## Supplementary data

Table 1. List of medications for the management of diabetes mellitus reported by research nurse at preoperative clinic assessment

Exenatide Gliclazide Glucophage ® Humulin ® Insulatard ® Metformin Mixtard ® (or Human Mixtard ®) Novorapid ®

Table 3. Outcomes by diabetic status

Nondiabetic patients n								
Length of hospitalization (days), median (IQR)		1	n = 523	n	= 64	model	model a	model <sup>b</sup>
Length of hospitalization (days), median (IQR)	Innatient period:							
VAS Pain ° on movement in operated joint, mean (SD)         515         44 (19)         62         50 (20)         0.03         0.06         0.4           VAS Pain at rest in operated joint, mean (SD)         509         32 (20)         62         40 (20)         0.004         0.01         0.2           At 3-month assessment:         Infection since surgery, n (%)         6         (1.2)         1         (1.6)         0.6           Dislocation since surgery, n (%)         2         (0.4)         0         (0.0)         -           Pelmonan promotisms since surgery, n (%)         4         (0.8)         0         (0.0)         0         9           Sciatic nerve damage since surgery, n (%)         0         (0.0)         0         (0.0)         -           Femoral nerve damage since surgery, n (%)         0         (0.0)         0         (0.0)         -           Formoral nerve damage since surgery, n (%)         0         (0.0)         0         (0.0)         -           Hospital readmission because of operated joint, n (%)         11         (2.1)         1 (1.6)         0.8           Further surgery on operated joint, n (%)         10         (1.9)         1         (1.6)         0.8           WOMAC Total, mean (SD)         427		523	4 (4–6)	64	5 (4-7)	0.004 °	0 02 d	0 3 d
VAS Pain at rest in operated joint, mean (SD)								
At 3-month assessment:  Infection since surgery, n (%) Dislocation since surgery, n (%) Deep vein thrombosis since surgery, n (%) Dislocation and selection since surgery, n (%) Dislocation since surgery, n (%)								
Infection since surgery, n (%)		000	02 (20)	02	10 (20)	0.001	0.01	0.2
Dislocation since surgery, n (%)   2		6	(1.2)	1	(1.6)	0.6		
Deep vein thrombosis since surgery, n (%)								
Pulmonary embolism since surgery, n (%)			` '		` '			
Sciatic nerve damage since surgery, n (%)   0 (0.0)   0 (0.0)   0 (0.0)   -								
Femoral nerve damage since surgery, n (%)		0						
Obturator nerve damage since surgery, n (%)   0 (0.0)   0 (0.0)   -		0	(0.0)	0	(0.0)	_		
Hospital readmission because of operated joint, n (%)		0	(0.0)	0	(0.0)	_		
Further surgery on operated joint, n (%)		11		1		0.8		
WOMAC Function, mean (SD)       438       77 (19)       52       77 (18)       0.9         WOMAC Stiffness, mean (SD)       442       70 (20)       53       69 (24)       0.7         WOMAC Total, mean (SD)       425       77 (18)       51       76 (18)       0.8         At 6-month assessment:       WOMAC Pain, mean (SD)       469       83 (19)       59       80 (21)       0.2         WOMAC Stiffness, mean (SD)       429       88 (71–96)       52       82 (67–94)       0.1         WOMAC Stiffness, mean (SD)       416       82 (18)       49       77 (20)       0.08       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       11       (2.1)       1       (1.6)       0.8       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       11       (2.1)       1       (1.6)       0.8       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       11       (2.1)       1       (1.6)       0.8       0.2       0.9         At 2-month assessment:       Infection since surgery, n (%)       12       (2.3)       2       (3.1)       0.6       0.6		10	(1.9)	1	(1.6)	0.9		
WOMAC Stiffness, mean (SD)       442       70 (20)       53       69 (24)       0.7         WOMAC Total, mean (SD)       425       77 (18)       51       76 (18)       0.8         At 6-month assessment:       WOMAC Pain, mean (SD)       469       83 (19)       59       80 (21)       0.2         WOMAC Function, median (IQR)       429       88 (71–96)       52       82 (67–94)       0.1         WOMAC Stiffness, mean (SD)       423       76 (21)       51       73 (20)       0.5         WOMAC Total, mean (SD)       416       82 (18)       49       77 (20)       0.08       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       11       (2.1)       1       (1.6)       0.8       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       1       (2.1)       1       (1.6)       0.8       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       1       (1.6)       0.8       0.8       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       1       (1.6)       0.6       0.6       0.6       0.6       0.6       0.6       0.6       0.6       <	WOMAC f Pain, mean (SD)	470	79 (20)	57	76 (20)	0.3		
WOMAC Total, mean (SD)       425       77 (18)       51       76 (18)       0.8         At 6-month assessment:       WOMAC Pain, mean (SD)       469       83 (19)       59       80 (21)       0.2         WOMAC Function, median (IQR)       429       88 (71–96)       52       82 (67–94)       0.1         WOMAC Stiffness, mean (SD)       423       76 (21)       51       73 (20)       0.5         WOMAC Total, mean (SD)       416       82 (18)       49       77 (20)       0.08       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       11       (2.1)       1       (1.6)       0.8         Dislocation since surgery, n (%)       2       (0.4)       0       (0.0)       -         Deep vein thrombosis since surgery, n (%)       12       (2.3)       2       (3.1)       0.6         Pulmonary embolism since surgery, n (%)       10       (1.9)       1       (1.6)       0.5         Femoral nerve damage since surgery, n (%)       5       (1.0)       1       (1.6)       0.5         Femoral nerve damage since surgery, n (%)       4       (0.8)       1       (1.6)       0.5         Obturator nerve damage since surgery, n (%)       4       (0.8) <td>WOMAC Function, mean (SD)</td> <td>438</td> <td>77 (19)</td> <td>52</td> <td>77 (18)</td> <td>0.9</td> <td></td> <td></td>	WOMAC Function, mean (SD)	438	77 (19)	52	77 (18)	0.9		
At 6-month assessment:  WOMAC Pain, mean (SD)  WOMAC Function, median (IQR)  WOMAC Stiffness, mean (SD)  WOMAC Stiffness, mean (SD)  WOMAC Stiffness, mean (SD)  423 76 (21) 51 73 (20) 0.5  WOMAC Total, mean (SD)  At 12-month assessment:  Infection since surgery, n (%)  Dislocation since surgery, n (%)  Deep vein thrombosis since surgery, n (%)  Pulmonary embolism since surgery, n (%)  Sciatic nerve damage since surgery, n (%)  Femoral nerve damage since surgery, n (%)  Oburator nerve damage since surgery, n (%)  Hospital readmission because of operated joint, n (%)  Further surgery on operated joint, n (%)  Further surgery on operated joint, n (%)  Number of inpatient stays, median (IQR)  Number of outpatient visits, median (IQR)  WOMAC Pain, median (IQR)  WOMAC Function, median (IQR)  468 90 (73–97)  55 79 (58–93)  O.2  V.2  V.3  V.7  V.9  V.9  V.9  V.9  V.9  V.9  V.9	WOMAC Stiffness, mean (SD)	442	70 (20)	53		0.7		
WOMAC Pain, mean (SD)       469       83 (19)       59       80 (21)       0.2         WOMAC Function, median (IQR)       429       88 (71–96)       52       82 (67–94)       0.1         WOMAC Stiffness, mean (SD)       423       76 (21)       51       73 (20)       0.5         WOMAC Total, mean (SD)       416       82 (18)       49       77 (20)       0.08       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       11       (2.1)       1       (1.6)       0.8       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       1       (1.6)       0.8       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       1       (1.6)       0.8       0.0       0.0       0.0       0.0       0.0       0.0       0.8       0.0       0.9       0.8       0.2       0.9       0.9       0.0 </td <td>WOMAC Total, mean (SD)</td> <td>425</td> <td>77 (18)</td> <td>51</td> <td>76 (18)</td> <td>0.8</td> <td></td> <td></td>	WOMAC Total, mean (SD)	425	77 (18)	51	76 (18)	0.8		
WOMAC Function, median (IQR)       429       88 (71–96)       52       82 (67–94)       0.1         WOMAC Stiffness, mean (SD)       423       76 (21)       51       73 (20)       0.5         WOMAC Total, mean (SD)       416       82 (18)       49       77 (20)       0.08       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       11       (2.1)       1       (1.6)       0.8         Dislocation since surgery, n (%)       2       (0.4)       0       (0.0)       -         Deep vein thrombosis since surgery, n (%)       12       (2.3)       2       (3.1)       0.6         Pulmonary embolism since surgery, n (%)       10       (1.9)       1       (1.6)       1.0         Sciatic nerve damage since surgery, n (%)       5       (1.0)       1       (1.6)       0.5         Femoral nerve damage since surgery, n (%)       5       (1.0)       1       (1.6)       0.5         Femoral nerve damage since surgery, n (%)       4       (0.8)       1       (1.6)       0.5         Femoral nerve damage since surgery, n (%)       4       (0.8)       1       (1.6)       0.5         Further surgery on operated joint, n (%)       34       (6.5)       5<								
WOMAC Stiffness, mean (SD)  WOMAC Total, mean (SD)  At 12-month assessment:  Infection since surgery, n (%)  Dislocation since surgery, n (%)  Deep vein thrombosis since surgery, n (%)  Sciatic nerve damage since surgery, n (%)  Obturator nerve damage since surgery, n (%)  Hospital readmission because of operated joint, n (%)  Further surgery on operated joint, n (%)  Further of inpatient stays, median (IQR)  Number of day case visits, median (IQR)  WOMAC Pain, median (IQR)  WOMAC Function, median (IQR)  WOMAC Function, median (IQR)  At 12 (23)  C (0.4)  C (0.4)  C (0.4)  C (0.0)								
WOMAC Total, mean (SD)       416       82 (18)       49       77 (20)       0.08       0.2       0.9         At 12-month assessment:       Infection since surgery, n (%)       11       (2.1)       1       (1.6)       0.8         Dislocation since surgery, n (%)       2       (0.4)       0       (0.0)       -       -         Deep vein thrombosis since surgery, n (%)       12       (2.3)       2       (3.1)       0.6         Pulmonary embolism since surgery, n (%)       10       (1.9)       1       (1.6)       1.0         Sciatic nerve damage since surgery, n (%)       5       (1.0)       1       (1.6)       0.5         Femoral nerve damage since surgery, n (%)       4       (0.8)       1       (1.6)       0.5         Obturator nerve damage since surgery, n (%)       4       (0.8)       1       (1.6)       0.4         Hospital readmission because of operated joint, n (%)       34       (6.5)       5       (7.8)       0.6         Further surgery on operated joint, n (%)       22       (4.2)       4       (6.2)       0.3         Number of inpatient stays, median (IQR)       493       0 (0-0)       58       0 (0-0)       0.4 c         Number of outpatient visits, median (IQR)				52	,			
At 12-month assessment:  Infection since surgery, n (%)  Dislocation since surgery, n (%)  Deep vein thrombosis since surgery, n (%)  Pulmonary embolism since surgery, n (%)  Sciatic nerve damage since surgery, n (%)  Femoral nerve damage since surgery, n (%)  Obturator nerve damage since surgery, n (%)  Hospital readmission because of operated joint, n (%)  Further surgery on operated joint, n (%)  Further surgery on operated joint, n (%)  Number of inpatient stays, median (IQR)  Number of outpatient visits, median (IQR)  WOMAC Pain, median (IQR)  WOMAC Function, median (IQR)  WOMAC Function, median (IQR)  WOMAC Function, median (IQR)  468  90 (73–97)  55  79 (58–93)  0.08  0.08  0.00								
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Femoral nerve damage since surgery, n (%) 5 (1.0) 1 (1.6) 0.5  Obturator nerve damage since surgery, n (%) 4 (0.8) 1 (1.6) 0.4  Hospital readmission because of operated joint, n (%) 34 (6.5) 5 (7.8) 0.6  Further surgery on operated joint, n (%) 22 (4.2) 4 (6.2) 0.3  Number of inpatient stays, median (IQR) 493 0 (0-0) 58 0 (0-0) 0.2 c  Number of day case visits, median (IQR) 493 0 (0-0) 58 0 (0-0) 0.4 c  Number of outpatient visits, median (IQR) 493 2 (1-3) 58 2 (1-3) 0.8 c  WOMAC Pain, median (IQR) 493 95 (75-100) 58 85 (70-95) 0.01 c 0.03 d 0.5 d  WOMAC Function, median (IQR) 468 90 (73-97) 55 79 (58-93) 0.02 c 0.08 d 0.8 d			` '		` '			
Obturator nerve damage since surgery, n (%)			` '		` '			
Hospital readmission because of operated joint, n (%)  Further surgery on operated joint, n (%)  Number of inpatient stays, median (IQR)  Number of day case visits, median (IQR)  Number of outpatient visits, median (IQR)  Number of outpatient visits, median (IQR)  WOMAC Pain, median (IQR)  WOMAC Function, median (IQR)  WOMAC Function, median (IQR)  44 (6.2)  4 (6.2)  0.3  0.2   0.4   0.4   0.5   493 0 (0-0) 58 0 (0-0) 0.4   493 2 (1-3) 58 2 (1-3) 0.8   0.8   0.00  0.01  0.03  0.5  0.05  0.08  0.08  0.08  0.09					` '			
Further surgery on operated joint, n (%)  Number of inpatient stays, median (IQR)  Number of day case visits, median (IQR)  Number of outpatient visits, median (IQR)  Number of outpatient visits, median (IQR)  WOMAC Pain, median (IQR)  WOMAC Function, median (IQR)  422 (4.2)  4 (6.2)  0.3  0.2 c  0.4 c  0.4 c  0.4 c  0.8 c  0.8 c  0.0 d  0.5 d  0.0 d								
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Number of day case visits, median (IQR)       493       0 (0-0)       58       0 (0-0)       0.4 °         Number of outpatient visits, median (IQR)       493       2 (1-3)       58       2 (1-3)       0.8 °         WOMAC Pain, median (IQR)       493       95 (75-100)       58       85 (70-95)       0.01 °       0.03 d       0.5 d         WOMAC Function, median (IQR)       468       90 (73-97)       55       79 (58-93)       0.02 °       0.08 d       0.8 d								
Number of outpatient visits, median (IQR)       493       2 (1-3)       58       2 (1-3)       0.8 °         WOMAC Pain, median (IQR)       493       95 (75–100)       58       85 (70–95)       0.01 °       0.03 °         WOMAC Function, median (IQR)       468       90 (73–97)       55       79 (58–93)       0.02 °       0.08 °								
WOMAC Pain, median (IQR) 493 95 (75–100) 58 85 (70–95) 0.01 ° 0.03 <sup>d</sup> 0.5 <sup>d</sup> WOMAC Function, median (IQR) 468 90 (73–97) 55 79 (58–93) 0.02 ° 0.08 <sup>d</sup> 0.8 <sup>d</sup>			` '		` '			
WOMAC Function, median (IQR) 468 90 (73–97) 55 79 (58–93) 0.02 ° 0.08 ° 0.8 °							0 03 d	0 5 d
\(\lambda \) \(\la	WOMAC Function, median (IQR) WOMAC Stiffness, median (IQR)	468	88 (75–100)	55 54	79 (56–93) 75 (50–100)		0.08 <sup>d</sup>	0.6 d
WOMAC Total, median (IQR)  467 86 (73–100) 54 75 (30–100) 0.02 0.07 0.05 d 0.7 d 0.05 d 0.7 d			,		`	,		

IQR: interquartile range

<sup>&</sup>lt;sup>a</sup> Linear regression model included adjustments for age, sex, site of surgery, and trial intervention.

b Linear regression model included adjustments for age, sex, site of surgery, and trial intervention, BMI, and number of comorbidities (FCI).

<sup>&</sup>lt;sup>c</sup> Mann–Whitney test, otherwise Student's t-test or Fisher's exact test.

<sup>&</sup>lt;sup>d</sup> Ordered logistic regression model.

e Pain Visual Analogue Scale (0–100 best to worst).

f Western Ontario and McMaster Universities Osteoarthritis Index (0–100 worst to best pain, function, stiffness, or total score).

Table 4. Multiple imputation-outcomes by diabetic status

	Nondiabetic patients n = 523	Diabetic patients n = 64	Unadjusted model p-value	Adjusted model <sup>a</sup> p-value	Adjusted model <sup>b</sup> p-value
Inpatient period:					
VAS Pain e on movement in operated joint, mean (SD)	44 (19)	50 (20)	0.02	0.04	0.4
VAS Pain at rest in operated joint, mean (SD)	32 (20)	40 (20)	0.002	0.008	0.1
At 3-month assessment:					
WOMAC <sup>f</sup> Pain, mean (SD)	78 (20)	75 (20)	0.3		
WOMAC Function, mean (SD)	76 (19)	75 (19)	0.7		
WOMAC Stiffness, mean (SD)	69 (21)	68 (24)	0.6		
WOMAC Total, mean (SD)	76 (18)	75 (18)	0.6		
At 6-month assessment:					
WOMAC Pain, mean (SD)	83 (19)	79 (21)	0.1	_	
WOMAC Function, median (IQR)	86 (68–95)	78 (59–93)	0.07 <sup>c</sup>	0.2 °	0.9 °
WOMAC Stiffness, mean (SD)	75 (21)	73 (21)	0.5		
WOMAC Total, mean (SD)	80 (18)	75 (21)	0.03	0.08	8.0
At 12-month assessment:	2 (2 2)	2 (2 2)			
Number of inpatient stays, median (IQR)	0 (0–0)	0 (0,0)	0.1 <sup>d</sup>		
Number of day case visits, median (IQR)	0 (0–0)	0 (0,0)	0.4 d		
Number of outpatient visits, median (IQR)	2 (1–3)	2 (1–3)	0.8 d		a = d
WOMAC Pain, median (IQR)	95 (75–100)	85 (70–96)	0.02 °	0.02 d	0.5 d
WOMAC Function, median (IQR)	89 (71–97)	79 (58–92)	0.02 °	0.06 d	0.8 d
WOMAC Stiffness, median (IQR)	79 (75–100)	75 (50–96)	0.06 °	0.1 d	0.7 d
WOMAC Total, median (IQR)	89 (74–97)	80 (59–93)	0.01 <sup>c</sup>	0.04 <sup>d</sup>	0.6 d

<sup>&</sup>lt;sup>a</sup> Linear regression model included adjustments for age, sex, site of surgery, and trial intervention.

<sup>b</sup> Linear regression model included adjustments for age, sex, site of surgery, and trial intervention, BMI, and number of comorbidities (FCI).

<sup>c</sup> Ordered logistic regression model.

<sup>d</sup> Poisson regression model.

<sup>e</sup> Pain Visual Analogue Scale (0–100 best to worst).

<sup>f</sup> Western Ontario and McMaster Universities Osteoarthritis Index (0–100 worst to best pain, function, stiffness or total score).

Table 5. Preoperative characteristics of diabetics patients (n = 64) by HbA1c status

	HbA1c ≤ 7% n = 39	HbA1c > 7% n = 25
Trial intervention in		
Trial intervention, n	18	13
Injection		
Standard care	21	12
Primary total joint replacement, n		_
Hip	17	7
Knee	22	18
Age, mean, SD	70 (8)	70 (7)
Sex, n		
Female	17	13
Male	22	12
BMI, mean, SD	34 (6)	34 (7)
≤ 30, n	12	9
> 30, n	27	16
EQ VAS a, n	36	25
mean (SD)	62 (20)	67 (18)
EQ-5D Score b, n	35	25
mean, SD	34 (0.31)	41 (0.31)
FCI c (number of comorbidities), r	n `´´	` ,
< 2	8	6
2	7	5
3	7	6
> 3	17	8
HADS d Total, n	37	25
mean (SD)	13 (6)	13 (6)
WOMAC e Pain, n	39	25
mean (SD)	41 (14)	41 (17)
WOMAC Function, n	35	24
mean (SD)	42 (16)	45 (18)
WOMAC Stiffness, n	36	25
mean (SD)	42 (14)	48 (23)
WOMAC Total, n	34	24
mean (SD)	43 (13)	45 (16)
HbA1c mmol/mol, n	39	25
mean (SD)	45 (5)	66 (10)
mean % (SD)	6 (0.4)	8.2 (1)
	0 (0.4)	0.2 (1)
Treated for diabetes, n None	21	5
	<del>-</del> -	
Treated type of management	18	20
If treated, type of management	· ·	1.4
Tablets	17	14
Tablets + insulin	1	5
Tablets + exenatide	0	1

<sup>&</sup>lt;sup>a</sup> EQ visual analogue scale (0–100, worst to best health state).

EQ visual analogue scale (0–100, worst to best nealth state).
 EQ-5D 3L descriptive system.
 Modified Functional Co-morbidity Index without BMI and diabetes diagnoses (categorized sum of the 16 remaining diagnoses).

diagnoses (categorized sum of the To remaining diagnoses).

d Hospital Anxiety and Depression Scale with anxiety and depression scores combined (0–42, best to worst distress state).

e Western Ontario and McMaster Universities Osteoarthritis Index

<sup>(0-100</sup> worst to best pain, function, stiffness or total score).

Table 6. Outcomes by HbA1c status (≤ 7% vs. > 7%) for diabetic patients (n = 64)

	HbA1c ≤ 7%		HbA1c > 7%		Unadjusted	Adjusted	Adjusted
		n = 39	n	= 25	model	model a	model b
	n	Summary	n	Summary	p-value	p-value	p-value
Inpatient period:							
Length of hospitalization (days), median (IQR)	39	5 (4–8)	25	5 (4–6)	0.3 <sup>c</sup>		
VAS d Pain on movement in operated join, mean (SD)	38	5 (2)	24	5 (2)	0.4		
VAS Pain at rest in operated join, mean (SD)	38	4 (2)	24	4 (2)	0.5		
Postoperative HbA1c (mmol/mol), mean (SD)	37	45 (7.0)	24	70 (17.1)	< 0.001	< 0.001	< 0.001
Postoperative HbA1c (%), mean (SD)	37	6.2 (0.6)	24	8.5 (1.6)	< 0.001	< 0.001	< 0.001
At 3-month assessment:		` ′		` ,			
WOMAC e Pain, mean (SD)	34	80 (18)	23	69 (22)	0.04	0.2	0.1
WOMAC Function, mean (SD)	32	79 (17)	20	74 (20)	0.4		
WOMAC Stiffness, mean (SD)	32	73 (22)	21	61 (26)	0.07	0.3	0.2
WOMAC Total, mean (SD)	32	79 (17)	20	73 (19)	0.2		
At 6-month assessment:							
WOMAC Pain, median (IQR)	35	90 (70-100)	24	78 (60–88)	0.01 <sup>c</sup>	0.1 f	0.03 <sup>f</sup>
WOMAC Function, median (IQR)	30	88 (72–94)	22	77 (47–83)	0.1 <sup>c</sup>		
WOMAC Stiffness, mean (SD)	29	78 (18)	22	68 (21)	0.07	0.3	0.05
WOMAC Total, median (IQR))	27	89 (71–94)	22	78 (53–86)	0.1 <sup>c</sup>		
At 12-month assessment:							
Number of complications, median (IQR)	34	0 (0–0)	24	0 (0-0)	0.9 <sup>c</sup>		
Number of inpatient stays, median (IQR)	34	0 (0–0)	24	0 (0-0)			
	34	0 (0–0)	24	0 (0–0)			
	34	2 (1–3)	24	2 (1–3)			
WOMAC Pain, median (IQR)	34	90 (70–100)	24	80 (58–95)			
WOMAC Function, median (IQR)	33	81 (58–94)	22	78 (58–91)			
WOMAC Stiffness, mean (SD)	33	78 (21)	21	61 (21)	0.005	0.01	0.004
WOMAC Total, median (IQR)h)	32	83 (63–93)	20	74 (55–83)	0.2 c		
Number of complications, median (IQR) Number of inpatient stays, median (IQR) Number of day case visits, median (IQR) Number of outpatient visits, median (IQR) WOMAC Pain, median (IQR) WOMAC Function, median (IQR) WOMAC Stiffness, mean (SD)	34 34 34 34 33 33	0 (0–0) 0 (0–0) 2 (1–3) 90 (70–100) 81 (58–94) 78 (21)	24 24 24 24 22 21	0 (0-0) 0 (0-0) 2 (1-3) 80 (58-95) 78 (58-91) 61 (21)	0.8 ° 0.4 ° 0.8 ° 0.1 ° 0.6 °	0.01	0.004

<sup>&</sup>lt;sup>a</sup> Linear regression model included adjustments for age, sex, site of surgery, and trial intervention.

<sup>b</sup> Linear regression model included adjustments for age, sex, site of surgery, and trial intervention, BMI, and number of comorbidities (FCI).

<sup>c</sup> Mann—Whitney test, otherwise Student's t-test.

<sup>d</sup> Pain Visual Analogue Scale (0–100 best to worst).

<sup>e</sup> Western Ontario and McMaster Universities Osteoarthritis Index (0–100 worst to best pain, function, stiffness, or total score).

<sup>f</sup> Ordered logistic regression model.

Table 7. Multiple imputation-outcomes by HbA1c status (≤ 7% vs. > 7%) for diabetic patients (n = 64)

			l loo a dissata al	A ali a t a al	A ali a.t.a. al
	HbA1c ≤ 7% n = 39	HbA1c > 7% n = 25	Unadjusted model p-value	Adjusted model <sup>a</sup> p-value	Adjusted model <sup>b</sup> p-value
Inpatient period:					
VAS <sup>e</sup> Pain on movement in operated join, mean (SD)	5 (2)	5 (2)	0.5		
VAS Pain at rest in operated join, mean (SD)	4 (2)	4 (2)	0.7		
Postoperative HbA1c (mmol/mol), mean (SD)	45 (7)	69 (17)	< 0.001	< 0.001	< 0.001
Postoperative HbA1c (%), mean (SD)	6.2 (0.7)	8.5 (1.6)	< 0.001	< 0.001	< 0.001
At 3-month assessment:					
WOMAC <sup>f</sup> Pain, mean (SD)	80 (17)	69 (22)	0.05	0.1	0.08
WOMAC Function, mean (SD)	77 (17)	72 (21)	0.3		
WOMAC Stiffness, mean (SD)	71 (22)	62 (26)	0.2		
WOMAC Total, mean (SD)	77 (17)	71 (20)	0.2		
At 6-month assessment:	00 (00 400)	00 (05, 00)	0.07.0	0.4.0	0.05.6
WOMAC Pain, median (IQR)	90 (69–100)	80 (65–88)	0.07 °	0.1 <sup>c</sup>	0.05 <sup>c</sup>
WOMAC Stiffness man (SD)	82 (61–94)	76 (47–83)	0.5 <sup>c</sup> 0.1		
WOMAC Stiffness, mean (SD) WOMAC Total, median (IQR)	76 (20) 85 (65–94)	67 (22) 76 (53–85)	0.3 °		
At 12-month assessment:	05 (05–94)	76 (55–65)	0.5		
Number of inpatient stays, median (IQR)	0 (0-0)	0 (0–0)	0.8 d		
Number of day case visits, median (IQR)	0 (0-0)	0 (0-0)	1.0 d		
Number of outpatient visits, median (IQR)	2 (1–3)	2 (1–3)	1.0 d		
WOMAC Pain, median (IQR)	88 (70–100)	80 (60–95)	0.2 °		
WOMAC Function, median (IQR)	81 (59–94)	76 (55–88)	0.5 °		
WOMAC Stiffness, mean (SD)	77 (22)	65 (22)	0.03	0.04	0.02
WOMAC Total, median (IQR)	85 (61–93)	75 (56, 86)	0.1 °		

 <sup>&</sup>lt;sup>a</sup> Linear regression model included adjustments for age, sex, site of surgery, and trial intervention.
 <sup>b</sup> Linear regression model included adjustments for age, sex, site of surgery, and trial intervention, BMI, and number of comorbidities (FCI).

<sup>&</sup>lt;sup>c</sup> Ordered logistic regression model.

<sup>d</sup> Poisson regression model.

<sup>e</sup> Pain Visual Analogue Scale (0–100 best to worst).

<sup>f</sup> Western Ontario and McMaster Universities Osteoarthritis Index (0–100 worst to best pain, function, stiffness or total score).