Presentation at the BPS Social Psychology Section Conference, St Andrews, August 2012

The theory of planned behaviour, self-identity, and moral disengagement: What predicts sustainability at work?

> Dennis Nigbur*, Sharon Coen**, Ana Fernández*, Anke Franz* and Ian Hocking*

* Canterbury Christ Church University
 ** now at the University of Salford





Explaining & predicting sustainability at work

- theory of planned behaviour (Ajzen, 1991)
 - travel choice (Bamberg et al., 2003)
 - waste separation / recycling, energy saving (Steinheider et al., 1999)
- self-identity (Stryker, 1987) & role fulfilment
 - calls for an inclusion in the TPB (Sparks, 2000)
 - evidence for utility in predicting household waste recycling (e.g. Nigbur et al., 2010; Terry et al., 1999)
- moral disengagement (Bandura, 1990)
 - involvement in sustainability (Bandura, 2007)?





Green Impact at CCCU



- Green Impact scheme
 - promotion of various sustainability behaviours across campus (recycling, energy saving, ...)
 - "environmental champions" for each team (see Hopper & Nielsen, 1991)
 - questionnaire on predictors of sustainable action (followed up after conclusion of the scheme, but not used for data analysis because of poor response)





Green Impact study: Method

- online questionnaire, *N* = 130 (phase 2 not reported)
- measures on recycling, energy saving, water saving, transport
- attitude (4 items, α = .45!)
 - "Recycling materials is the right thing to do."
- subjective norm (4 items, α = .82)
 - "People important to me would agree that water should be conserved."
- self-efficacy / perceived control (4 items, $\alpha = .52!$)
 - "Taking a short shower rather than a long one is easy."
- self-identity (4 items, $\alpha = .73$)
 - "I consider myself an energy-saver."
- intention (4 items, α = .65)
 - "I will recycle at work wherever possible in the future."





Green Impact study: Method

- moral disengagement sub-scales
- moral justification (5 items, $\alpha = .69$)
 - "Concern for environmental issues is being exploited by the university as a way to make money."
- exonerative comparison (3 items, $\alpha = .87$)
 - "Driving to work is less of an issue when one thinks about how many people take flights to exotic destinations."
- displacement of responsibility (5 items, $\alpha = .60$)
 - "It's not an individual's fault if they don't look for a recycling bin during busy periods."
- diffusion of responsibility (3 items after 1 deletion, $\alpha = .58$)
 - "If no one in the workplace recycles, one cannot be blamed for not recycling."





Green Impact study: Method

- moral disengagement sub-scales
- denial of consequences (3 items, $\alpha = .77$)
 - "A short car ride hardly affects the environment."
- attribution of blame (3 items, $\alpha = .40!$)
 - "It is understandable that people would refuse to change their behaviour, since their behaviour has been reinforced by society."
- additional moral construct (Woods et al., 2010)
- religious metaphor (5 items, $\alpha = .86$)
 - "Nowadays people who are not 'green' are treated like sinners."





Results: Overall

attitude *M* = 4.33, *s* = 0.53 Block 1 $\beta = .16^{\circ}$ $R^2 = .35, F(3, 114) = 20.06, p < .001$

subjective norm *M* = 4.00, *s* = 0.83 *intention M* = 3.94, *s* = 0.71

self-identity β = .43*** *M* = 3.56, *s* = 0.75

perceived control *M* = 3.93, *s* = 0.66

Block 2 *R*² = .46, *F* (1, 113) = 23.87, *p* < .001

- subjective norm & self-identity substantially predict intention
- specificity of measurement issue: individual behaviours?





Results: Recycling

attitude *M* = 4.68, *s* = 0.61

Block 1 $\beta = .21^*$ $R^2 = .27$, F (3, 114) = 13.71, p < .001

subjective norm *M* = 4.33, *s* = 0.85 $\beta = .24^{**}$

β = -.04

intention M = 4.53, *s* = 0.60

self-identity β = .35*** *M* = 3.72, *s* = 1.11

perceived control *M* = 3.82, *s* = 1.11

Block 2 *R*² = .36, *F* (1, 113) = 17.48, *p* < .001





Results: Energy saving

	attitude $M = 4.33, s = 1.00$ $\beta = .34^{***}$ $Block 1$ $R^2 = .31, F(3, 114) = 17.31, p < .001$
	subjective norm $M = 4.13, s = 0.94$ $\beta = .04$ intention $M = 4.40, s = 0.81$ self-identity $M = 3.98, s = 0.77$
-	$\beta = .23^{**}$
	M = 4.56, s = 0.69 Block 2 R ² = .36, F (1, 113) = 7.99, p < .001
	Canterbury Christ Church

University

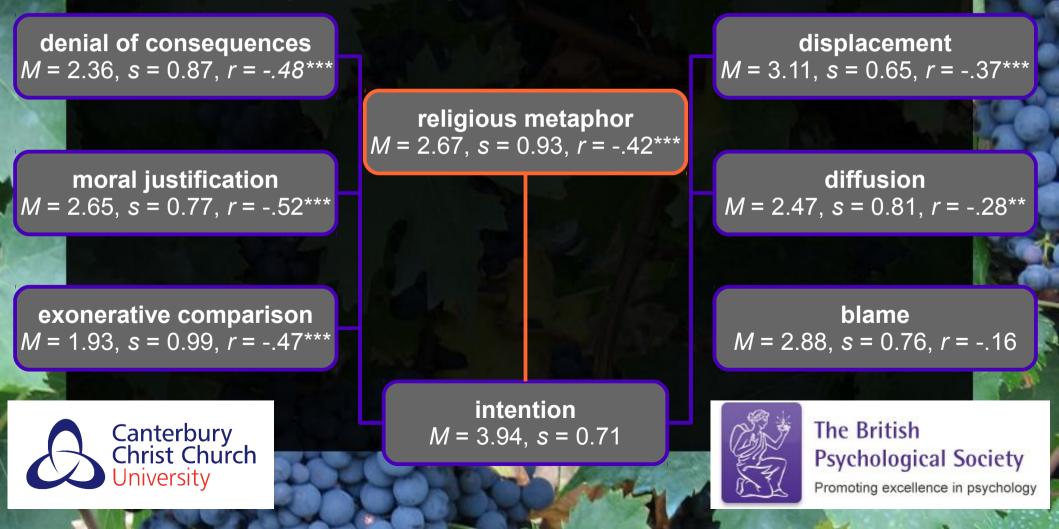


Results: Transport

attitude $M = 4.00, s = 0.93$ $\beta = .06$ Block 1 $R^2 = .39, F(3, 114) = 24.07, p < .001$	
subjective norm M = 3.29, s = 1.35 $B = .31^{***}$ M = 3.39, s = 1.34 $B = .17^{*}$ $B = .17^{*}$	
β = .33*** berceived control M = 3.21, s = 1.35 Block 2	
<i>R</i> ² = .41, <i>F</i> (1, 113) = 4.36, <i>p</i> < .05	
Canterbury Christ Church University	

Results: Moral disengagement

 clearly related to sustainability intentions, but reliability & validity issues with our measures ...

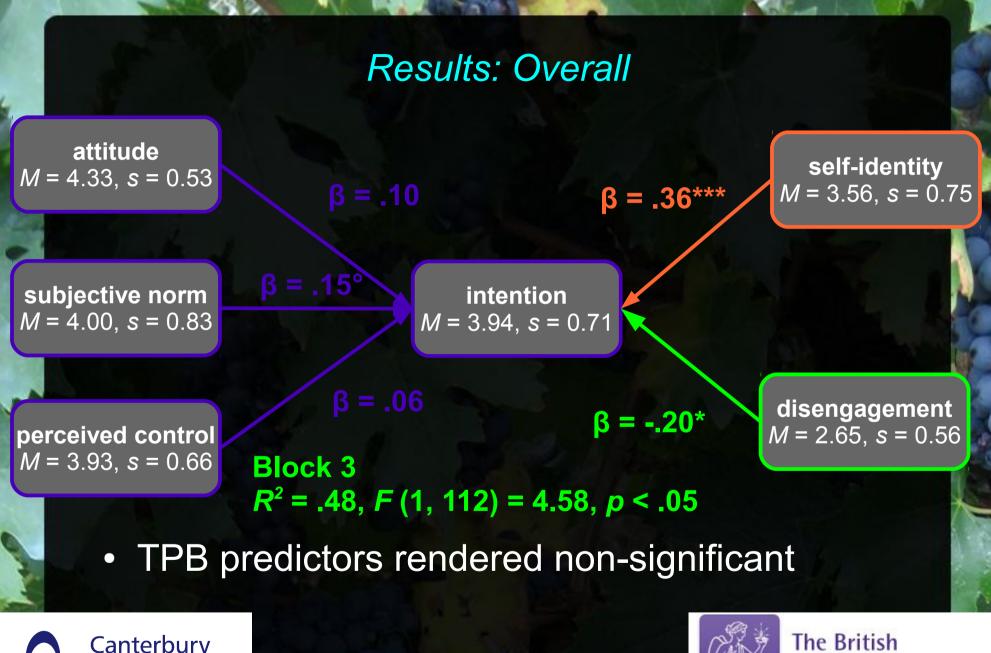


Extra: A different take on moral disengagement

- problems with our measures
 - poor internal reliability esp. for blame sub-scale
 - some multicollinearity & face validity problems (e.g. displacement or diffusion of responsibility?)
 - different levels of specificity may engender poor fit with TPB
- alternative approach: treating disengagement as a single construct using items that specifically concern the behaviour in question $(\alpha_{recycling} = .67, \alpha_{energy} = .57, \alpha_{transport} = .64)$



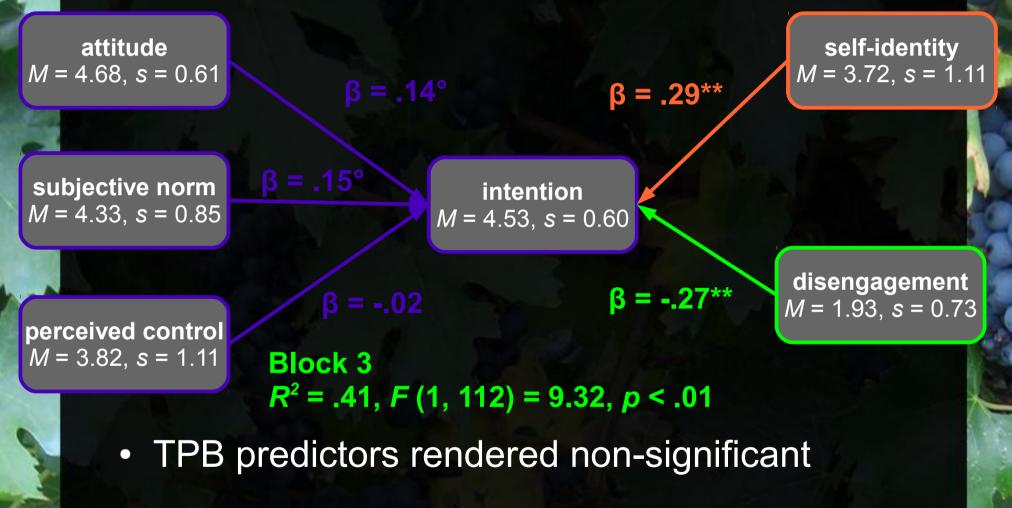








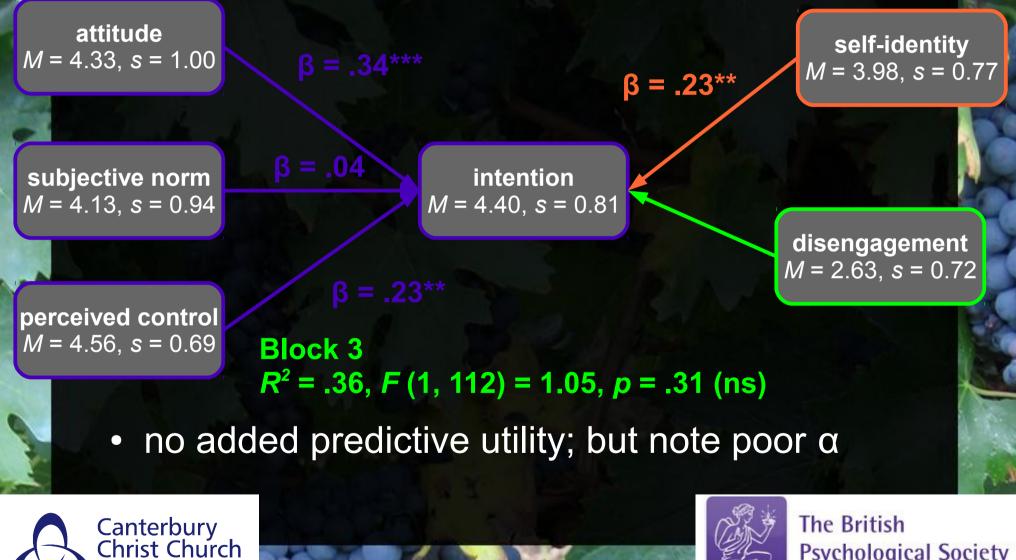
Results: Recycling



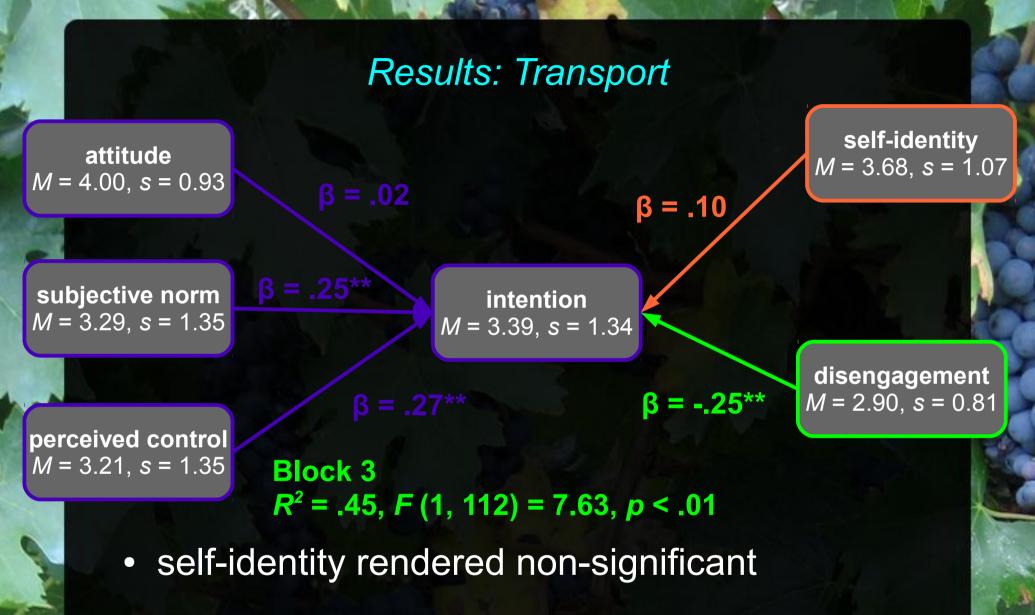




Results: Energy saving



University







Conclusions

- support for the TPB in predicting workplace sustainability action
 - note different predictors for different behaviours (see Whitmarsh & O'Neill, 2010, on catalyst effects)
 - but potential reliability / validity issues due to singleitem measures
- consistent support for utility of self-identity
- moral disengagement from sustainability
 - clear evidence of utility, but maybe not within the TPB
 - practical aspect: ease of re-engagement?



