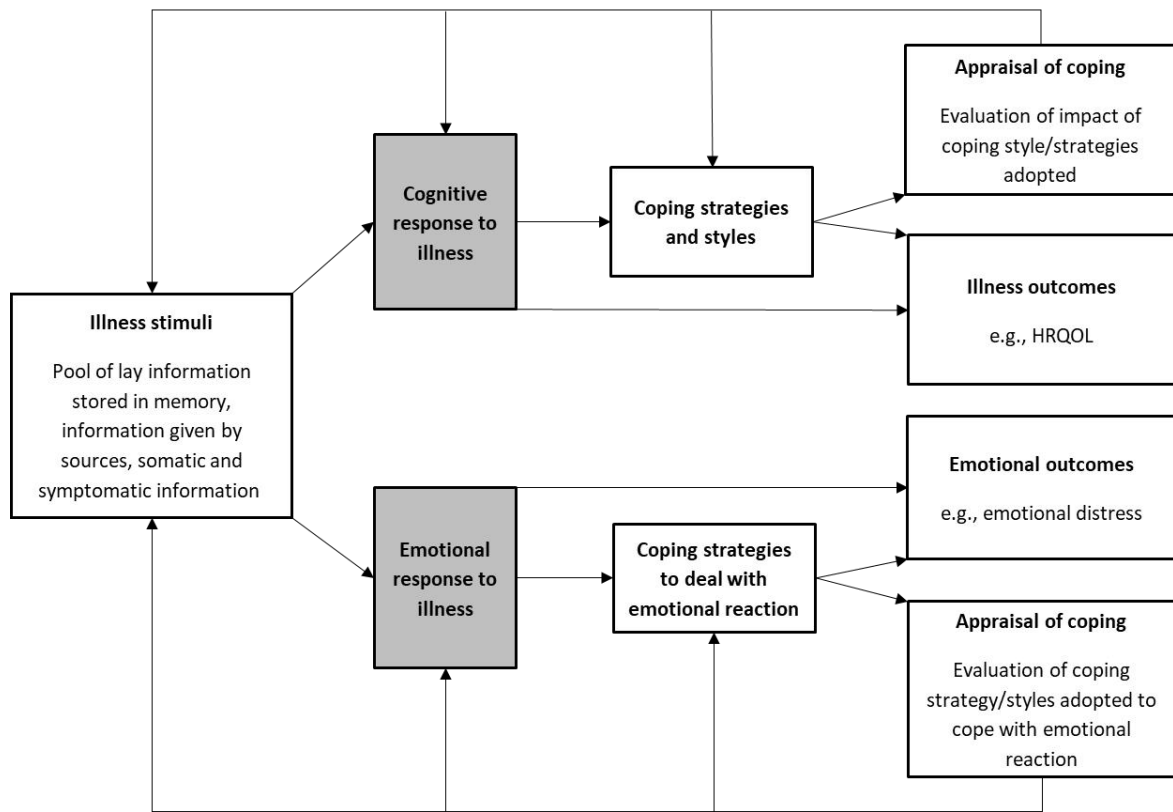
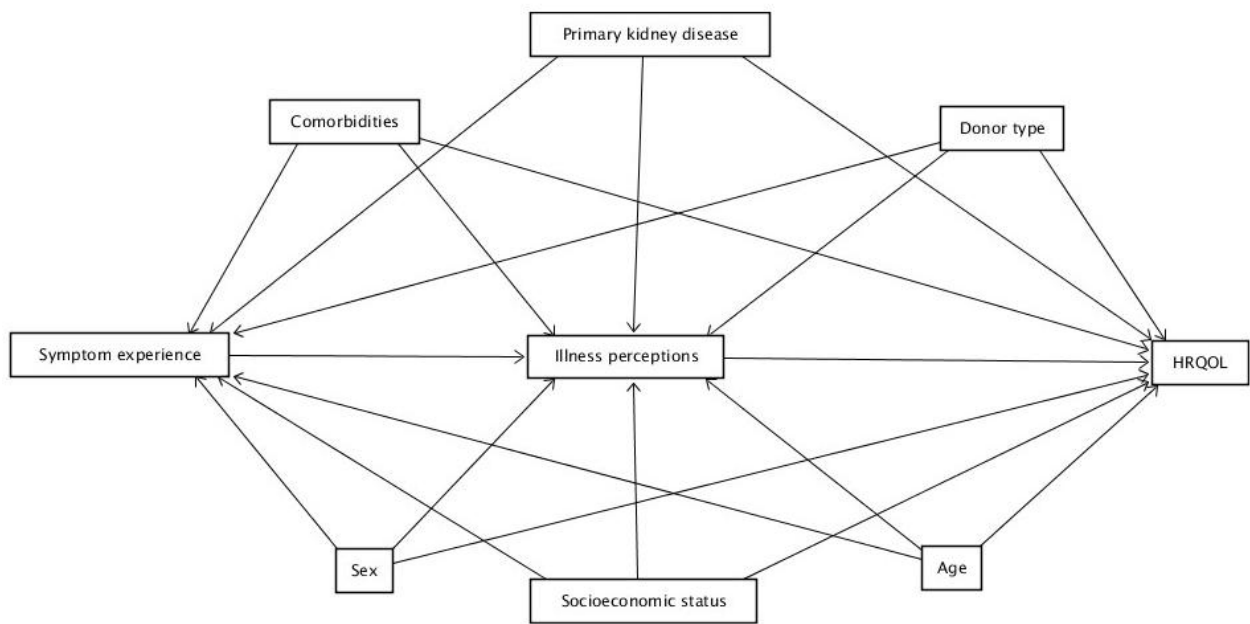


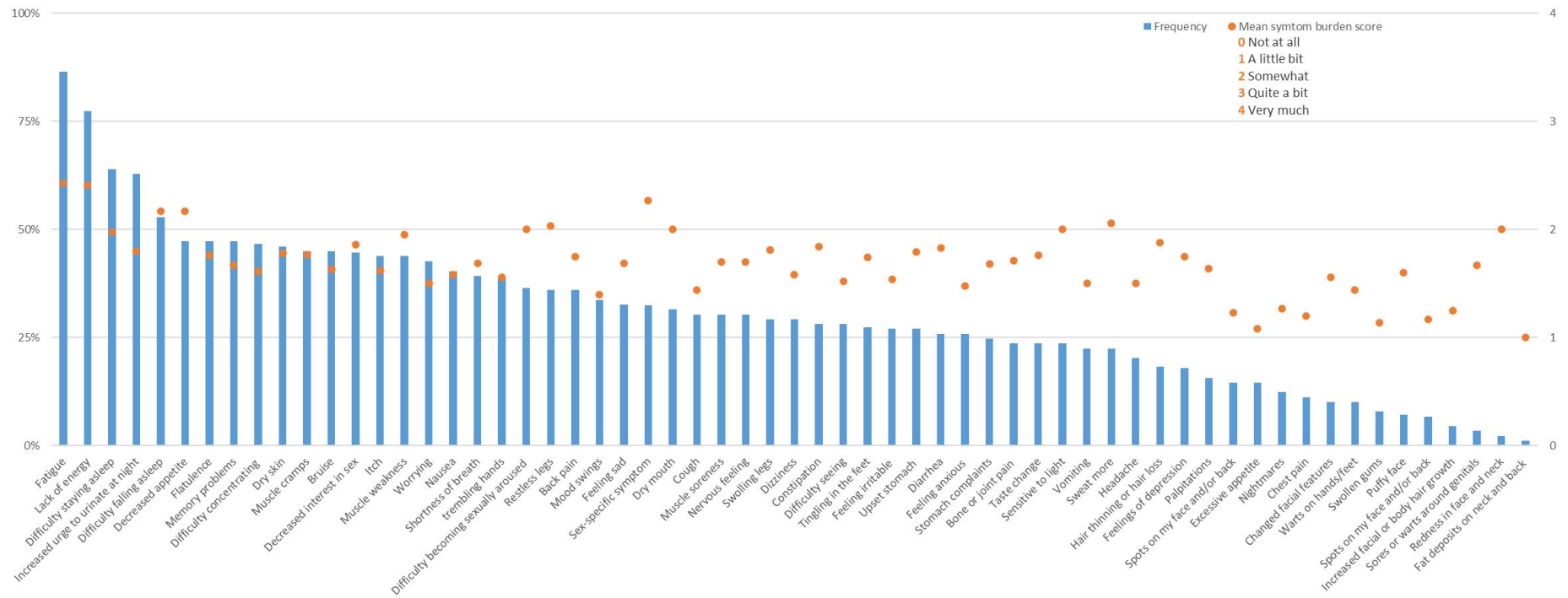
Supplementary file



**Figure S1.** Visual representation of Leventhal's Common Sense Model of self-regulation (adapted from Hagger & Orbell, 2003). The boxes in grey represent the 'illness perceptions'.



**Figure S2.** Directed acyclic graphs (DAGs) structured the potential exposure-outcome, exposure-mediator, and mediator-outcome confounders. Abbreviations: HRQOL, health-related quality of life.



**Figure S3.** Symptom experience of the study population at T0 (n=90). One patient with more than 5 missing values in their symptom checklist was excluded from the descriptive statistics in the figure.

**Table S1.** Clinical and demographic characteristics of participants and non-participants.

<b>Characteristics</b>	<b>Participants (n=156)</b>	<b>Non-participants (n=243)</b>
<b>Mean age (SD)<sup>a</sup></b>	53.3 (13.5)	53.1 (14.5)
<b>Female, n(%)</b>	56 (36)	94 (39)
<b>SES, n(%)<sup>a</sup></b>		
Low	25 (16)	57 (24)
Middle	103 (66)	134 (55)
High	26 (17)	46 (19)
<b>Primary kidney disease, n(%)<sup>a</sup></b>		
Diabetes mellitus	29 (19)	70 (29)
Glomerulonephritis	36 (23)	48 (20)
Renal vascular disease	18 (12)	14 (6)
Other diseases	71 (46)	111 (45)
<b>Donor type, n(%)<sup>a</sup></b>		
Living donor	89 (57)	134 (55)
Deceased donor	65 (42)	109 (45)
<b>Comorbidities, n(%)<sup>a</sup></b>		
Diabetes mellitus	18 (12)	42 (17)
Cardiovascular event	24 (15)	35 (14)
Cerebrovascular event	8 (5)	13 (5)

<sup>a</sup>Missing values: diabetes mellitus, cardiovascular event, cerebrovascular event (participants: 37.8%, 32.1%, 32.1%; non-participants: 47.7%, 44.0%, 44.4%). Participants had 1% missing values in age, SES, primary kidney disease and donor type. Non-participants had 2% missing values in SES. Abbreviations: SES, socioeconomic status; SD, standard deviation.

**Table S2.** Impact of symptom experience at T0 on HRQOL at T1 and the mediation effect of illness perceptions (n=87, complete case analysis).

	Estimates	Crude $\beta$ (95%CI)	P-value	Adjusted $\beta$ (95%CI) <sup>a</sup>	P-value
<b>Number of symptoms and HRQOL</b>					
<b>PCS</b>	<b>Total effect<sup>b</sup></b>	-0.17 (-0.34, -0.01)	0.04	-0.15 (-0.32, 0.03)	0.09
	<b>Direct effect</b>	-0.10 (-0.26, 0.07)	0.24	-0.08 (-0.24, 0.09)	0.35
	<b>Indirect effect</b>	-0.07 (-0.15, -0.02)		-0.07 (-0.14, -0.005)	
<b>MCS</b>	<b>Total effect</b>	-0.24 (-0.43, -0.05)	0.01	-0.24 (-0.43, -0.05)	0.02
	<b>Direct effect</b>	-0.10 (-0.26, 0.07)	0.25	-0.12 (-0.28, 0.04)	0.14
	<b>Indirect effect</b>	-0.15 (-0.26, -0.05)		-0.11 (-0.23, -0.01)	
<b>Symptom burden and HRQOL</b>					
<b>PCS</b>	<b>Total effect</b>	-0.05 (-0.13, 0.02)	0.13	-0.04 (-0.12, 0.03)	0.24
	<b>Direct effect</b>	-0.02 (-0.09, 0.04)	0.48	-0.02 (-0.09, 0.05)	0.63
	<b>Indirect effect</b>	-0.03 (-0.06, -0.01)		-0.03 (-0.06, -0.001)	
<b>MCS</b>	<b>Total effect</b>	-0.08 (-0.16, 0.01)	0.07	-0.07 (-0.15, 0.02)	0.11
	<b>Direct effect</b>	-0.02 (-0.09, 0.05)	0.63	-0.02 (-0.09, 0.05)	0.54
	<b>Indirect effect</b>	-0.06 (-0.10, -0.02)		-0.04 (-0.10, -0.002)	

The p-values of the interaction term between symptom experience and illness perception ranged from 0.13 to 0.97. Abbreviations: CI, confidence interval; HRQOL, health-related quality of life; MCS, mental component scale; PCS, mental component scale; RR, risk ratio; SD, standard deviation.

<sup>a</sup>The adjusted variables include age, sex, socioeconomic status (continuous scale), primary kidney disease, and donor type.

<sup>b</sup>The total effect is the sum of the direct and indirect effects.

**Table S3.** Impact of symptom experience (based on the DSI-items only) at T0 on HRQOL at T1 and the mediation effect of illness perceptions (n=90).

	Estimates	Crude $\beta$ (95%CI)	P-value	Adjusted $\beta$ (95%CI) <sup>a</sup>	P-value	Adjusted $\beta$ (95%CI) <sup>b</sup>	P-value
<b>Number of symptoms and HRQOL</b>							
<b>PCS</b>	<b>Total effect<sup>c</sup></b>	-0.28 (-0.55, -0.01)	0.04	-0.25 (-0.52, 0.02)	0.07	-0.23 (-0.51, 0.05)	0.10
	<b>Direct effect</b>	-0.16 (-0.43, 0.11)	0.24	-0.14 (-0.41, 0.12)	0.28	-0.13 (-0.40, 0.14)	0.29
	<b>Indirect effect</b>	-0.12 (-0.21, -0.02)		-0.11 (-0.22, 0.002)		-0.10 (-0.21, 0.02)	
<b>MCS</b>	<b>Total effect</b>	-0.46 (-0.76, -0.15)	0.004	-0.43 (-0.72, -0.13)	0.01	-0.41 (-0.72, -0.11)	0.01
	<b>Direct effect</b>	-0.22 (-0.48, 0.05)	0.11	-0.25 (-0.50, 0.01)	0.06	-0.24 (-0.51, 0.02)	0.07
	<b>Indirect effect</b>	-0.24 (-0.41, -0.07)		-0.18 (-0.36, -0.0002)		-0.17 (-0.36, 0.02)	
<b>Symptom burden and HRQOL</b>							
<b>PCS</b>	<b>Total effect</b>	-0.09 (-0.20, 0.03)	0.15	-0.08 (-0.19, 0.04)	0.22	-0.07 (-0.19, 0.06)	0.29
	<b>Direct effect</b>	-0.04 (-0.15, 0.07)	0.48	-0.03 (-0.15, 0.08)	0.56	-0.03 (-0.15, 0.09)	0.63
	<b>Indirect effect</b>	-0.05 (-0.09, -0.01)		-0.04 (-0.09, 0.004)		-0.04 (-0.08, 0.01)	
<b>MCS</b>	<b>Total effect</b>	-0.13 (-0.27, 0.003)	0.05	-0.12 (-0.25, 0.01)	0.08	-0.11 (-0.25, 0.03)	0.12
	<b>Direct effect</b>	-0.04 (-0.16, 0.07)	0.47	-0.05 (-0.16, 0.07)	0.41	-0.04 (-0.16, 0.07)	0.46
	<b>Indirect effect</b>	-0.09 (-0.16, -0.02)		-0.07 (-0.14, 0.01)		-0.07 (-0.14, 0.01)	

The p-values of the interaction term between symptom experience and illness perception ranged from 0.13 to 0.98. Abbreviations: CI, confidence interval; DSI, the dialysis symptom index questionnaire; HRQOL, health-related quality of life; MCS, mental component scale; PCS, mental component scale; RR, risk ratio; SD, standard deviation.

<sup>a</sup>The adjusted variables include age, sex, SES, primary kidney disease, and donor type.

<sup>b</sup>The adjusted variables include age, sex, SES, primary kidney disease donor type, and comorbidities.

<sup>c</sup>The total effect is the sum of the direct and indirect effects.

**Table S4.** Impact of symptom burden (based on the remaining symptoms) at T0 on HRQOL at T1, and the mediation effect of illness perceptions (n=90).

	Estimates	Crude $\beta$ (95%CI)	P-value	Adjusted $\beta$ (95%CI) <sup>a</sup>	P-value	Adjusted $\beta$ (95%CI) <sup>b</sup>	P-value
<b>Number of symptoms and HRQOL</b>							
<b>PCS</b>	<b>Total effect<sup>c</sup></b>	-0.35 (-0.71, 0.01)	0.06	-0.32 (-0.71, 0.06)	0.10	-0.30 (-0.70, 0.11)	0.15
	<b>Direct effect</b>	-0.21 (-0.57, 0.14)	0.24	-0.20 (-0.57, 0.17)	0.30	-0.19 (-0.57, 0.20)	0.34
	<b>Indirect effect</b>	-0.14 (-0.27, -0.01)		-0.12 (-0.27, 0.02)		-0.11 (-0.26, 0.04)	
<b>MCS</b>	<b>Total effect</b>	-0.38 (-0.81, 0.04)	0.08	-0.40 (-0.83, 0.02)	0.06	-0.38 (-0.82, 0.07)	0.10
	<b>Direct effect</b>	-0.09 (-0.44, 0.27)	0.64	-0.19 (-0.55, 0.18)	0.31	-0.18 (-0.56, 0.19)	0.34
	<b>Indirect effect</b>	-0.30 (-0.54, -0.06)		-0.22 (-0.47, 0.04)		-0.2 (-0.46, 0.07)	
<b>Symptom burden and HRQOL</b>							
<b>PCS</b>	<b>Total effect</b>	-0.13 (-0.28, 0.03)	0.12	-0.12 (-0.28, 0.05)	0.17	-0.11 (-0.28, 0.06)	0.21
	<b>Direct effect</b>	-0.07 (-0.22, 0.09)	0.40	-0.06 (-0.22, 0.09)	0.43	-0.06 (-0.22, 0.10)	0.46
	<b>Indirect effect</b>	-0.06 (-0.11, 0.004)		-0.05 (-0.11, 0.01)		-0.05 (-0.11, 0.02)	
<b>MCS</b>	<b>Total effect</b>	-0.13 (-0.32, 0.05)	0.16	-0.13 (-0.32, 0.06)	0.17	-0.12 (-0.31, 0.07)	0.23
	<b>Direct effect</b>	-0.01 (-0.17, 0.15)	0.90	-0.04 (-0.20, 0.12)	0.62	-0.03 (-0.20, 0.13)	0.68
	<b>Indirect effect</b>	-0.12 (-0.22, -0.02)		-0.09 (-0.2, 0.02)		-0.08 (-0.20, 0.03)	

The p-values of the interaction term between symptom experience and illness perception ranged from 0.13 to 0.98. Abbreviations: CI, confidence interval; HRQOL, health-related quality of life; MCS, mental component scale; PCS, mental component scale; RR, risk ratio; SD, standard deviation.

<sup>a</sup>The adjusted variables include age, sex, SES, primary kidney disease, and donor type.

<sup>b</sup>The adjusted variables include age, sex, SES, primary kidney disease donor type, and comorbidities.

<sup>c</sup>The total effect is the sum of the direct and indirect effects.