Supplementary material: Summary of findings; diabetes distress

			Certainty a	assessment			Nº of p	patients	Effec	t		Importance
№ of studies	Study design	Risk of bias	Inconsistency	Indirectness	Imprecision	Other considerations	psychosocial interventions	standard care	Relative (95% CI)	Absolute (95% Cl)	. Certainty	Importance
Diabetes dist	ress at 3, 6, 12 and	d 24 months follow-up	o - Diabetes Distress a	at 3 months follow-up								
7	randomised trials	not serious ^a	not serious	serious	serious ^d	none	389	349	-	SMD 0.18 lower (0.32 lower to 0.03 lower)		
Diabetes dist	ress at 6, 12 and 2	4 months follow-up -	Diabetes distress at 6	6 months								
8	randomised trials	serious ª	not serious	not serious	not serious	none	620	613	-	SMD 0.19 lower (0.31 lower to 0.07 lower)		
Diabetes dist	ress at 6, 12 and 2	4 months follow-up -	Diabetes distress at 1	2 months								
6	randomised trials	serious ^b	not serious	not serious	not serious	none	791	411	-	SMD 0.22 lower (0.39 lower to 0.04 lower)		
Diabetes distress at 6, 12 and 24 months follow-up - Diabetes distress at 24 months follow-up												
2	randomised trials	very serious °	not serious	not serious	not serious	none	306	357	-	SMD 0.21 lower (0.36 lower to 0.05 lower)		

CI: Confidence interval; MD: Mean difference; SMD: Standardised mean difference

Explanations

a. Due to high risk and unclear ratings on selective reporting

b. Many unclear ratings and high risk on blinded outcome assessor and selective reporting.

c. In the study of Gabbay et al (2013) patients in the intervention group that for some reason did not receive the intervention, were added to the control group and due to high risk of attrition bias.

d. In all, but one study (Beverly et al 2013), the upper and lower Ci crosses an effect size of 0.5

Supplementary material: Summary of findings; HbA1c

			Certainty a	issessment			№ of p	patients	Effec	t	0.111	
№ of studies	Study design	Risk of bias	Inconsistency	Indirectness	Imprecision	Other considerations	psychosocial interventions	standard care	Relative (95% Cl)	Absolute (95% Cl)	Certainty	ітропапсе
HbA1c at 3, 6	5, 12 and 24 month	s follow-up - HbA1c a	at 3 months follow-up		·				·	·		
6	randomised trials	not serious	not serious	serious	serious a	none	345	317	-	MD 0.17 lower (0.41 lower to 0.06 higher)	⊕⊕⊖⊖ Low	
HbA1c at 6, 1	12 and 24 months t	follow-up - HbA1c at 6	6 months follow-up									
9	randomised trials	serious ^b	serious °	not serious	serious a	none	848	823	-	MD 0.27 lower (0.6 lower to 0.06 higher)		
HbA1c at 6, 1	I2 and 24 months t	follow-up - HbA1c at ′	12 months follow-up	•	•	•	•	•	•			
7	randomised trials	not serious ^d	not serious	not serious	serious °	none	977	604		MD 0.02 higher (0.17 lower to 0.22 higher)		
HbA1c at 6, 1	A1c at 6, 12 and 24 months follow-up - HbA1c at 24 months follow-up											
2	randomised trials	very serious f	not serious	not serious	not serious	none	310	359	-	MD 0.23 lower (0.5 lower to 0.04 higher)		

CI: Confidence interval; MD: Mean difference; SMD: Standardised mean difference

Explanations

a. In all included studies, the upper or lower CI crosses an effect size of 0.5.

b. Due to high risk and unclear ratings on selective reporting

c. High heterogeneity of 79%, which the authors judged were primarily caused by diversity of interventions and CIs not overlapping

d. Many unclear ratings and high risk on blinded outcome assessor and selective reporting.

e. Due to low sample size in studies by D'eramo 2010 and McEwen 2017 and consequently wide CIs

f. In the study of Gabbay et al (2013) patients in the intervention group that for some reason did not receive the intervention, were added to the control group and due to high risk of attrition bias.

Supplementary material: Subgroup analyses: Diabetes distress

Figure 3a: Subgroup	analysis 1) Effect of brief ($(\leq 4 \text{ sessions})$	versus Intensive ((>4 sessions)	on DD at longest follow-u	ıр
						-	

	Inte	rventio	on	Stan	dard c	are		Std. Mean Difference	Std. Mean Difference	Risk of Bias
Study or Subgroup	Mean	SD	Total	Mean	SD	Total	Weight	IV, Fixed, 95% CI	IV, Fixed, 95% CI	ABCDEFG
6.2.1 Brief interventio	ns <4 se	ssions	5							
Beverly 2013 (1)	25	16	58	25.7	22.7	63	4.4%	-0.04 [-0.39, 0.32]	+	••••••
Heisler, 2014 (2)	23	28.3	87	30	26.5	89	6.3%	-0.25 [-0.55, 0.04]		
Sperl-Hillen 2013 (3)	23.3	13.2	489	25.7	13.3	134	15.2%	-0.18 [-0.37, 0.01]		
Subtotal (95% CI)			634			286	25.8%	-0.17 [-0.32, -0.03]	•	
Heterogeneity: Chi ² = (D.87,df=	2 (P =	0.65); I	²=0%						
Test for overall effect: 2	Z = 2.33 (P = 0.0	02)							
6.2.2 Intensive interve	entions >	4 sess	ions							
Anderson 2009	20.2	18.9	118	22.9	19.9	124	8.7%	-0.14 (-0.39, 0.11)		•••??•??
D'Eramo 2010 (4)	38	16.6	40	47	16.6	37	2.7%	-0.54 [-0.99, -0.08]		• ? • ? • • •
Gabbay 2013	23	21	188	29	27	233	14.9%	-0.24 [-0.44, -0.05]		
Hermanns 2011	49.1	9.7	85	48	11.2	82	6.0%	0.10 [-0.20, 0.41]	_ 	
Ing 2016 (5)	29.3	20.7	22	26.2	27.5	12	1.1%	0.13 [-0.57, 0.83]		?? 🗣 ? 🖨 ? 🖨
Kleinman 2017 (6)	8.2	3.1	41	9.3	5	39	2.9%	-0.26 [-0.70, 0.18]		
McEwen 2017	9.9	7	56	10.2	6.6	50	3.8%	-0.04 [-0.43, 0.34]	_	???????
McMahon 2012 (7)	19.2	18.5	51	19.5	14.8	49	3.6%	-0.02 [-0.41, 0.37]		•••?•?
Spencer 2011 (8)	8.7	13.8	56	12.9	20.3	74	4.6%	-0.23 [-0.58, 0.11]	++	?? 🗣 🗣 ? 🗣
Trief, 2016 (9)	1.7	1	97	2.2	1	78	6.1%	-0.50 [-0.80, -0.20]		
Wagner 2016 (10)	6.3	6	61	7.4	6.7	46	3.8%	-0.17 [-0.56, 0.21]		•••?••
Welch 2015 (11)	40.4	29.6	199	48.3	28.3	200	14.3%	-0.27 [-0.47, -0.08]		?? 🗣 ? 🗣 🥐 ?
Whittemore 2004	46.9	23	25	42.9	19	24	1.8%	0.19 [-0.38, 0.75]		?????
Subtotal (95% CI)			1039			1048	74.2%	-0.20 [-0.29, -0.11]	•	
Heterogeneity: Chi ² = 1	14.91, df:	= 12 (F	P = 0.25	i); I² = 21	0%					
Test for overall effect: 2	Z = 4.52 (P < 0.0	00001)							
Total (95% CI)			1673			1334	100.0%	-0.19 [-0.27, -0.12]	•	
Heterogeneity: Chi ² = 1	15.86, df:	= 15 (F	e = 0.39	l); l² = 5'	%					<u> </u>
Test for overall effect: 2	Z = 5.08 (P < 0.0	00001)						-2 -1 U I Eavoure [intervention] Eavoure [Standar	d carel
Test for subgroup diffe	erences: (Chi²=	0.08, dt	f= 1 (P =	= 0.77)	, I² = 09	6		Tavours [intervention] Tavours [Standar	ucarej
Footnotes									Risk of bias legend	
(1) 12 months follow-u	ıp								(A) Random sequence generation (selecti	on bias)
(2) At 3 months FU. Me	eans con	verted	from so	cale with	n range	e 0-100	with positi	tive outcomes reflecting	g.(B) Allocation concealment (selection bias)
(3) Means+SDs from (Cochrane	e reviev	v (Chev	v et al. 2	2017)				(C) Blinding of participants and personnel	(performance bias)
(4) Mean + SD from Co	ochrane r	review	(Chew	et al. 20)17).				(D) Blinding of outcome assessment (dete	ction bias)
(5) Means from baseli	ne subtra	acted v	vithin gi	roup diff	erence	e at 3 m	onths FU	. SD from baseline	(E) Incomplete outcome data (attrition bias)
(6) Missing data on 6 i	months fo	ollw-up	on PA	ID					(F) Selective reporting (reporting bias)	
(7) Online care (interve	ention) ve	rsus v	veb trai	ning (co	ntrol)				(G) Other bias	
(8) SDs calculated from	m CIs us	ing Re	vman 5	.3						
(9) Measured with DD	S									
(10) 3 months follow-u	ıp									
(11) SDs calculated fro	om SEs u	using F	RevMan	5.3						

Figu	e 3b:	Individual	versus	group	interventions	on DD	at long	gest follo	ow-up
-				_					-

	Expe	erimen	tal	С	ontrol		Std. Mean Difference	Std. Mean Difference	Risk of Bias					
Study or Subgroup	Mean	SD	Total	Mean	SD	Total	Weight	IV, Random, 95% CI	IV, Random, 95% CI	ABCDEFG				
5.1.1 Individual interve	entions of	on DD												
Anderson 2009	20.2	18.9	118	22.9	19.9	124	8.8%	-0.14 [-0.39, 0.11]	-+-	•••??•??				
Gabbay 2013	23	21	188	29	27	233	14.2%	-0.24 [-0.44, -0.05]						
Heisler, 2014 (1)	23	28.3	87	30	26.5	89	6.5%	-0.25 [-0.55, 0.04]						
Trief, 2016 (2)	1.7	1	97	2.2	1	78	6.2%	-0.50 [-0.80, -0.20]	_ —					
Welch 2015 (3)	40.4	29.6	199	48.3	28.3	200	13.7%	-0.27 [-0.47, -0.08]		?? 🛨 ? 🛨 🔁 ?				
Whittemore 2004 (4)	46.9	23	25	42.9	19	24	1.9%	0.19 [-0.38, 0.75]		??????				
Subtotal (95% CI)			714			748	51.2%	-0.25 [-0.36, -0.14]	•					
Heterogeneity: Tau ² = 0.00; Chi ² = 5.70, df = 5 (P = 0.34); l ² = 12%														
Test for overall effect: Z = 4.35 (P < 0.0001)														
54.2 Group interventions														
5.1.2 Group intervention	ons													
Beverly 2013	25	16	58	25.7	22.7	63	4.6%	-0.04 [-0.39, 0.32]	-+-					
D'Eramo 2010	38	16.6	40	47	16.6	37	2.8%	-0.54 [-0.99, -0.08]		•?•?••				
Hermanns 2011	49.1	9.7	85	48	11.2	82	6.2%	0.10 [-0.20, 0.41]	-+					
Ing 2016	29.3	20.7	22	26.2	27.5	12	1.2%	0.13 [-0.57, 0.83]		2282928				
Kleinman 2017	8.2	3.1	41	9.3	5	39	3.0%	-0.26 [-0.70, 0.18]						
McEwen 2017 (5)	9.9	7	56	10.2	6.6	50	4.0%	-0.04 [-0.43, 0.34]		2222020				
McMahon 2012 (6)	19.2	18.5	51	19.5	14.8	49	3.8%	-0.02 [-0.41, 0.37]						
Spencer 2011	8.7	13.8	56	12.9	20.3	74	4.8%	-0.23 [-0.58, 0.11]		??				
Sperl-Hillen 2013	23.3	13.2	489	25.7	13.3	134	14.4%	-0.18 [-0.37, 0.01]						
Wagner 2016 (7)	6.3	6	61	7.4	6.7	46	4.0%	-0.17 [-0.56, 0.21]		•••?••?•				
Subtotal (95% CI)			959			586	48.8%	-0.13 [-0.24, -0.02]	•					
Heterogeneity: Tau ² = I	0.00; Ch	i² = 7.6	9, df = !	9 (P = 0	.57); I²	= 0%								
Test for overall effect: 2	Z = 2.38 ((P = 0.0	02)											
Total (05% CI)			4072			4224	400.0%	0 40 50 27 0 441	•					
Total (95% CI)			10/3			1554	100.0%	-0.19[-0.27, -0.11]	· · ·					
Heterogeneity: auf =	0.00; Ch	r=15.	86, df =	: 15 (P =	= 0.39)	; if = 5%	80		-2 -1 0 1	2				
lest for overall effect: 4	2 = 4.83	(P < U.U	JUUU1)					F	Favours [experimental] Favours [control]					
lest for subgroup diffe	rences:	Chi+=	2.24, a	r=1 (Ρ	= 0.13), if = 5	5.4%							
Footnotes									Risk of blas legend					
(1) At 3 months FU. Me	eans con	verted	from s	cale wit	h rang	e 0-100) with pos	itive outcomes reflectin	Ig(A) Random sequence generation (selec	tion bias)				
(2) Measured with DDS	5								(B) Allocation concealment (selection bia	(S)				
(3) SDs calculated from	n SE USI	Ing Rev	/man 5	.3					(C) Blinding of participants and personne	I (performance blas)				
(4) Significant different	ce at bas	eline; i	PAID 5	9.9 Intel	ventio	n group	o versus 4	2.3 in the control group	. (D) Blinding of outcome assessment (de	tection blas)				
(5) Measured with DD	s at 9 m	onths F	0						(E) Incomplete outcome data (attrition bia	is)				
(b) Unline care (interve	endon) ve	ersus v	ved trai	ning (co	ontrol)				(F) Selective reporting (reporting blas)					
(7) 3 months FU									(G) Other blas					

Figure 3c: Motivational interviewing versus standard care on DD at longest follow-up

	Motivation	al intervie	wing	Enhanced	standard	care	:	Std. Mean Difference	Std. Mean Difference	Risk of Bias		
Study or Subgroup	Mean	SD	Total	Mean	SD	Total	Weight	IV, Random, 95% CI	IV, Random, 95% CI	ABCDEFG		
Gabbay 2013 (1)	23	21	188	29	27	233	57.8%	-0.24 [-0.44, -0.05]	-8-			
Heisler, 2014 (2)	23	28.3	87	30	26.5	89	24.4%	-0.25 [-0.55, 0.04]				
Spencer 2011 (3)	8.7	13.8	56	12.9	20.3	74	17.7%	-0.23 [-0.58, 0.11]		?? • • • ? •		
Total (95% Cl) 331 396 100.0% -0.25 [-0.39, -0.10] ◆												
Test for overall effect:	Z = 3.28 (P =	0.001)		-,,,					-2 -1 0 1 Favours [MI] Favours [Enh. St	2 id. care]		
Footnotes									Risk of bias legend			
(1) Intensive intervention at 24 months follow-up (A) Random sequence generation (selection bias)												
(2) At 3 months EU_M	leans convert	ed from s	cale with	range 0-100) with posi	itive outc	omes refle	ecting a higher number	(B) Allocation concealment (selection	(bias)		

th p nge (3) Intensive intervention at 12 months follow-up

.(B) Allocation concealment (selection bias) (C) Blinding of participants and personnel (performance bias) (D) Blinding of outcome assessment (detection bias) (E) Incomplete outcome data (attrition bias) (F) Selective reporting (reporting bias) (G) Other bias

Figure 4a) Effect of brief (<4 sessions) versus Intensive (>4 sessions) on HbA1c at longest follow-up

Intervention				Standard care				Mean Difference	Mean Difference	Risk of Bias		
Study or Subgroup	Mean	SD	Total	Mean	SD	Total	Weight	IV, Random, 95% CI	IV, Random, 95% CI	ABCDEFG		
6.1.1 Brief intervention	ns <4 se	ssions	;									
Beverly 2013 (1)	8.54	1.4	58	8.1	1	63	6.3%	0.44 [0.00, 0.88]	⊢	•••••		
Heisler, 2014 (2)	7.8	1.7	87	7.9	1.9	89	5.5%	-0.10 [-0.63, 0.43]				
Sperl-Hillen 2013 (3)	7.8	1.2	489	7.7	1.2	134	8.3%	0.10 [-0.13, 0.33]	- -			
Tang 2013 (4)	8.1	1.7	186	8.3	1.8	193	7.1%	-0.20 [-0.55, 0.15]				
Welch 2011a (5)	8.6	1.35	90	8.1	1.29	94	6.9%	0.50 [0.12, 0.88]		?? 🗣 ? 🗣 🗬 🗬		
Subtotal (95% CI)			910			573	34.1%	0.15 [-0.11, 0.40]	★			
Heterogeneity: Tau ² = I	0.05; Chi	= 9.6	9, df = 4	4 (P = 0.	.05); I ^z :	= 59%						
Test for overall effect: 2	Z = 1.12 (P = 0.2	26)									
6.1.2 Intensive interve	ntions >	4 sess	ions									
Anderson 2009	7.62	1.8	122	7.91	2.03	126	5.9%	-0.29 [-0.77, 0.19]	_	••??•??		
D'Eramo 2010	7.2	2.2	40	8	2.4	37	2.5%	-0.80 [-1.83, 0.23]				
Gabbay 2013	7.8	1.7	188	8	1.8	233	7.3%	-0.20 [-0.54, 0.14]	_ _			
Hermanns 2011	7.9	1.2	85	7.8	1.5	82	6.6%	0.10 (-0.31, 0.51)		.		
lna 2016 (6)	9.3	1.8	22	9.4	2.7	12	1.1%	-0.10[-1.80, 1.60]		??		
Kleinman 2017	7.9	1.1	44	8.2	1.5	46	5.4%	-0.30 [-0.84, 0.24]				
McEwen 2017 (7)	9.2	2.1	56	9.2	2	50	3.7%	0.00 (-0.78, 0.78)		????		
McMahon 2012 (8)	8.3	1.1	51	8.4	1.7	49	5.2%	-0.10 [-0.66, 0.46]				
Spencer 2011 (9)	7.8	1.9	56	8.5	2.3	57	3.7%	-0.70 [-1.48, 0.08]		?? • • • ? •		
Trief, 2016	8.5	1.5	97	8.5	1.4	78	6.4%	0.00 [-0.43, 0.43]				
Wagner 2016 (10)	8.6	1.9	70	8.4	1.6	68	5.0%	0.20 [-0.39, 0.79]		••?••?•		
Welch 2015 (11)	8.4	1.4	200	9.2	1.4	199	7.9%	-0.80 [-1.07, -0.53]	_	?? 🗣 ? 🖶 🗬 ?		
Whittemore 2004	7.5	1	25	7.5	1	24	5.2%	0.00 [-0.56, 0.56]		????? 🗣 ? 🖶		
Subtotal (95% CI)			1056			1061	65.9%	-0.23 [-0.44, -0.01]	◆			
Heterogeneity: Tau ² =	0.07; Chi	* = 25.4	42, df=	: 12 (P =	: 0.01);	I² = 53	%					
Test for overall effect: 2	Z = 2.06 (P = 0.0)4)									
Total (95% CI)			1966			1634	100.0%	-0.10 [-0.29, 0.10]	•			
Heterogeneity: Tau ² = I	0.10; Chi	² = 51.3	36, df=	: 17 (P «	0.000	1); I ^z =	67%					
Test for overall effect: 2	Z = 0.99 (P = 0.3	32)						-2 -1 U 1 Eavoure [intervention] Eavoure [standard.	2		
Test for subgroup diffe	rences:	Chi² = 4	4.77, di	f=1(P:	= 0.03)	, I ² = 79	9.1%		Favours [intervention] Favours [standard	calej		
Footnotes									Risk of bias legend			
(1) Means + SDs from	Cochran	e revie	w (Che	ew et al.	2017)				(A) Random sequence generation (selection	n bias)		
(2) 3 months follow-up)								(B) Allocation concealment (selection bias)			
(3) Missing data from a	author. M	eans +	-SDs fr	om Coo	hrane:	review	(Chew et	al. 2017)	(C) Blinding of participants and personnel (p	erformance bias)		
(4) At 12 months follow	v-up								(D) Blinding of outcome assessment (detect	ion bias)		
(5) Within group differe	ences su	bstract	ed fron	n baseli	ine me	ans. Sl	Ds from n	nean within group	(E) Incomplete outcome data (attrition bias)			
(6) Means from baseli	ne subtra	acted w	ithin g	roup dif	ference	at 3 m	nonths FU	. SD from baseline	(F) Selective reporting (reporting bias)			
(7) At 9 months follow-	up								(G) Other bias			
(8) Online care (interve	ention) ve	rsus w	/eb trai	ning (co	ontrol)							
(9) SD calculated from Cl using Revman 5.3												
(10) At 3 months FU												
(11) SDs calculated fro	om SE us	sing Re	evman	5.3								

Figure 4b) Individual	versus	group	interventions	on HbA1c at	longest follow-up

	Expe	erimen	tal	C	ontrol			Mean Difference	Mean Difference	Risk of Bias				
Study or Subgroup	Mean	SD	Total	Mean	SD	Total	Weight	IV, Random, 95% CI	IV, Random, 95% CI	ABCDEFG				
5.2.1 Individual interver	ntions													
Anderson 2009	7.62	1.8	122	7.91	2.03	126	5.9%	-0.29 [-0.77, 0.19]	-++	••??•??				
Gabbay 2013	7.8	1.7	188	8	1.8	233	7.3%	-0.20 [-0.54, 0.14]	-++	••?••				
Heisler, 2014 (1)	7.8	1.7	87	7.9	1.9	89	5.5%	-0.10 [-0.63, 0.43]						
Tang 2013	8.1	1.68	186	8.3	1.81	193	7.2%	-0.20 [-0.55, 0.15]	-++					
Trief, 2016 (2)	8.5	1.5	97	8.5	1.4	78	6.4%	0.00 [-0.43, 0.43]	_					
Welch 2011a (3)	8.6	1.35	90	8.1	1.29	94	6.9%	0.50 [0.12, 0.88]	_ _	??•?•				
Welch 2015 (4)	8.4	1.4	200	9.2	1.4	199	7.9%	-0.80 [-1.07, -0.53]		?? 🗣 ? 🗣 🗬 ?				
Whittemore 2004 (5)	7.5	1	25	7.5	1	24	5.2%	0.00 [-0.56, 0.56]		????? 🗣 ? 🛑				
Subtotal (95% CI)			995			1036	52.2%	-0.15 [-0.45, 0.15]	◆					
Heterogeneity: Tau ² = 0.	15; Chi²	= 32.61	7, df = 1	7 (P < 0.	0001)	; I² = 79	%							
Test for overall effect: Z = 0.96 (P = 0.34)														
5.2.2 Group intervention	ns													
Beverly 2013 (6)	8.54	1.4	58	8.1	1	63	6.3%	0.44 [0.00, 0.88]		••••				
D'Eramo 2010	7.2	2.2	40	8	2.4	37	2.5%	-0.80 [-1.83, 0.23]		• ? • ? • •				
Hermanns 2011	7.9	1.2	85	7.8	1.5	82	6.6%	0.10 [-0.31, 0.51]	_ 	•••?•?•				
Ing 2016 (7)	9.3	1.8	22	9.4	2.7	12	1.1%	-0.10 [-1.80, 1.60]		?? ? •? • ? •				
Kleinman 2017	7.9	1.1	44	8.2	1.5	46	5.4%	-0.30 [-0.84, 0.24]						
McEwen 2017 (8)	9.2	2.1	56	9.2	2	50	3.7%	0.00 [-0.78, 0.78]		?????				
McMahon 2012 (9)	8.3	1.1	51	8.4	1.7	49	5.2%	-0.10 [-0.66, 0.46]		$\bullet \bullet \bullet ? \bullet ? \bullet$				
Spencer 2011 (10)	7.8	1.9	56	8.5	2.3	57	3.7%	-0.70 [-1.48, 0.08]		??				
Sperl-Hillen 2013 (11)	7.8	1.2	489	7.7	1.2	134	8.3%	0.10 [-0.13, 0.33]	+					
Wagner 2016 (12) Subtotal (05% CI)	8.6	1.9	70	8.4	1.6	68	5.0%	0.20 [-0.39, 0.79]		••?••?•				
Sublotal (95% CI)	00.052	44.0	9/1		221.17	230	41.070	0.02 [-0.10, 0.21]	–					
Heterogeneity: Taur = 0.	02; Chi=	- 0.09	o, ur = : ~	а (P = U.	23); F	= 23%								
Test für överall ellect. Za	= 0.17 (P	= 0.86	9											
Total (95% CI)			1966			1634	100.0%	-0.10 [-0.29, 0.10]	•					
Heterogeneity: Tau ² = 0	10: Chi≊	= 51 3	8 df= 1	17 (P < 1	1 0001): I ² = 6	7%		+ + +	+-				
Test for overall effect: 7:	= 0.997P	= 0.32	5, ui - N		5.0001	,, i = 0	1.00		-2 -1 0 1	2				
Test for subaroun differ	ences: C	_ 0.01 hi² = ∩	./ 82 df:	= 1 (P =	0.37)	$I^{2} = 0.96$		F	Favours [experimental] Favours [control]					
Footnotes	5110000. 0		01, 01	. (.	0.017,	0 %			Risk of bias legend					
(1) At 3 months EU									(A) Random sequence generation (selec	tion bias)				
(2) Measured with DDS									(B) Allocation concealment (selection bia	(3)				
(3) Within group differen	ices sub	stracte	d from	baselin	e mea	ans SD	s from m	ean within group	(C) Blinding of participants and personne	l (performance bias)				
(4) SDs calculated from	SElusin	a Revn	nan 53	1	0 11100		0 1101111	our mann group	(D) Blinding of outcome assessment (de	tection bias)				
(5) Significant difference	atbase	line: P/	AID 59	9 interve	ention	aroup	ersus 42	3 in the control arour	p (E) Incomplete outcome data (attrition bia	is)				
(6) Means + SDs from C	ochrane	review	(Chev	vetal 2	2017)	3 up			(F) Selective reporting (reporting bias)	/				
(7) Means from baseling	e subtrac	ted wit	hin arc	up diffe	rence	at 3 m	onths FU.	SDs from baseline	(G) Other bias					
(8) At 9 months follow-u	D													
(9) Online care (interven	9) Online care (intervention) versus web training (control)													
(10) SDs calculated from	(10) SDs calculated from Cl using Revman 5.3													
(11) Means + SDs from	Cochran	e revie	w (Che	ew et al :	2017)									
(12) At 3 months FU														

Figure 4c) Motivational interviewing versus standard care on HbA1 at longest follow-up

	Motivation	al intervie	wing	Enhanced standard care				Mean Difference	Mean Difference	Risk of Bias
Study or Subgroup	Mean	SD	Total	Mean	SD	Total	Weight	IV, Random, 95% CI	IV, Random, 95% CI	ABCDEFG
Gabbay 2013	7.8	1.7	188	8	1.8	233	24.1%	-0.20 [-0.54, 0.14]		
Heisler, 2014	7.8	1.7	87	7.9	1.9	89	17.8%	-0.10 [-0.63, 0.43]		
Spencer 2011	7.8	1.9	56	8.5	2.3	57	12.0%	-0.70 [-1.48, 0.08]	<	??+++?+
Tang 2013	8.1	1.68	186	8.3	1.81	193	23.6%	-0.20 [-0.55, 0.15]		
Welch 2011a	8.6	1.35	90	8.1	1.29	94	22.6%	0.50 [0.12, 0.88]	— →	?? 🗣 ? 🖶 🖨 🖨
Total (95% CI)			607			666	100.0%	-0.08 [-0.43, 0.26]		
Heterogeneity: Tau² =	0.10; Chi ² =	12.16, df=	= 4 (P = 0	.02); I² = 679	Хо					
Test for overall effect:	Z = 0.48 (P =	0.63)						Favours [MI] Favours [Enh.std.ca	irel]	

 Risk of bias legend

 (A) Random sequence generation (selection bias)

 (B) Allocation concealment (selection bias)

 (C) Blinding of participants and personnel (performance bias)

 (D) Blinding of outcome assessment (detection bias)

 (E) Incomplete outcome data (attrition bias)

 (F) Selective reporting (reporting bias)

 (G) Other bias