## Supplemental material

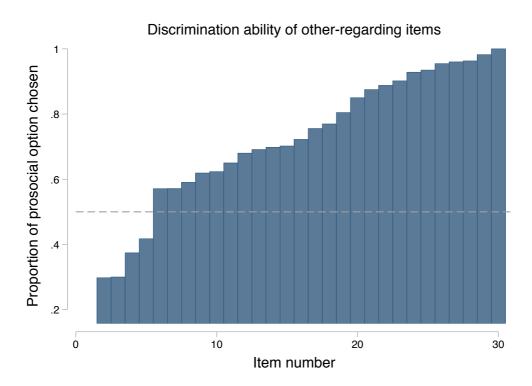


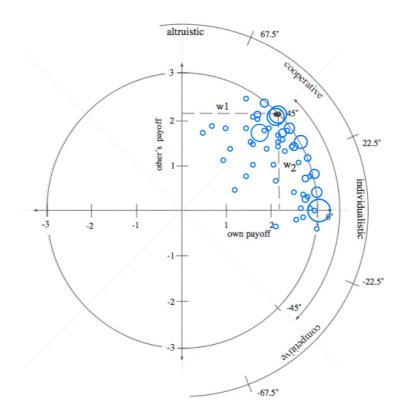
Fig. S1.

Distribution of prosocial choices for each other-regarding item. Dashed line at proportion =

0.5 indicates where the number of choices in favor of the prosocial and individualistic option was equal.

## Study 1

The presented tables provide a more detailed overview of the analyses that were conducted, including any control variables.



**Fig. S2.**Participant's Social Value Orientation (SVO) in Study 1 according to the SVO Ring Measure.
SVO angle is measured in degrees

Table S1

Choice of right option predicted by last fixation for self-determined (A), interrupted (B) and all trials (C). Separate analysis for other-regarding and moral choices.

(A) Self-determined	(B) Interrupted	(C) All trials
OR (right option)	OR (right option)	OR (right option)

	Social	Moral	Social	Moral	Social	Moral
Last fixation	6.24***	10.66***	2.67***	3.78***	3.50***	4.71***
right	(8.18)	(11.03)	(7.35)	(9.53)	(11.40)	(14.44)
Relative time	9.13***	11.97***	2.27***	4.21***	3.01***	4.45***
advantage right	(7.50)	(11.10)	(4.74)	(7.70)	(8.63)	(13.25)
SVO Angle	0.99	-	1.00	-	1.00	-
	(-0.25)		(0.97)		(1.12)	
SVO Angle ×	1.01	-	1.00	-	0.99	-
Last fixation	(0.55)		(-0.46)		(-0.86)	
Confidence	0.98	0.96	0.92*	0.97	0.93*	0.97
	(-0.37)	(-0.79)	(-2.14)	(-0.67)	(-2.41)	(-1.00)
Trial number	0.99*	1.00	1.00	1.00	1.00	1.00
	(-1.98)	(-0.38)	(1.60)	(0.65)	(0.96)	(1.22)
Constant	1.14	1.06	0.83**	0.82**	0.92	0.50**
	(1.13)	(0.62)	(-2.99)	(-2.98)	(-1.71)	(-3.29)
Observations	1179	1329	1404	1448	3243	3368

*Note.* Odds Ratios; z statistics in parentheses, p < .05, p < .01, p < .001. All variables are centered.

Table S2

Choice of right option predicted by last fixation and interrupted trial for other-regarding choices (A), moral choices (B) and all trials (C).

	(A) Other-regarding	(B) Moral	(C) All trials OR (right option)	
	OR (right option)	OR (right option)		
Last fixation	4.02*** (10.74)	5.96*** (14.83)	4.21*** (15.97)	
right				

Interrupted	$0.78^{*}$	(-2.14)	0.76**	(-2.66)	0.77***	(-3.91)
Last fixation ×	0.52**	(-2.97)	0.44***	(-3.75)	0.65**	(-3.04)
Interrupted						
Relative time	4.67***	(8.90)	7.27***	(16.03)	3.54***	(12.27)
advantage right						
Confidence	0.94	(-1.86)	0.97	(-0.92)	0.94**	(-3.02)
Trial number	1.00	(0.06)	1.00	(0.42)	1.00	(0.84)
Constant	0.94	(-1.13)	0.91*	(-1.58)	0.94	(-1.62)
Observations	26	75	27	77	672	24

*Note.* Odds Ratios; z statistics in parentheses, p < .05, p < .01, p < .001. All variables are centered.

Table S3

Comparison of other-regarding and moral choices. Choice of right option predicted by last fixation for self-determined (A), interrupted (B) and all trials (C).

	(A) Self-determined	(B) Interrupted	(C) All trials
	OR (right option)	OR (right option)	OR (right option)
Last fixation right	7.99*** (11.28)	3.22*** (10.41)	4.08*** (15.40)
Moral item	0.97 (-0.22)	0.98 (-0.22)	0.99 (-0.08)
Moral item ×	1.65* (2.39)	1.31 (1.69)	1.27* (2.11)
Last fixation			
Relative time	9.98*** (9.31)	3.02*** (8.22)	3.54*** (12.50)
advantage right			
Confidence	0.96 (-0.85)	0.95* (-2.18)	0.95* (-2.54)
Trial number	0.99* (-2.23)	1.00 (1.64)	1.00 (1.11)
Constant	1.11 (1.30)	0.75*** (-3.60)	0.93* (-1.96)

	2710		6.50.1
Observations	2540	2912	6724

*Note.* Odds Ratios; z statistics in parentheses, p < .05, p < .01, p < .01. All variables are centered.

## **Influence of SVO**

To put the observed effect of the last fixation on the likelihood to decide for the more prosocial option into context of another well studied effect, we used SVO as an additional behavioral predictor in the primary regression model. The results showed that, as in other studies, participants with a high SVO angle were more likely to make prosocial choices (OR = 1.01, z = 2.51, p = .012). In particular, that means that the pure individualist (SVO angle = 0°) made on average 8.25% fewer prosocial choices than an ideally prosocial (SVO angle =  $45^{\circ}$ ) participant. Testing the effect of the last fixation on the subsequent choice in the interrupted (self-determined) trials, the analysis revealed that in case the prosocial option was attended to last, the odds ratio of choosing the prosocial option was 2.12 (z = 6.07, p < .001, selfdetermined: OR = 6.52, z = 9.20, p < .001). Specifically, attending the prosocial option last increased the probability of choosing it by 15.19% (self-determined: 36.35%). Investigating the influence of SVO angle further, we found that it did not have an impact on the size of the attention-choice relationship (OR = 1.01, z = 0.55, p = .583), and neither on the strength of the bottom-up effect of attention on choices (OR = 1.00, z = -0.46, p = .649) in the interrupted trials. Additionally, the results showed that SVO angle did not have an impact on whether a participant made a self-determined choice (OR = 1.00, z = -0.34, p = .737) or was timed out (OR = 1.00, z = 0.20, p = .839). See Table S4 for the complete analysis.

Table S4

Choice of prosocial option predicted by SVO Angle for self-determined (A), interrupted (B) and all trials (C).

	(A) Self-determined	(B) Interrupted	(C) All trials	
	OR (prosocial)	OR (prosocial)	OR (prosocial)	
Last fixation	6.52*** (9.20)	2.12*** (6.07)	3.16*** (10.38)	
prosocial				
SVO Angle	1.01* (2.51)	1.01 (1.53)	1.01* (2.51)	
Trial number	1.00 (-1.40)	1.00 (0.91)	1.00 (0.43)	
Constant	0.99 (-0.04)	1.05 (0.33)	0.95 (-0.42)	
Observations	1179	1404	3243	

*Note.* Odds Ratios; z statistics in parentheses, p < .05, p < .01, p < .001.

Table S5

Separate analysis for other-regarding and moral choices. Choice of right option predicted by position of target for self-determined (A), interrupted (B) and all trials (C).

	(A) Self-determined		(B) Interrupted		(C) All trials	
	OR (righ	nt option)	OR (righ	nt option)	OR (right option)	
	Social	Moral	Social	Moral	Social	Moral
Target right	0.47***	0.48***	2.65***	3.78***	1.11	1.28**
	(-4.32)	(-5.48)	(7.15)	(9.53)	(1.32)	(3.37)
Relative time	8.64***	8.94***	2.26***	4.21***	2.98***	4.67***
advantage right	(8.70)	(10.12)	(4.75)	(7.70)	(8.56)	(12.48)
Confidence	0.98	0.98	0.92*	0.97	0.96	0.98
	(-0.31)	(-0.54)	(-2.31)	(-0.67)	(-1.58)	(-0.78)
Trial number	$0.99^{*}$	1.00	1.00	1.00	1.00	1.00
	(-2.49)	(-1.02)	(1.69)	(0.65)	(-0.10)	(0.67)
Constant	2.81**	2.29	0.74	0.48**	1.26	0.97

	(2.60)	(2.53)	(-1.36)	(-2.89)	(1.28)	(-0.15)
Observations	1211	1329	1464	1448	3356	3368

*Note.* Odds Ratios; z statistics in parentheses, p < .05, p < .01, p < .01.

We additionally tested whether making prosocial choices was linked to fulfilling the criteria of the gaze contingent paradigm. The results indicate that prosocial choices are more likely to be self-determined than interrupted (Table S6A). This finding is in line with prosocial options being chosen in more than half of the trials (67.2%), indicating a tendency to choose the more prosocial option and consequently increasing the likelihood of self-determined choices.

Table S6

Likelihood for the classification as a self-determined choices (A) or a timeout (B) predicted by confidence level, importance, SVO angle, target choice, trial, position of chosen option and type of choice.

	Othe	Other-regarding choices			Moral choices		
	(A) O	R (B	) OR	(C)	OR	(D)	) OR
	(self-deterr	nined) (tin	neout)	(self-det	ermined)	(tim	neout)
Confidence	1.32*** (5.9	0.91*	(-2.42)	1.56***	(9.26)	0.91*	(-2.55)
level							
Importance	1.00 (0.0	1.00	(-0.04)	1.01	(0.20)	0.99	(-0.12)
SVO angle	1.00 (-0.	34) 1.00	(0.20)	-		-	
Choice of	0.28*** (-1	0.51***	(-5.78)	0.22***	(-12.04)	0.34***	(-8.32)
target option							
Trial number	1.01** (3.2	26) 1.00	(0.89)	1.01***	(4.47)	1.00	(1.29)
Choice of	1.30* (2.0	1.12	(1.02)	1.40**	(3.15)	1.11	(0.87)
			<u>_</u>				

right option				
Prosocial	1.35* (2.31)	0.84 (-1.57)	-	-
option				
Constant	0.13*** (-5.89)	0.81 (-0.75)	0.05*** (-7.55)	0.74 (1.09)
Observations	2583	2064	2777	2039

*Note.* Odds Ratios; z statistics in parentheses, p < .05, p < .01, p < .001.

Table S7

Choice of right option predicted by last fixation for (A) self-determined choices, (B)

interrupted choices and (C) all trials. Model (1) does not include trial number as a control variable, (2) controls for trial number and (3) includes an interaction between trial number and last fixation.

	(A) Self-determined				
	(1)	(2)	(3)		
Last fixation right	8.05*** (11.34)	7.99*** (11.28)	9.41*** (11.65)		
Relative time	9.85*** (9.15)	9.89*** (9.25)	4.85*** (9.06)		
advantage right					
Confidence	0.96 (-0.94)	0.96 (-0.89)	0.96 (-1.01)		
Trial number	-	0.99* (-2.16)	1.00* (-2.22)		
Trial number × last	-	-	1.00 (0.37)		
fixation right					
Constant	0.52* (-2.31)	0.63* (-1.52)	1.11 (1.28)		
Observations	2540	2540	2540		

		(B) Interrupted		
	(1)	(2)	(3)	
Last fixation right	3.21*** (10.49)	3.22*** (10.53)	3.39*** (10.68)	
Relative time	3.03*** (8.26)	3.05*** (8.33)	2.32*** (8.08)	
advantage right				
Confidence	0.95* (-2.23)	0.95* (-2.24)	0.95* (-2.25)	
Trial number	-	1.00 (1.72)	1.00 (1.89)	
Trial number $\times$ last	-	-	0.99** (-2.90)	
fixation right				
Constant	0.65** (-2.82)	0.59** (-3.16)	0.83*** (-3.94)	
Observations	2912	2912	2912	
		(C) All trials		
	(1)	(2)	(3)	
Last fixation right	4.07*** (15.43)	4.08*** (15.45)	4.37*** (15.93)	
Relative time	3.55*** (12.58)	3.55*** (12.55)	2.39*** (10.58)	
advantage right				
Confidence	0.95* (-2.57)	0.95** (-2.61)	0.95** (-2.67)	
Trial number	-	1.00 (1.14)	1.00 (1.03)	
Trial number × last	-	-	1.00 (-1.32)	
fixation right				
fixation right Constant	0.65** (-3.27)	0.61** (-3.35)	0.92* (-2.12)	

*Note.* Odds Ratios; z statistics in parentheses, p < .05, p < .01, p < .01.

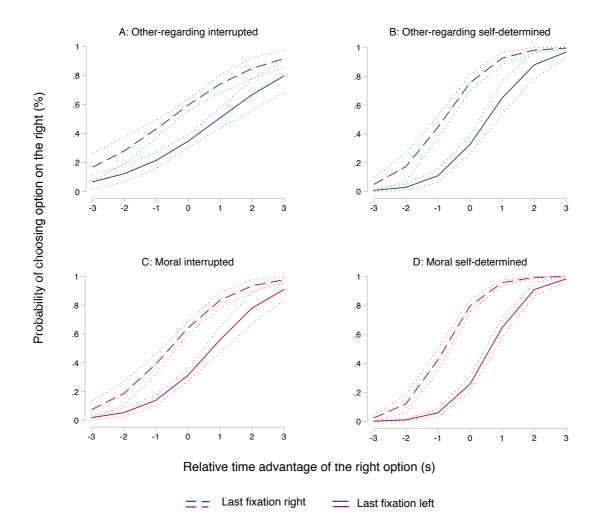


Fig. S3.

Effect of direction of last fixation on choice probability for (A) other- regarding choices in interrupted trials, (B) other-regarding choices in self-determined trials, (C) moral choices in interrupted trials and (D) moral choices in self-determined trials. Dotted lines indicate 95% confidence intervals. N = 116.

## **Semantic differences**

To analyze how semantic differences between the alternatives presented on the screen affect subsequent choices and attention processes, we conducted a number of additional analyses.

Descriptive statistics of fixation number and duration for self-determined (A) and interrupted choices (B).

	(A) Self-	(B) Interrupted	
	determined		
Fixation number	19 (5)	23 (4)	
Fixation duration (in	0.11 (0.03)	0.11 (0.02)	
seconds)			
Observations	2497	2912	

*Note*. For fixation number, median and median average deviation (in parentheses) are reported due to a skewed distributions. For fixation duration, mean and standard deviation (in parentheses) are reported.

Table S9

Repeated measured linear regression using interrupted choice / self-determined choice to predict (A) fixation number and (B) fixation duration.

	(A) Fixation number	(B) Fixation duration	
Interrupted	0.12*** (5.84)	-0.00*** (-3.80)	
Constant	3.03*** (125.13)	0.11*** (60.23)	
Observations	224	224	

*Note.* Unstandardized regression coefficients are reported, z in parentheses. Fixation number is log-transformed due to a skewed distribution. p < .05, p < .01, p < .001.

Table S10

The influence of semantic differences on choosing the target option and on information search

	(A) OR (target	(B) Fixation number	(C) Fixation
	choice)	(log)	duration
Alternatives	1.09 (1.22)	1.15*** (16.32)	-0.01*** (-8.89)
including verb			

Constant	0.97 (-0.60)	2.96*** (131.76)	-0.11**** (-66.13)
Observations	5409	5409	5409

*Note.* (A) Odds Ratios are reported, (B) and (C) unstandardized coefficients are reported; z statistics in parentheses, p < .05, p < .01, p < .001.

Table S11

The influence of semantic differences on choosing the right option and on the link between last fixation and subsequent choice.

	(A) Self-de	etermined	(B) Int	errupted	(C) A	ll trials
	OR (right	t option)	OR (rig	ht option)	OR (rig	ht option)
Alternative	0.92	(-0.73)	1.08	(0.83)	0.98	(-0.23)
including verb						
Alternative	0.89	(-0.48)	0.89	(-0.64)	0.86	(1.06)
including verb						
× Last fixation						
right						
Last fixation	7.98***	(11.20)	3.23***	(10.51)	4.07***	(15.44)
right						
Relative time	9.79***	(9.12)	3.03***	(8.32)	3.53***	(12.47)
advantage						
right						
Confidence	0.96	(-0.89)	0.95*	(-2.23)	0.95**	(-2.61)
Trial number	1.00*	(-2.13)	1.00	(1.70)	1.00	(1.13)
Constant	1.11	(1.28)	0.83***	(-3.73)	0.93*	(-2.01)
Observations	254	10	29	912	6′	724

*Note.* Odds Ratios; z statistics in parentheses, p < .05, p < .01, p < .01. All variables are centered.

Table S12

Study 1: Choice of right option predicted by last fixation for the autonomous (A), exogenous group (B), and both groups combined (C).

	(A) Autonomous	(B) Exogenous	(C) Pooled
	OR (right option)	OR (right option)	OR (right option)
Character count	1.00 (0.38)	1.00 (-0.25)	1.00 (-0.87)
Last fixation right	9.41*** (11.62)	3.44*** (10.90)	4.37*** (15.89)
Character count ×	0.99 (-0.74)	1.00 (-0.52)	1.00 (-0.89)
Last fixation right	0.77 (0.74)	1.00 (0.32)	1.00 (0.05)
Relative time	4.79*** (8.91)	2.31*** (7.93)	2.38*** (10.30)
advantage right	4.79 (6.91)	2.31 (7.93)	2.36 (10.30)
Confidence	0.96 (-1.02)	0.95* (-2.16)	0.95** (-2.66)
Trial number	1.00* (-2.19)	1.00 (1.57)	1.00 (0.96)
Constant	1.11 (1.28)	0.83*** (-3.84)	0.93* (-2.06)
Observations	2540	2912	6724

*Note.* Odds Ratios; z statistics in parentheses. All variables are centered, \*p < .05, \*\*p < .01, \*\*\*\* p < .001.

Table S13

Study 2: Choice of right option predicted by last fixation for the autonomous (A) and exogenous group (B).

	(A) Autonomous	(B) Exogenous
	OR (right option)	OR (right option)
Character count	1.00 (0.76)	1.00 (0.07)
Last fixation right	10.86*** (21.89)	1.21* (2.33)
Character count × Last	1.00 (-0.23)	0.99 (-1.45)
fixation right	( )	( )

Relative time advantage	4.26*** (14.99)	0.85** (-2.64)
right	4.20 (14.77)	0.03 (-2.04)
Confidence	0.96 (-1.11)	1.00 (-0.07)
Trial number	1.00 (0.20)	1.00 (0.36)
Constant	0.71 (-4.92)	0.99 (-0.14)
Observations	2754	2932

*Note.* Odds Ratios; z statistics in parentheses. All variables are centered, p < .05, p < .01, p < .001.