

Supplemental Table S1 Assessment and coding of care indicators in diabetes for main analyses

Indicator	Question	Coding	Time frame
Diabetes education (ever)	Have you ever taken part in a diabetes education program?"	Yes No	Ever
Diet plan (currently)	Do you currently have a diet plan due to your diabetes disease?"	Yes No	Currently
Diabetes diary (currently)	"Do you currently keep a diabetes diary?"	Yes No	Currently
Diabetes health passport (ever)	Have you ever held a personal diabetes passport?"	Yes No	Ever
Blood glucose self-control (generally)*	"Do you - or your relatives- check your blood glucose with a glucose meter?"	Yes No	Generally
Foot self-examination (at least once a month)**	"How often do you examine your feet at pressure points or open wounds?"	Yes: At least once a month No: Not at least once a month	At least once a month
HbA1c measurement (\leq 12 months)***	"How many times in the past 12 months did you have your HbA1c level examined?"	Yes: At least once in the past 12 months No: Not at least once in the past 12 months	Past 12 months
Eye examination (\leq 12 months)	How many times in the past 12 months did you have your ocular fundus examined by an ophthalmologist	Yes: At least once in the past 12 months	Past 12 months

	(with dilating drops of the pupil)?"	No: Not at least once in the past 12 months	
Foot examination (≤ 12 months)	"How many times in the past 12 months did you have your feet examined by a physician or medical professionals?"	Yes: At least once in the past 12 months No: Not at least once in the past 12 months	Past 12 months
Acute hypoglycemia**** (≤ 12 months)	"Have you had acute low blood sugar in the past 12 months?"	Yes No	Past 12 months
Acute hyperglycemia**** (≤ 12 months)	"Have you had acute high blood sugar in the past 12 months?"	Yes No	Past 12 months
Long-term complications (ever)	"The following is about complications which may occur in diabetes. Do you have or have you ever had... ... diabetes-specific kidney disease? ... dialysis due to diabetes-specific kidney disease? ... kidney transplant due to diabetes? ... diabetes-specific eye disease? ... diabetes-specific blindness? ... diabetes-specific neuropathy? ... diabetic foot? ... amputation due to diabetes?"	Yes: At least one complication No: Not at least one complication	Ever

* for sensitivity analyses: „Yes“ only if the subsequent question „How often do you control your blood sugar?“ was answered with

„daily“, otherwise „not daily“

*** for sensitivity analyses: „Yes“ only if participants answered „daily“, otherwise „not daily“*

**** for sensitivity analyses: Yes only if participants answered four or more measurements in the past 12 months*

***** for sensitivity analyses: „Yes“ only if the subsequent question „Has such low blood sugar/high blood sugar led to treatment by a physician, e.g. hospital stay, emergency healthcare or use of medical service?“ was answered with „yes“, otherwise „no“*

Supplemental Table S2 Association of depressive symptoms in the past two weeks with care indicators, estimated by logistic regression models (odds ratios with 95% confidence intervals)

Indicator	Model	Odds Ratio (95% CI)	P value
Diabetes education (ever)	1	1.02 (0.73-1.43)	0.912
	2	1.08 (0.76-1.51)	0.676
	3	1.07 (0.76-1.51)	0.693
	4	1.04 (0.72-1.51)	0.818
Diet plan (currently)	1	2.29 (1.53-3.42)	< 0.001
	2	2.14 (1.41-3.24)	< 0.001
	3	2.17 (1.41-3.32)	< 0.001
	4	2.14 (1.39-3.29)	0.001
Diabetes diary (currently)	1	1.07 (0.78-1.46)	0.691
	2	1.11 (0.80-1.54)	0.524
	3	1.11 (0.79-1.55)	0.557
	4	1.07 (0.76-1.51)	0.702
Diabetes passport (ever)	1	0.87 (0.64-1.19)	0.390
	2	0.90 (0.66-1.22)	0.496
	3	0.94 (0.68-1.29)	0.696
	4	0.90 (0.66-1.24)	0.535

Indicator	Model	Odds Ratio (95% CI)	P value
Blood glucose self-control (generally)	1	1.39 (0.98-1.98)	0.067
	2	1.39 (0.97-2.01)	0.076
	3	1.46 (0.99-2.14)	0.054
	4	1.43 (0.97-2.12)	0.074
Foot self-examination (at least once a month)	1	1.12 (0.79-1.58)	0.536
	2	1.16 (0.81-1.66)	0.414
	3	1.18 (0.82-1.70)	0.367
	4	1.16 (0.81-1.68)	0.415
HbA1c measurement (\leq 12 months)	1	0.73 (0.45-1.19)	0.208
	2	0.77 (0.46-1.31)	0.334
	3	0.77 (0.45-1.31)	0.334
	4	0.75 (0.44-1.28)	0.285
Eye examination (\leq 12 months)	1	0.62 (0.42-0.90)	0.012
	2	0.69 (0.47-1.02)	0.063
	3	0.76 (0.51-1.13)	0.172
	4	0.72 (0.48-1.08)	0.117
Foot examination (\leq 12 months)	1	0.93 (0.66-1.31)	0.678

Indicator	Model	Odds Ratio (95% CI)	P value
	2	0.99 (0.69-1.42)	0.950
	3	0.98 (0.68-1.42)	0.917
	4	0.96 (0.66-1.39)	0.828
Acute hypoglycemia (\leq 12 months)	1	1.87 (1.25-2.79)	0.002
	2	1.73 (1.14-2.63)	0.010
	3	1.81 (1.18-2.76)	0.006
	4	1.81 (1.13-2.88)	0.013
Acute hyperglycemia (\leq 12 months)	1	2.30 (1.46-3.61)	< 0.001
	2	2.19 (1.40-3.43)	0.001
	3	2.15 (1.38-3.36)	0.001
	4	2.10 (1.30-3.37)	0.002
Long-term complications (ever)	1	2.46 (1.72-3.54)	< 0.001
	2	2.33 (1.61-3.35)	< 0.001
	3	2.27 (1.57-3.29)	< 0.001
	4	2.30 (1.55-3.39)	< 0.001

Model 1: adjusted for age and sex,

Model 2: adjusted additionally for educational level and social support,

Model 3: adjusted additionally for smoking, alcohol consumption, physical activity and obesity,

Model 4: adjusted additionally for diabetes duration

Supplemental Table S3 Distribution of type-specific long-term complications by no and with depressive symptoms in the past two weeks and association of depressive symptoms with type-specific long-term complications, estimated by logistic regression models (odds ratios with 95% confidence intervals, model 4)

Indicator	No depressive symptoms % (95% CI)	Depressive symptoms % (95% CI)	P value	Odds Ratio (95% CI)	P value
Diabetic nephropathy	5.5 (4.0-6.9)	12.0 (7.1-16.9)	0.001	2.33 (1.34-4.05)	0.003
Diabetic retinopathy	8.9 (6.9-10.9)	21.6 (14.5-28.7)	< 0.001	2.80 (1.72-4.56)	< 0.001
Diabetic neuropathy	7.2 (5.5-8.9)	15.9 (10.0-21.7)	< 0.001	2.31 (1.39-3.84)	0.001
Diabetic foot/amputation	7.4 (5.7-9.2)	16.2 (11.0-21.4)	< 0.001	2.29 (1.41-3.71)	0.001

Model 4: adjusted for age, sex, educational level, social support, smoking, alcohol consumption, physical activity, obesity and diabetes duration

Supplemental Table S4 Distribution of modified hypoglycemia, hyperglycemia, blood glucose self-control and foot self-examination by no and with depressive symptoms in the past two weeks and association of depressive symptoms with modified hypoglycemia, hyperglycemia, blood glucose self-control and foot self-examination, estimated by logistic regression models (odds ratios with 95% confidence intervals, model 4)

Indicator	No depressive symptoms % (95% CI)	Depressive symptoms % (95% CI)	P value	Odds Ratio (95% CI)	P value
Hypoglycemia with medical treatment	2.2 (1.3-3.0)	5.2 (1.7-8.7)	0.026	2.29 (1.07-4.94)	0.034
Hyperglycemia with medical treatment	3.2 (1.9-4.5)	8.3 (4.2-12.3)	0.005	2.84 (1.39-5.77)	0.004
Blood glucose self-control daily	28.2 (25.3-31.1)	37.5 (29.9-45.1)	0.022	1.53 (0.99-2.38)	0.057
Foot self-examination daily	22.0 (19.4-24.6)	27.2 (20.8-33.6)	0.127	1.39 (0.96-2.00)	0.081

Model 4: adjusted for age, sex, educational level, social support, smoking, alcohol consumption, physical activity, obesity and diabetes duration

Supplemental Table S5 Distribution of care indicators by moderate and severe depressive symptoms* and association of moderate (10-14) and severe (≥ 15) depressive symptoms in the past two weeks with care indicators, estimated by logistic regression models (odds ratios with 95% confidence intervals, model 4)

Indicator	Depressive symptoms	Indicator % (95% CI)	P value	Odds Ratio (95% CI)	P value
<u>Self-management:</u>					
Diabetes education (ever)	Moderate	63.4 (55.0-71.9)	0.674	1.07 (0.70-1.62)	0.760
	Severe	60.1 (47.2-73.0)	0.831	1.00 (0.55-1.83)	0.999
Diet plan (currently)	Moderate	20.0 (12.9-27.1)	0.017	1.66 (0.99-2.81)	0.057
	Severe	33.1 (20.2-45.9)	<.001	3.35 (1.81-6.20)	< 0.001
Diabetes diary (currently)	Moderate	36.6 (28.3-44.9)	0.832	1.01 (0.66-1.54)	0.961
	Severe	39.0 (26.7-51.3)	0.581	1.20 (0.68-2.14)	0.530
Diabetes passport (ever)	Moderate	45.8 (36.9-54.7)	0.704	0.90 (0.61-1.33)	0.601
	Severe	44.0 (31.9-56.1)	0.568	0.91 (0.56-1.49)	0.703
<u>Self-monitoring:</u>					

Blood glucose self-control (generally)	Moderate	70.0 (62.3-77.6)	0.255	1.24 (0.80-1.91)	0.334
	Severe	76.6 (64.8-88.5)	0.097	1.97 (0.91-4.24)	0.083
Foot self-examination (at least once a month)	Moderate	65.7 (57.0-74.3)	0.342	0.89 (0.58-1.35)	0.573
	Severe	81.0 (71.1-90.9)	0.073	2.26 (1.12-4.57)	0.024
<i><u>Medical care:</u></i>					
HbA1c measurement (\leq 12 months)	Moderate	86.2 (79.4-92.9)	0.333	0.76 (0.42-1.38)	0.373
	Severe	84.5 (75.2-93.8)	0.268	0.72 (0.30-1.69)	0.444
Eye examination (\leq 12 months)	Moderate	66.3 (58.1-74.5)	0.009	0.65 (0.41-1.04)	0.075
	Severe	67.9 (55.9-79.9)	0.094	0.90 (0.49-1.63)	0.717
Foot examination (\leq 12 months)	Moderate	61.8 (53.3-70.3)	0.758	0.93 (0.60-1.44)	0.747
	Severe	62.2 (49.4-75.1)	0.871	1.02 (0.56-1.87)	0.941
<i><u>Outcomes:</u></i>					
Acute hypoglycemia (\leq 12 months)	Moderate	24.7 (16.5-32.8)	0.004	1.92 (1.12-3.30)	0.018
	Severe	21.5 (10.5-32.4)	0.140	1.58 (0.69-3.62)	0.284
Acute hyperglycemia (\leq 12 months)	Moderate	19.9 (13.2-26.6)	0.004	1.88 (1.13-3.12)	0.015
	Severe	25.7 (14.4-37.0)	0.002	2.59 (1.26-5.32)	0.009

Long-term complications (ever)	Moderate	31.8 (23.2-40.5)	0.001	2.09 (1.33-3.29)	0.001
	Severe	38.2 (25.5-50.9)	< 0.001	2.75 (1.49-5.10)	0.001

* Depressive symptoms defined as moderate (PHQ-8 sum score 10-14) and severe (PHQ-8 sum score ≥ 15)

Model 4: adjusted for age, sex, educational level, social support, smoking, alcohol consumption, physical activity, obesity and diabetes duration