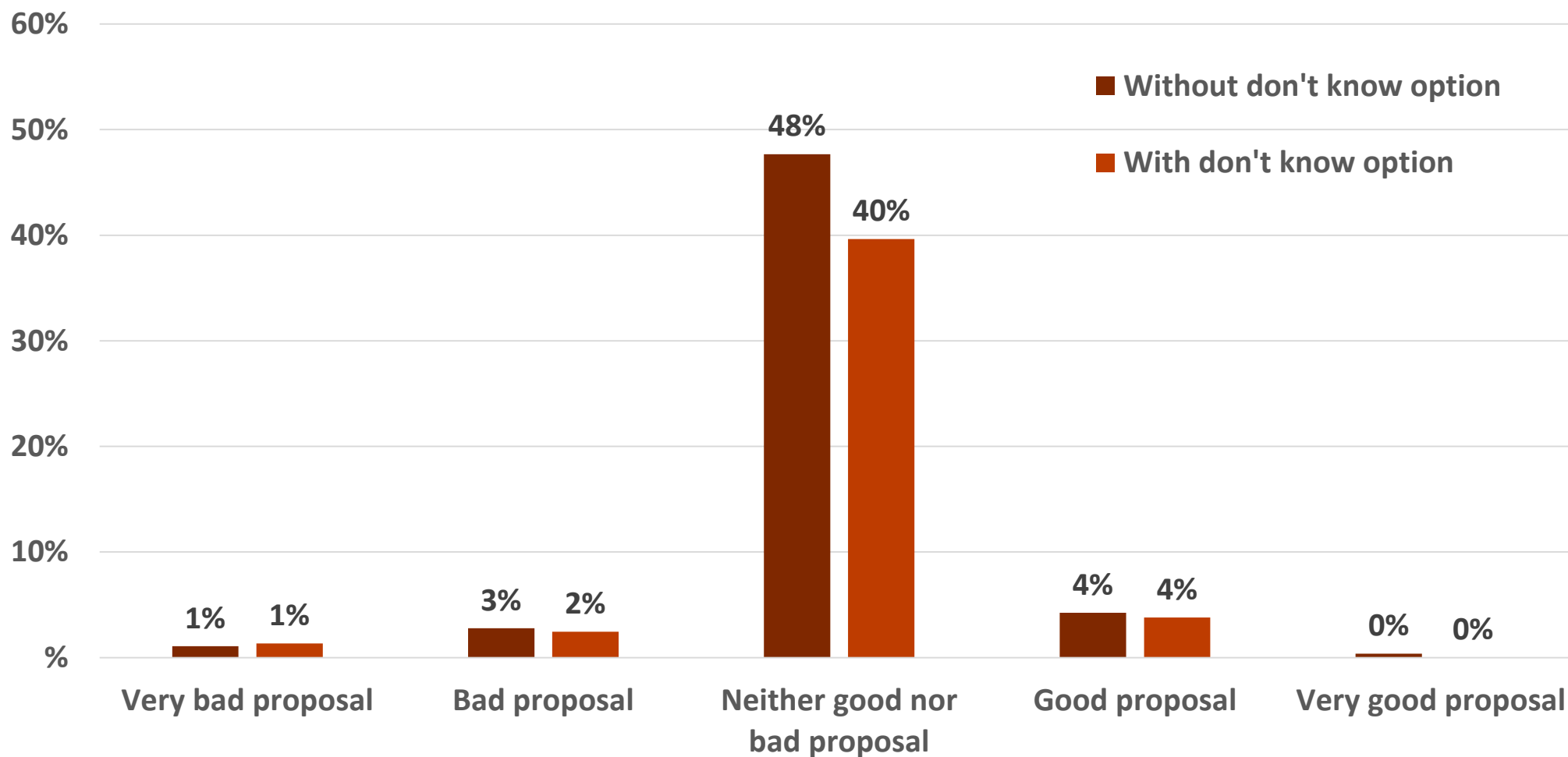
But what about those choosing other response options?

Do their stated reasons also indicate noisy in data?



Study 2: Increase no of wolves

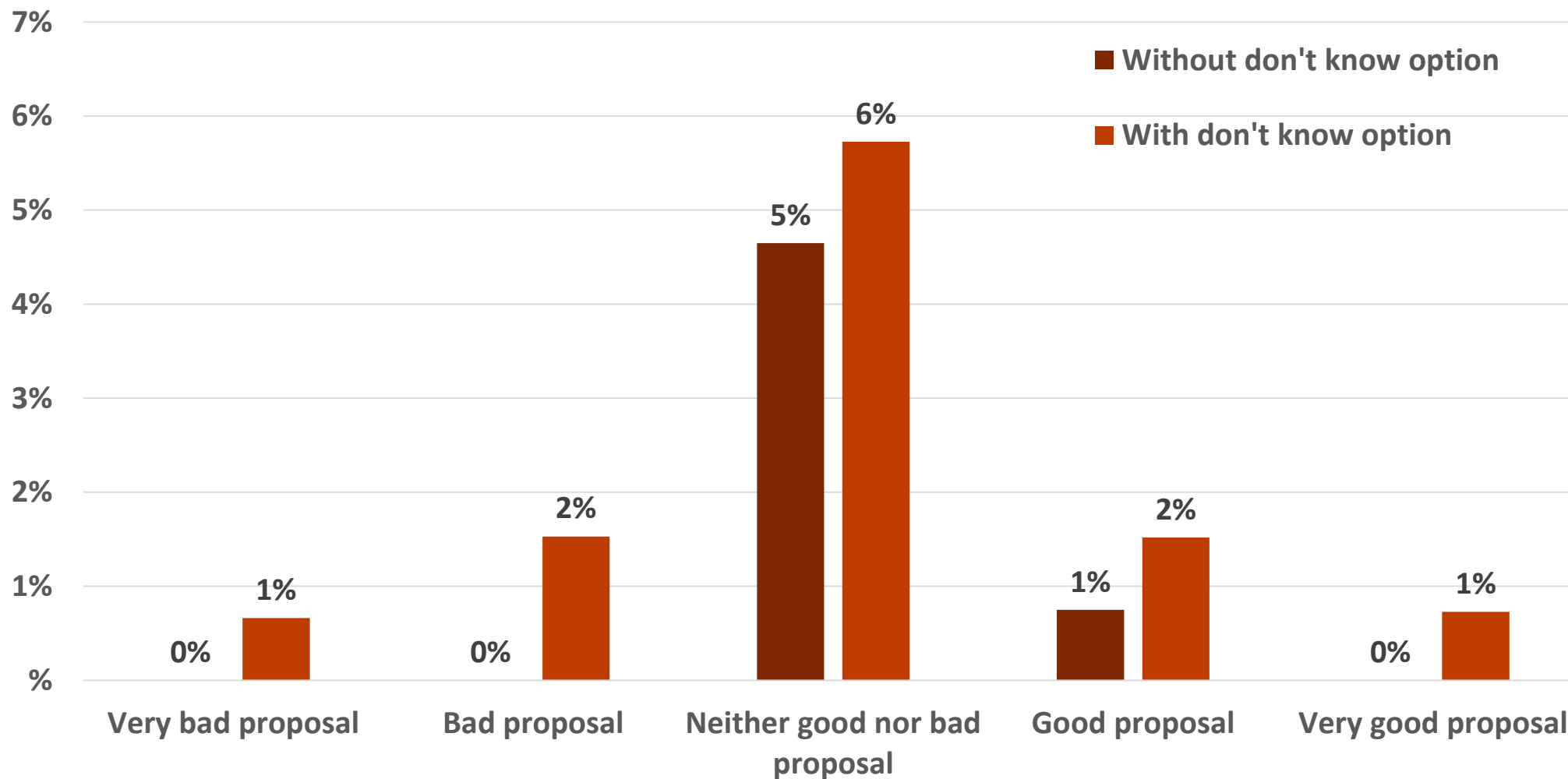
Respondents mentioning a lack of knowledge by response option





Study 2: Increase no of wolves

Respondents mentioning ambivalence by response option





Study 2 – preliminary summing up

- Largely similar results: a lot of noise in the mid point answers, even with Don't Know option available, but some reduction in noise is seen
- The same type of implausible stated reasons for the response much less among other response options



Summary Findings - again

Conclusions

- Midpoint responses on this type of policy rating scales often contain a lot of noise
- Including a Don't know option does not reduce this problem as much as many believe
- More research into this is needed, especially concerning other types of survey questions and response scales



Thank you for listening!