Ekberg N et al. Real-world use of once-weekly semaglutide in patients with type 2 diabetes: results from the SURE Denmark/Sweden multicentre, prospective, observational study

Supplementary tables and figures

Contents

Table S1: Medical history at baseline overall and by country subgroups

Number of patients, n (%)	Denmark (N=107)	Sweden (N=224)	Total (N=331)
Cardiovascular disease			
Hypertension	62 (57.9)	176 (78.6)	238 (71.9)
Dyslipidaemia	41 (38.3)	165 (73.7)	206 (62.2)
Coronary heart disease	5 (4.7)	31 (13.8)	36 (10.9)
Heart failure	1 (0.9)	9 (4.0)	10 (3.0)
Peripheral vascular disease	5 (4.7)	3 (1.3)	8 (2.4)
Stroke	3 (2.8)	7 (3.1)	10 (3.0)
Diabetes complications			
Diabetic retinopathy*	6 (5.6)	52 (23.3)	58 (17.6)
Diabetic neuropathy*	17 (15.9)	18 (8.1)	35 (10.6)
Diabetic nephropathy	12 (11.2)	21 (9.4)	33 (10.0)

*Numbers contributing to analysis were n=107 in Denmark, n=223 in Sweden and n=330 in total. Data are from the full analysis set.

Table S2: Baseline characteristics of patients overall and by country (EAS)

	Country		Total
	Denmark	Sweden	
N	84	198	282
Age, years	60.5 (11.7)	61.0 (11.1)	60.9 (11.3)
Female, n (%)	29 (34.5)	71 (35.9)	100 (35.5)
Baseline HbA_{1c}, %	7.7 (1.1)	8.0 (1.4)	7.9 (1.3)
Baseline HbA_{1c}, mmol/mol	60 (13)	64 (15)	63 (14)
Fasting plasma glucose, mmol/L[*]	8.9 (2.2)	8.9 (2.4)	8.9 (2.4)
Body weight, kg[†]	101.8 (22.8)	102.0 (20.6)	102.0 (21.2)
Body mass index, kg/m^2[‡]	33.7 (6.9)	34.5 (6.2)	34.2 (6.4)
Waist circumference, cm[§]	114.0 (16.4)	116.7 (14.5)	115.8 (15.2)
Diabetes duration, years	10.8 (6.8)	10.4 (7.6)	10.5 (7.3)
eGFR, $mL/min/1.73m^2$[¶]	85.2 (21.8)	87.0 (22.1)	86.4 (22.0)
Starting dose of semaglutide, n (%)			
0.25 mg	49 (58.3)	181 (91.4)	230 (81.6)
0.5 mg	33 (39.3)	10 (5.1)	43 (15.2)
1.0 mg	2 (2.4)	7 (3.5)	9 (3.2)
Reasons for initiating semaglutide, n (%)			
Improve glycaemic control	62 (73.8)	175 (88.4)	237 (84.0)
Weight reduction	51 (60.7)	136 (68.7)	187 (66.3)
Issues with hypoglycaemia	0	5 (2.5)	5 (1.8)
Address cardiovascular risk factors	9 (10.7)	35 (17.7)	44 (15.6)
Simplify current treatment regimen	25 (29.8)	27 (13.6)	52 (18.4)
Convenience	7 (8.3)	9 (4.5)	16 (5.7)
Other	4 (4.8)	5 (2.5)	9 (3.2)

[*]N-numbers contributing to analysis: n=33 in Denmark and n=117 in Sweden. [†]N-numbers contributing to analysis: n=82 in Denmark and n=196 in Sweden. [‡]N-numbers contributing to analysis: n=82 in Denmark and n=195 in Sweden. [§]N-numbers contributing to analysis: n=64 in Denmark, n=143 in Sweden. [¶]N-numbers contributing to analysis: n=74 in Denmark, n=149 in Sweden. Values are mean (SD) unless otherwise specified. Data are from the EAS. EAS, effectiveness analysis set; eGFR, estimated glomerular filtration rate; SD, standard deviation.

Table S3: Antihyperglycaemic medication at baseline and EOS in overall EAS population and by country subgroups

Antihyperglycaemic medication, n (%)	Denmark (n=84)		Sweden (n=198)		Total (n=282)	
	Baseline	EOS	Baseline	EOS	Baseline	EOS
Biguanide	74 (88.1)	76 (90.5)	156 (78.8)	156 (78.8)	230 (81.6)	232 (82.3)
Sulphonylurea	1 (1.2)		13 (6.6)	6 (3.0)	14 (5.0)	6 (2.1)
Thiazolidinedione			4 (2.0)	4 (2.0)	4 (1.4)	4 (1.4)
DPP-4i	7 (8.3)	3 (3.6)	37 (18.7)	5 (2.5)	44 (15.6)	8 (2.8)
SGLT-2 inhibitor	20 (23.8)	19 (22.6)	58 (29.3)	54 (27.3)	78 (27.7)	73 (25.9)
Other antihyperglycaemic drug, excluding insulin			5 (2.5)	2 (1.0)	5 (1.8)	2 (0.7)
GLP-1RA	11 (13.1)		38 (19.2)		49 (17.4)	
Basal insulin	25 (29.8)	28 (33.3)	58 (29.3)	59 (29.8)	83 (29.4)	87 (30.9)
Basal–bolus insulin	1 (1.2)	1 (1.2)	9 (4.5)	6 (3.0)	10 (3.5)	7 (2.5)
Bolus insulin	1 (1.2)	1 (1.2)	26 (13.1)	21 (10.6)	27 (9.6)	22 (7.8)
No antihyperglycaemic drug	4 (4.8)	3 (3.6)	7 (3.5)	15 (7.6)	11 (3.9)	18 (6.4)

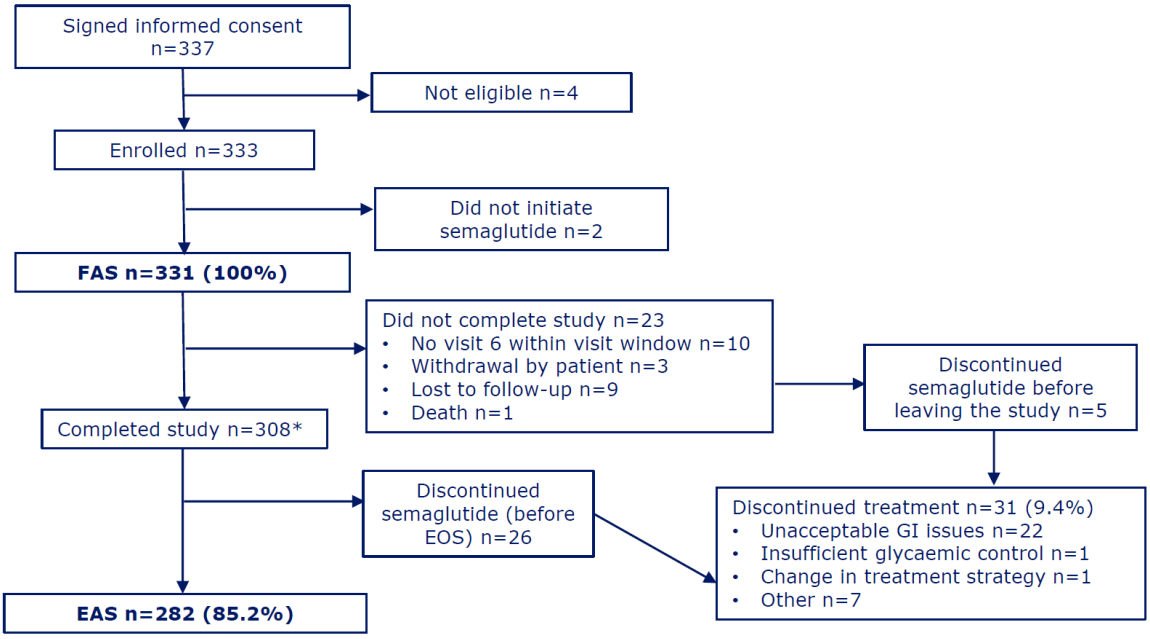
Data are from the EAS. DPP-4i, dipeptidyl peptidase-4 inhibitor; EAS, effectiveness analysis set; EOS, end of study; GLP-1RA, glucagon-like peptide-1 receptor agonist; SGLT-2, sodium–glucose cotransporter-2

Table S4: Adverse events

	Total (N=331)	
	Number of patients n (%)	**E**
All AEs	21 (6.3)	32
Severity of AEs		
Mild	11 (3.3)	13
Moderate	7 (2.1)	13
Severe	5 (1.5)	6
Serious ADRs	2 (0.6)	2
AEs leading to premature treatment discontinuation	7 (2.1)	8
Gastrointestinal AEs	12 (3.6)	18
Nausea	4 (1.2)	4
Diarrhoea	3 (0.9)	4
Gastrointestinal disorder	3 (0.9)	3
Constipation	2 (0.6)	2
Dyspepsia	1 (0.3)	1
Gastritis	1 (0.3)	1
Gastrointestinal haemorrhage	1 (0.3)	1
Gastrointestinal reflux disease	1 (0.3)	1
Abdominal pain	1 (0.3)	1

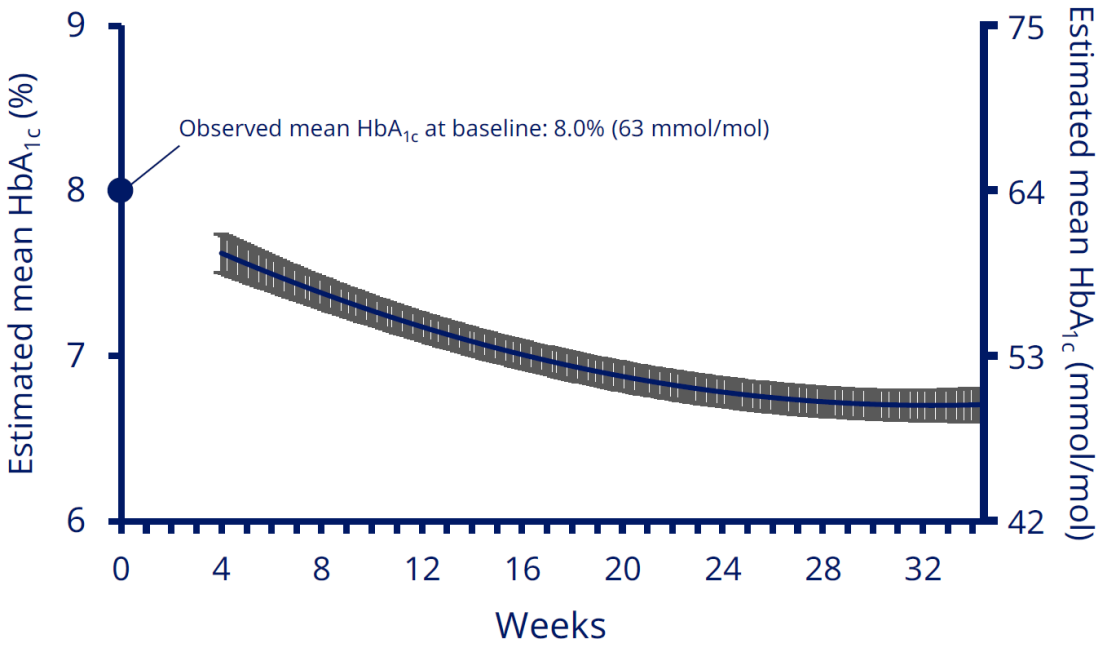
Data are from the FAS. Only serious ADRs, fatal events, pregnancies and AEs in foetuses or newborn infants were systematically collected at each visit; other AE data were not systematically collected but could be voluntarily reported by site physicians. %, percentage of patients experiencing at least one event; ADR, adverse drug reaction;
AE, adverse event; E, number of events; FAS, full analysis set; n, number of patients experiencing at least one event.

Figure S1: Patient disposition



*Patients who initiated semaglutide treatment and attended the end-of-study visit. EAS, effectiveness analysis set; EOS, end of study; FAS, full analysis set; GI, gastrointestinal.

Figure S2: Sensitivity analysis of estimated mean HbA1c over time



Data are from the FAS for the on-treatment period. Response was analysed using a mixed model for repeated measurements with baseline HbA_{1c}, T2D duration, age, BMI, time and time-squared as covariates and pre-initiation use of GLP-1RA (yes/no), pre-initiation use of DPP-4i (yes/no), pre-initiation use of insulin (yes/no), number of OADs use pre-initiation (0-1/2+) and sex as fixed factors with random intercept and random coefficient for time (slope). Error bars represent upper and lower 95% CIs. BMI, body mass index; CI, confidence interval; DPP-4i, dipeptidyl peptidase-4 inhibitor; FAS, full analysis set; GLP-1RA, glucagon-like peptide-1 receptor agonist; OAD, oral antidiabetic drug; T2D, type 2 diabetes.