

## Loss of alignment

Initial Patients: 372

With Posterior Instrumented Fusion: 348

Posterior Instrumental Fusion is Iliac: 134

Differences smaller than  $10^\circ$  in 6W-2Y Lordosis (top of L1-S1): 112

Without complications (PJK, PJF, DJK, DJF) before 6 months after surgery: 98

### Demographics

Age

Age - mean

All

[1] 62.63265

Age - sd

All

[1] 10.01997

Gender

Gender - table

All

variable

Female	Male
84	14

Gender - proportion

All

variable

Female	Male
0.8571429	0.1428571

Prior Spine Surgery

Prior Spine Surgery - table

All

variable

No	Yes
58	40

Prior Spine Surgery - proportion

All

variable

No	Yes
0.5918367	0.4081633

```

Height (cm)_First Visit
Height (cm)_First Visit - mean
All
[1] 161.1753
Height (cm)_First Visit - sd
All
[1] 9.005797

```

```

Weight (kgs)_First Visit
Weight (kgs)_First Visit - mean
All
[1] 66.08247
Weight (kgs)_First Visit - sd
All
[1] 12.22163

```

```

BMI_First Visit
BMI_First Visit - mean
All
[1] 25.37825
BMI_First Visit - sd
All
[1] 3.691012

```

```

ASA classification
ASA classification - table
All
variable
  1  2  3
18 69 11
ASA classification - proportion
All
variable
      1      2      3
0.1836735 0.7040816 0.1122449

```

```

Tobacco use_First Visit
Tobacco use_First Visit - table
All
variable
  Current      Ex Non-User
      20      22      56
Tobacco use_First Visit - proportion
All
variable
  Current      Ex Non-User
0.2040816 0.2244898 0.5714286

```

```

ESSG Diagnosis

```

ESSG Diagnosis - table

All

variable

Congenital	Degenerative	Failed-back
3	47	9
Idiopathic	Neuromuscular	Other: spondylolisthesis
31	3	1
Post-traumatic	Syndromic	
3	1	

ESSG Diagnosis - proportion

All

variable

Congenital	Degenerative	Failed-back
0.03061224	0.47959184	0.09183673
Idiopathic	Neuromuscular	Other: spondylolisthesis
0.31632653	0.03061224	0.01020408
Post-traumatic	Syndromic	
0.03061224	0.01020408	

## Radiology

Static Major curve Cobb angle

Static Major curve Cobb angle - mean

All

[1] 41.14804

Static Major curve Cobb angle - sd

All

[1] 22.01958

6W. Static Major curve Cobb angle

6W. Static Major curve Cobb angle - mean

All

[1] 22.46103

6W. Static Major curve Cobb angle - sd

All

[1] 15.81603

6M. Static Major curve Cobb angle

6M. Static Major curve Cobb angle - mean

All

[1] 21.58412

6M. Static Major curve Cobb angle - sd

All

[1] 17.16257

1Y. Static Major curve Cobb angle

1Y. Static Major curve Cobb angle - mean

All

[1] 19.70506

1Y. Static Major curve Cobb angle - sd

```

All
[1] 15.82992

2Y. Static Major curve Cobb angle
2Y. Static Major curve Cobb angle - mean
All
[1] 18.3164
2Y. Static Major curve Cobb angle - sd
All
[1] 14.48838

5Y. Static Major curve Cobb angle
5Y. Static Major curve Cobb angle - mean
All
[1] 22.79204
5Y. Static Major curve Cobb angle - sd
All
[1] 15.84268

Static Major curve Cobb angle tests
Preop vs 6w p-value
7.055818e-10

Preop vs 2y p-value
6.790356e-14

Preop vs 5y p-value
8.196997e-08

6w vs 2y p-value
0.07401691

2y vs 5y p-value
0.1070358

6w vs 5y p-value
0.907059

Coronal Balance (C7PL to CSVL)
Coronal Balance (C7PL to CSVL) - mean
All
[1] 29.70063
Coronal Balance (C7PL to CSVL) - sd
All
[1] 25.43232

6W. Coronal Balance (C7PL to CSVL)
6W. Coronal Balance (C7PL to CSVL) - mean
All
[1] 20.808

```

```

6W. Coronal Balance (C7PL to CSVL) - sd
All
[1] 15.55918

6M. Coronal Balance (C7PL to CSVL)
6M. Coronal Balance (C7PL to CSVL) - mean
All
[1] 21.51627
6M. Coronal Balance (C7PL to CSVL) - sd
All
[1] 17.05537

1Y. Coronal Balance (C7PL to CSVL)
1Y. Coronal Balance (C7PL to CSVL) - mean
All
[1] 21.94195
1Y. Coronal Balance (C7PL to CSVL) - sd
All
[1] 16.94412

2Y. Coronal Balance (C7PL to CSVL)
2Y. Coronal Balance (C7PL to CSVL) - mean
All
[1] 22.1681
2Y. Coronal Balance (C7PL to CSVL) - sd
All
[1] 18.48451

5Y. Coronal Balance (C7PL to CSVL)
5Y. Coronal Balance (C7PL to CSVL) - mean
All
[1] 28.06021
5Y. Coronal Balance (C7PL to CSVL) - sd
All
[1] 21.12074

Coronal Balance (C7PL to CSVL) tests
Preop vs 6w p-value
0.004459069

Preop vs 2y p-value
0.02359945

Preop vs 5y p-value
0.683468

6w vs 2y p-value
0.6015384

```

2y vs 5y p-value  
0.110569

6w vs 5y p-value  
0.03955604

Sagittal Balance  
Sagittal Balance - mean  
All  
[1] 77.66538  
Sagittal Balance - sd  
All  
[1] 63.33729

6W. Sagittal Balance  
6W. Sagittal Balance - mean  
All  
[1] 25.2333  
6W. Sagittal Balance - sd  
All  
[1] 32.65841

6M. Sagittal Balance  
6M. Sagittal Balance - mean  
All  
[1] 19.73134  
6M. Sagittal Balance - sd  
All  
[1] 36.69053

1Y. Sagittal Balance  
1Y. Sagittal Balance - mean  
All  
[1] 26.83361  
1Y. Sagittal Balance - sd  
All  
[1] 44.58791

2Y. Sagittal Balance  
2Y. Sagittal Balance - mean  
All  
[1] 35.75598  
2Y. Sagittal Balance - sd  
All  
[1] 41.64468

5Y. Sagittal Balance  
5Y. Sagittal Balance - mean  
All

```
[1] 41.05918
5Y. Sagittal Balance - sd
All
[1] 51.98873
```

```
Sagittal Balance tests
Preop vs 6w p-value
6.6573e-11
```

```
Preop vs 2y p-value
5.294967e-07
```

```
Preop vs 5y p-value
0.0003408509
```

```
6w vs 2y p-value
0.06838847
```

```
2y vs 5y p-value
0.5454224
```

```
6w vs 5y p-value
0.05707473
```

```
Sagittal T2-T5
Sagittal T2-T5 - mean
All
[1] 10.13783
Sagittal T2-T5 - sd
All
[1] 8.674203
```

```
6W. Sagittal T2-T5
6W. Sagittal T2-T5 - mean
All
[1] 13.9567
6W. Sagittal T2-T5 - sd
All
[1] 8.755625
```

```
6M. Sagittal T2-T5
6M. Sagittal T2-T5 - mean
All
[1] 12.75733
6M. Sagittal T2-T5 - sd
All
[1] 7.876879
```

```
1Y. Sagittal T2-T5
1Y. Sagittal T2-T5 - mean
```

```

All
[1] 12.5406
1Y. Sagittal T2-T5 - sd
All
[1] 9.108455

2Y. Sagittal T2-T5
2Y. Sagittal T2-T5 - mean
All
[1] 12.72951
2Y. Sagittal T2-T5 - sd
All
[1] 9.080996

5Y. Sagittal T2-T5
5Y. Sagittal T2-T5 - mean
All
[1] 15.53755
5Y. Sagittal T2-T5 - sd
All
[1] 10.45196

Sagittal T2-T5 tests
Preop vs 6w p-value
0.00373668

Preop vs 2y p-value
0.05665321

Preop vs 5y p-value
0.002690377

6w vs 2y p-value
0.3716658

2y vs 5y p-value
0.1219793

6w vs 5y p-value
0.3718241

Sagittal T5-T12
Sagittal T5-T12 - mean
All
[1] 29.33642
Sagittal T5-T12 - sd
All
[1] 18.36859

6W. Sagittal T5-T12

```



```
6W. Sagittal T5-T12 - mean
All
[1] 34.95936
6W. Sagittal T5-T12 - sd
All
[1] 14.21917
```

```
6M. Sagittal T5-T12
6M. Sagittal T5-T12 - mean
All
[1] 37.45267
6M. Sagittal T5-T12 - sd
All
[1] 13.9539
```

```
1Y. Sagittal T5-T12
1Y. Sagittal T5-T12 - mean
All
[1] 37.41671
1Y. Sagittal T5-T12 - sd
All
[1] 13.70754
```

```
2Y. Sagittal T5-T12
2Y. Sagittal T5-T12 - mean
All
[1] 38.51843
2Y. Sagittal T5-T12 - sd
All
[1] 14.69517
```

```
5Y. Sagittal T5-T12
5Y. Sagittal T5-T12 - mean
All
[1] 42.23551
5Y. Sagittal T5-T12 - sd
All
[1] 16.4497
```

```
Sagittal T5-T12 tests
Preop vs 6w p-value
0.01963662
```

```
Preop vs 2y p-value
0.0002870564
```

```
Preop vs 5y p-value
4.052032e-05
```

6w vs 2y p-value  
0.1044059

2y vs 5y p-value  
0.1954515

6w vs 5y p-value  
0.01020691

Sagittal T2-T12  
Sagittal T2-T12 - mean  
All  
[1] 35.30292  
Sagittal T2-T12 - sd  
All  
[1] 18.53653

6W. Sagittal T2-T12  
6W. Sagittal T2-T12 - mean  
All  
[1] 44.47548  
6W. Sagittal T2-T12 - sd  
All  
[1] 14.25467

6M. Sagittal T2-T12  
6M. Sagittal T2-T12 - mean  
All  
[1] 47.69419  
6M. Sagittal T2-T12 - sd  
All  
[1] 14.51608

1Y. Sagittal T2-T12  
1Y. Sagittal T2-T12 - mean  
All  
[1] 46.4412  
1Y. Sagittal T2-T12 - sd  
All  
[1] 14.45611

2Y. Sagittal T2-T12  
2Y. Sagittal T2-T12 - mean  
All  
[1] 46.63095  
2Y. Sagittal T2-T12 - sd  
All  
[1] 15.954

```
5Y. Sagittal T2-T12
5Y. Sagittal T2-T12 - mean
All
[1] 51.48612
5Y. Sagittal T2-T12 - sd
All
[1] 16.95076
```

```
Sagittal T2-T12 tests
Preop vs 6w p-value
0.0001838279
```

```
Preop vs 2y p-value
1.812798e-05
```

```
Preop vs 5y p-value
7.470177e-07
```

```
6w vs 2y p-value
0.346595
```

```
2y vs 5y p-value
0.1068125
```

```
6w vs 5y p-value
0.0154817
```

```
Lordosis (top of L1-S1)
Lordosis (top of L1-S1) - mean
All
[1] -32.79278
Lordosis (top of L1-S1) - sd
All
[1] 17.57734
```

```
6W. Lordosis (top of L1-S1)
6W. Lordosis (top of L1-S1) - mean
All
[1] -52.24362
6W. Lordosis (top of L1-S1) - sd
All
[1] 13.09043
```

```
6M. Lordosis (top of L1-S1)
6M. Lordosis (top of L1-S1) - mean
All
[1] -51.46227
6M. Lordosis (top of L1-S1) - sd
All
[1] 12.97327
```

1Y. Lordosis (top of L1-S1)  
1Y. Lordosis (top of L1-S1) - mean  
All  
[1] -49.39407  
1Y. Lordosis (top of L1-S1) - sd  
All  
[1] 12.37036

2Y. Lordosis (top of L1-S1)  
2Y. Lordosis (top of L1-S1) - mean  
All  
[1] -49.55535  
2Y. Lordosis (top of L1-S1) - sd  
All  
[1] 13.36741

5Y. Lordosis (top of L1-S1)  
5Y. Lordosis (top of L1-S1) - mean  
All  
[1] -49.5928  
5Y. Lordosis (top of L1-S1) - sd  
All  
[1] 13.1366

Lordosis (top of L1-S1) tests  
Preop vs 6w p-value  
2.334469e-15

Preop vs 2y p-value  
9.010626e-12

Preop vs 5y p-value  
1.516803e-09

6w vs 2y p-value  
0.1752145

2y vs 5y p-value  
0.9873231

6w vs 5y p-value  
0.2511614

Pelvic Incidence  
Pelvic Incidence - mean  
All  
[1] 56.04546  
Pelvic Incidence - sd  
All  
[1] 13.04045

6W. Pelvic Incidence  
6W. Pelvic Incidence - mean  
All  
[1] 56.09247  
6W. Pelvic Incidence - sd  
All  
[1] 12.61719

6M. Pelvic Incidence  
6M. Pelvic Incidence - mean  
All  
[1] 55.93943  
6M. Pelvic Incidence - sd  
All  
[1] 12.95054

1Y. Pelvic Incidence  
1Y. Pelvic Incidence - mean  
All  
[1] 55.31802  
1Y. Pelvic Incidence - sd  
All  
[1] 12.12408

2Y. Pelvic Incidence  
2Y. Pelvic Incidence - mean  
All  
[1] 55.25103  
2Y. Pelvic Incidence - sd  
All  
[1] 12.61072

5Y. Pelvic Incidence  
5Y. Pelvic Incidence - mean  
All  
[1] 55.4412  
5Y. Pelvic Incidence - sd  
All  
[1] 12.60897

Pelvic Incidence tests  
Preop vs 6w p-value  
0.9798788

Preop vs 2y p-value  
0.6751247

Preop vs 5y p-value  
0.7861191

6w vs 2y p-value  
0.6552487

2y vs 5y p-value  
0.9324438

6w vs 5y p-value  
0.7690054

Pelvic Tilt  
Pelvic Tilt - mean  
All  
[1] 27.30124  
Pelvic Tilt - sd  
All  
[1] 9.777705

6W. Pelvic Tilt  
6W. Pelvic Tilt - mean  
All  
[1] 19.69914  
6W. Pelvic Tilt - sd  
All  
[1] 8.855268

6M. Pelvic Tilt  
6M. Pelvic Tilt - mean  
All  
[1] 22.14102  
6M. Pelvic Tilt - sd  
All  
[1] 8.534646

1Y. Pelvic Tilt  
1Y. Pelvic Tilt - mean  
All  
[1] 22.97593  
1Y. Pelvic Tilt - sd  
All  
[1] 9.283452

2Y. Pelvic Tilt  
2Y. Pelvic Tilt - mean  
All  
[1] 22.4257  
2Y. Pelvic Tilt - sd  
All

[1] 8.004201

5Y. Pelvic Tilt  
5Y. Pelvic Tilt - mean  
All  
[1] 23.783  
5Y. Pelvic Tilt - sd  
All  
[1] 8.923465

Pelvic Tilt tests  
Preop vs 6w p-value  
6.781586e-08

Preop vs 2y p-value  
0.0002799196

Preop vs 5y p-value  
0.03060204

6w vs 2y p-value  
0.03183929

2y vs 5y p-value  
0.3769397

6w vs 5y p-value  
0.01025876

Sacral Slope  
Sacral Slope - mean  
All  
[1] 28.71309  
Sacral Slope - sd  
All  
[1] 11.01433

6W. Sacral Slope  
6W. Sacral Slope - mean  
All  
[1] 36.4686  
6W. Sacral Slope - sd  
All  
[1] 10.66256

6M. Sacral Slope  
6M. Sacral Slope - mean  
All  
[1] 33.77557  
6M. Sacral Slope - sd

```

All
[1] 10.51717

1Y. Sacral Slope
1Y. Sacral Slope - mean
All
[1] 32.30733
1Y. Sacral Slope - sd
All
[1] 9.336442

2Y. Sacral Slope
2Y. Sacral Slope - mean
All
[1] 33.14057
2Y. Sacral Slope - sd
All
[1] 10.16704

5Y. Sacral Slope
5Y. Sacral Slope - mean
All
[1] 31.6574
5Y. Sacral Slope - sd
All
[1] 9.094866

Sacral Slope tests
Preop vs 6w p-value
1.787634e-06

Preop vs 2y p-value
0.005099966

Preop vs 5y p-value
0.08672339

6w vs 2y p-value
0.03343144

2y vs 5y p-value
0.3808987

6w vs 5y p-value
0.005391491

RLL
RLL - mean
All
[1] -30.95557

```



```
RLL - sd
All
[1] 16.53437
```

```
6W. RLL
6W. RLL - mean
All
[1] -11.4986
6W. RLL - sd
All
[1] 11.33264
```

```
6M. RLL
6M. RLL - mean
All
[1] -12.22023
6M. RLL - sd
All
[1] 10.89265
```

```
1Y. RLL
1Y. RLL - mean
All
[1] -13.90314
1Y. RLL - sd
All
[1] 10.95304
```

```
2Y. RLL
2Y. RLL - mean
All
[1] -13.57942
2Y. RLL - sd
All
[1] 11.20021
```

```
5Y. RLL
5Y. RLL - mean
All
[1] -13.7816
5Y. RLL - sd
All
[1] 12.00952
```

```
RLL tests
Preop vs 6w p-value
1.986774e-17
```

Preop vs 2y p-value  
1.693461e-14

Preop vs 5y p-value  
4.662292e-11

6w vs 2y p-value  
0.2185409

2y vs 5y p-value  
0.9229158

6w vs 5y p-value  
0.2717637

Global Tilt  
Global Tilt - mean  
All  
[1] 36.31742  
Global Tilt - sd  
All  
[1] 16.26602

6W. Global Tilt  
6W. Global Tilt - mean  
All  
[1] 20.83511  
6W. Global Tilt - sd  
All  
[1] 10.6085

6M. Global Tilt  
6M. Global Tilt - mean  
All  
[1] 22.64264  
6M. Global Tilt - sd  
All  
[1] 11.46156

1Y. Global Tilt  
1Y. Global Tilt - mean  
All  
[1] 24.42321  
1Y. Global Tilt - sd  
All  
[1] 12.23415

2Y. Global Tilt  
2Y. Global Tilt - mean  
All

[1] 25.68341  
2Y. Global Tilt - sd  
All  
[1] 11.28989

5Y. Global Tilt  
5Y. Global Tilt - mean  
All  
[1] 27.7442  
5Y. Global Tilt - sd  
All  
[1] 14.50862

Global Tilt tests  
Preop vs 6w p-value  
8.025851e-13

Preop vs 2y p-value  
7.489525e-07

Preop vs 5y p-value  
0.001509204

6w vs 2y p-value  
0.004303071

2y vs 5y p-value  
0.3931269

6w vs 5y p-value  
0.00410414

T1 Sagittal Tilt  
T1 Sagittal Tilt - mean  
All  
[1] 0.6241324  
T1 Sagittal Tilt - sd  
All  
[1] 6.934216

6W. T1 Sagittal Tilt  
6W. T1 Sagittal Tilt - mean  
All  
[1] -3.767206  
6W. T1 Sagittal Tilt - sd  
All  
[1] 3.563869

6M. T1 Sagittal Tilt  
6M. T1 Sagittal Tilt - mean

```

All
[1] -4.380591
6M. T1 Sagittal Tilt - sd
All
[1] 3.923536

1Y. T1 Sagittal Tilt
1Y. T1 Sagittal Tilt - mean
All
[1] -4.276342
1Y. T1 Sagittal Tilt - sd
All
[1] 4.733942

2Y. T1 Sagittal Tilt
2Y. T1 Sagittal Tilt - mean
All
[1] -3.408427
2Y. T1 Sagittal Tilt - sd
All
[1] 4.04017

5Y. T1 Sagittal Tilt
5Y. T1 Sagittal Tilt - mean
All
[1] -2.099361
5Y. T1 Sagittal Tilt - sd
All
[1] 6.329189

T1 Sagittal Tilt tests
Preop vs 6w p-value
8.769214e-07

Preop vs 2y p-value
1.029692e-05

Preop vs 5y p-value
0.02164948

6w vs 2y p-value
0.5530282

2y vs 5y p-value
0.19682

6w vs 5y p-value
0.09260539

Thoracolumbar L2-T10

```

Thoracolumbar L2-T10 - mean

All

[1] 8.57914

Thoracolumbar L2-T10 - sd

All

[1] 19.57937

6W. Thoracolumbar L2-T10

6W. Thoracolumbar L2-T10 - mean

All

[1] 7.559775

6W. Thoracolumbar L2-T10 - sd

All

[1] 10.19014

6M. Thoracolumbar L2-T10

6M. Thoracolumbar L2-T10 - mean

All

[1] 7.179877

6M. Thoracolumbar L2-T10 - sd

All

[1] 9.08839

1Y. Thoracolumbar L2-T10

1Y. Thoracolumbar L2-T10 - mean

All

[1] 6.28561

1Y. Thoracolumbar L2-T10 - sd

All

[1] 10.13311

2Y. Thoracolumbar L2-T10

2Y. Thoracolumbar L2-T10 - mean

All

[1] 6.735765

2Y. Thoracolumbar L2-T10 - sd

All

[1] 11.70807

5Y. Thoracolumbar L2-T10

5Y. Thoracolumbar L2-T10 - mean

All

[1] 6.174286

5Y. Thoracolumbar L2-T10 - sd

All

[1] 12.41592

Thoracolumbar L2-T10 tests

Preop vs 6w p-value  
0.6582684

Preop vs 2y p-value  
0.4426319

Preop vs 5y p-value  
0.3739631

6w vs 2y p-value  
0.6217745

2y vs 5y p-value  
0.7974329

6w vs 5y p-value  
0.5065043

RSA  
RSA - mean  
All  
[1] 24.41577  
RSA - sd  
All  
[1] 14.15088

6W. RSA  
6W. RSA - mean  
All  
[1] 8.818778  
6W. RSA - sd  
All  
[1] 8.224981

6M. RSA  
6M. RSA - mean  
All  
[1] 10.78644  
6M. RSA - sd  
All  
[1] 8.981948

1Y. RSA  
1Y. RSA - mean  
All  
[1] 12.8325  
1Y. RSA - sd  
All  
[1] 9.478109

```
2Y. RSA
2Y. RSA - mean
All
[1] 14.12
2Y. RSA - sd
All
[1] 9.040701
```

```
5Y. RSA
5Y. RSA - mean
All
[1] 16.1316
5Y. RSA - sd
All
[1] 11.48116
```

```
RSA tests
Preop vs 6w p-value
1.23255e-16
```

```
Preop vs 2y p-value
2.157258e-08
```

```
Preop vs 5y p-value
0.0002131745
```

```
6w vs 2y p-value
9.22873e-05
```

```
2y vs 5y p-value
0.2942261
```

```
6w vs 5y p-value
0.000157966
```

```
RPV
RPV - mean
All
[1] -13.3534
RPV - sd
All
[1] 8.05655
```

```
6W. RPV
6W. RPV - mean
All
[1] -5.625699
6W. RPV - sd
All
[1] 7.466348
```

```
6M. RPV
6M. RPV - mean
All
[1] -8.228636
6M. RPV - sd
All
[1] 6.912491
```

```
1Y. RPV
1Y. RPV - mean
All
[1] -9.330465
1Y. RPV - sd
All
[1] 7.150767
```

```
2Y. RPV
2Y. RPV - mean
All
[1] -8.457816
2Y. RPV - sd
All
[1] 6.706173
```

```
5Y. RPV
5Y. RPV - mean
All
[1] -10.052
5Y. RPV - sd
All
[1] 6.514459
```

```
RPV tests
Preop vs 6w p-value
9.62669e-11
```

```
Preop vs 2y p-value
1.237875e-05
```

```
Preop vs 5y p-value
0.008414954
```

```
6w vs 2y p-value
0.008043576
```

```
2y vs 5y p-value
0.1754449
```

```
6w vs 5y p-value
```



0.0003616853

## Quality of Life

```
ODI - Score (%)
ODI - Score (%) - mean
All
[1] 44.56522
ODI - Score (%) - sd
All
[1] 18.04165
```

```
6M. ODI - Score (%)
6M. ODI - Score (%) - mean
All
[1] 31.98889
6M. ODI - Score (%) - sd
All
[1] 19.21229
```

```
1Y. ODI - Score (%)
1Y. ODI - Score (%) - mean
All
[1] 30.44944
1Y. ODI - Score (%) - sd
All
[1] 18.07623
```

```
2Y. ODI - Score (%)
2Y. ODI - Score (%) - mean
All
[1] 32.13483
2Y. ODI - Score (%) - sd
All
[1] 22.46168
```

```
5Y. ODI - Score (%)
5Y. ODI - Score (%) - mean
All
[1] 36.36364
5Y. ODI - Score (%) - sd
All
[1] 24.4373
```

```
ODI - Score (%) tests
Preop vs 6m p-value
9.873532e-06
```

Preop vs 2y p-value  
6.497438e-05

Preop vs 5y p-value  
0.01594088  
2y vs 5y p-value  
0.2501981

6w vs 5y p-value  
4.516536e-25

SRS22 - Function / Activity  
SRS22 - Function / Activity - mean  
All  
[1] 2.760632  
SRS22 - Function / Activity - sd  
All  
[1] 0.7209226

6M. SRS22 - Function / Activity  
6M. SRS22 - Function / Activity - mean  
All  
[1] 3.082222  
6M. SRS22 - Function / Activity - sd  
All  
[1] 0.7064833

1Y. SRS22 - Function / Activity  
1Y. SRS22 - Function / Activity - mean  
All  
[1] 3.112308  
1Y. SRS22 - Function / Activity - sd  
All  
[1] 0.7948348

2Y. SRS22 - Function / Activity  
2Y. SRS22 - Function / Activity - mean  
All  
[1] 3.24809  
2Y. SRS22 - Function / Activity - sd  
All  
[1] 0.8921283

5Y. SRS22 - Function / Activity  
5Y. SRS22 - Function / Activity - mean  
All  
[1] 3.196795  
5Y. SRS22 - Function / Activity - sd  
All

[1] 0.9413771

SRS22 - Function / Activity tests  
Preop vs 6m p-value  
0.00251496

Preop vs 2y p-value  
7.479396e-05

Preop vs 5y p-value  
0.0009949779  
2y vs 5y p-value  
0.7193349

6w vs 5y p-value  
2.816459e-19

SRS22 - Pain  
SRS22 - Pain - mean  
All  
[1] 2.347895  
SRS22 - Pain - sd  
All  
[1] 0.8271804

6M. SRS22 - Pain  
6M. SRS22 - Pain - mean  
All  
[1] 3.386111  
6M. SRS22 - Pain - sd  
All  
[1] 0.9098718

1Y. SRS22 - Pain  
1Y. SRS22 - Pain - mean  
All  
[1] 3.50978  
1Y. SRS22 - Pain - sd  
All  
[1] 1.032239

2Y. SRS22 - Pain  
2Y. SRS22 - Pain - mean  
All  
[1] 3.401685  
2Y. SRS22 - Pain - sd  
All  
[1] 1.176292

```
5Y. SRS22 - Pain
5Y. SRS22 - Pain - mean
All
[1] 3.151282
5Y. SRS22 - Pain - sd
All
[1] 1.20127
```

```
SRS22 - Pain tests
Preop vs 6m p-value
7.907843e-14
```

```
Preop vs 2y p-value
7.559873e-11
```

```
Preop vs 5y p-value
1.701709e-06
2y vs 5y p-value
0.1766603
```

```
6w vs 5y p-value
3.825002e-19
```

```
SRS22 - Self image / Appearance
SRS22 - Self image / Appearance - mean
All
[1] 2.030842
SRS22 - Self image / Appearance - sd
All
[1] 0.6503561
```

```
6M. SRS22 - Self image / Appearance
6M. SRS22 - Self image / Appearance - mean
All
[1] 3.417222
6M. SRS22 - Self image / Appearance - sd
All
[1] 0.8457149
```

```
1Y. SRS22 - Self image / Appearance
1Y. SRS22 - Self image / Appearance - mean
All
[1] 3.410989
1Y. SRS22 - Self image / Appearance - sd
All
[1] 0.80734
```

```
2Y. SRS22 - Self image / Appearance
```

```
2Y. SRS22 - Self image / Appearance - mean
All
[1] 3.351124
2Y. SRS22 - Self image / Appearance - sd
All
[1] 0.9580691
```

```
5Y. SRS22 - Self image / Appearance
5Y. SRS22 - Self image / Appearance - mean
All
[1] 3.133974
5Y. SRS22 - Self image / Appearance - sd
All
[1] 1.047151
```

```
SRS22 - Self image / Appearance tests
Preop vs 6m p-value
1.363002e-25
```

```
Preop vs 2y p-value
9.298444e-21
```

```
Preop vs 5y p-value
4.321582e-13
2y vs 5y p-value
0.1661988
```

```
6w vs 5y p-value
4.197957e-19
```

```
SRS22 - Mental health
SRS22 - Mental health - mean
All
[1] 2.947895
SRS22 - Mental health - sd
All
[1] 0.9008541
```

```
6M. SRS22 - Mental health
6M. SRS22 - Mental health - mean
All
[1] 3.504222
6M. SRS22 - Mental health - sd
All
[1] 0.8627744
```

```
1Y. SRS22 - Mental health
1Y. SRS22 - Mental health - mean
All
```

```

[1] 3.537912
1Y. SRS22 - Mental health - sd
All
[1] 0.8651378

2Y. SRS22 - Mental health
2Y. SRS22 - Mental health - mean
All
[1] 3.42191
2Y. SRS22 - Mental health - sd
All
[1] 1.01287

5Y. SRS22 - Mental health
5Y. SRS22 - Mental health - mean
All
[1] 3.310897
5Y. SRS22 - Mental health - sd
All
[1] 1.048333

SRS22 - Mental health tests
Preop vs 6m p-value
2.884734e-05

Preop vs 2y p-value
0.001002112

Preop vs 5y p-value
0.01700967
2y vs 5y p-value
0.4889347

6w vs 5y p-value
1.389462e-19

SRS22 - SRS Subtotal score
SRS22 - SRS Subtotal score - mean
All
[1] 2.524947
SRS22 - SRS Subtotal score - sd
All
[1] 0.5895939

6M. SRS22 - SRS Subtotal score
6M. SRS22 - SRS Subtotal score - mean
All
[1] 3.346889
6M. SRS22 - SRS Subtotal score - sd

```

```

All
[1] 0.6691982

1Y. SRS22 - SRS Subtotal score
1Y. SRS22 - SRS Subtotal score - mean
All
[1] 3.404396
1Y. SRS22 - SRS Subtotal score - sd
All
[1] 0.7252237

2Y. SRS22 - SRS Subtotal score
2Y. SRS22 - SRS Subtotal score - mean
All
[1] 3.355169
2Y. SRS22 - SRS Subtotal score - sd
All
[1] 0.8785527

5Y. SRS22 - SRS Subtotal score
5Y. SRS22 - SRS Subtotal score - mean
All
[1] 3.2
5Y. SRS22 - SRS Subtotal score - sd
All
[1] 0.9328535

SRS22 - SRS Subtotal score tests
Preop vs 6m p-value
9.040721e-16

Preop vs 2y p-value
5.587867e-12

Preop vs 5y p-value
1.666516e-07
2y vs 5y p-value
0.2721586

6w vs 5y p-value
2.75968e-19

SF36 - PCS
SF36 - PCS - mean
All
[1] 33.27312
SF36 - PCS - sd
All
[1] 7.785528

```

```
6M. SF36 - PCS
6M. SF36 - PCS - mean
All
[1] 38.50701
6M. SF36 - PCS - sd
All
[1] 8.953122
```

```
1Y. SF36 - PCS
1Y. SF36 - PCS - mean
All
[1] 39.06888
1Y. SF36 - PCS - sd
All
[1] 8.984458
```

```
2Y. SF36 - PCS
2Y. SF36 - PCS - mean
All
[1] 40.15727
2Y. SF36 - PCS - sd
All
[1] 10.29273
```

```
5Y. SF36 - PCS
5Y. SF36 - PCS - mean
All
[1] 37.72286
5Y. SF36 - PCS - sd
All
[1] 11.45773
```

```
SF36 - PCS tests
Preop vs 6m p-value
4.778989e-05
```

```
Preop vs 2y p-value
1.160478e-06
```

```
Preop vs 5y p-value
0.004403834
2y vs 5y p-value
0.1554949
```

```
6w vs 5y p-value
7.288201e-57
```



```
SF36 - MCS
SF36 - MCS - mean
All
[1] 41.22871
SF36 - MCS - sd
All
[1] 12.29288
```

```
6M. SF36 - MCS
6M. SF36 - MCS - mean
All
[1] 46.52713
6M. SF36 - MCS - sd
All
[1] 12.0857
```

```
1Y. SF36 - MCS
1Y. SF36 - MCS - mean
All
[1] 46.17303
1Y. SF36 - MCS - sd
All
[1] 12.18157
```

```
2Y. SF36 - MCS
2Y. SF36 - MCS - mean
All
[1] 45.67591
2Y. SF36 - MCS - sd
All
[1] 12.28804
```

```
5Y. SF36 - MCS
5Y. SF36 - MCS - mean
All
[1] 44.45545
5Y. SF36 - MCS - sd
All
[1] 12.59954
```

```
SF36 - MCS tests
Preop vs 6m p-value
0.004015133
```

```
Preop vs 2y p-value
0.01595555
```

```
Preop vs 5y p-value
```

0.09479246  
2y vs 5y p-value  
0.5309449

6w vs 5y p-value  
3.349875e-58

## Surgery

Total Operative Blood Loss st1+st2+st3  
Total Operative Blood Loss st1+st2+st3 - mean  
All  
[1] 1955.143  
Total Operative Blood Loss st1+st2+st3 - sd  
All  
[1] 1431.513

Total surgical time st1+st2+st3  
Total surgical time st1+st2+st3 - mean  
All  
[1] 316.4898  
Total surgical time st1+st2+st3 - sd  
All  
[1] 181.7305

Number of Posterior Instrumented Levels  
Number of Posterior Instrumented Levels - mean  
All  
[1] 10.8125  
Number of Posterior Instrumented Levels - sd  
All  
[1] 3.858859

Pelvic fixation  
Pelvic fixation - table  
All  
variable  
Yes  
98  
Pelvic fixation - proportion  
All  
variable  
Yes  
1

Surgical Approach  
Surgical Approach - table  
All  
variable

Anterior-Posterior	Posterior
1	88
Posterior-Anterior	Posterior-Posterior-Anterior
8	1

Surgical Approach - proportion

All

variable

Anterior-Posterior	Posterior
0.01020408	0.89795918
Posterior-Anterior	Posterior-Posterior-Anterior
0.08163265	0.01020408

Number of Interbody Fusions

Number of Interbody Fusions - mean

All

[1] 1.153061

Number of Interbody Fusions - sd

All

[1] 1.229802

Decompression

Decompression - table

All

variable

No Yes

73 25

Decompression - proportion

All

variable

No Yes

0.744898 0.255102

Interbody Fusion

Interbody Fusion - table

All

variable

No Yes

38 60

Interbody Fusion - proportion

All

variable

No Yes

0.3877551 0.6122449

Osteotomy

Osteotomy - table

All

variable

No Yes

38 60

Osteotomy - proportion  
All  
variable  
No Yes  
0.3877551 0.6122449

3CO  
3CO - table  
All  
variable  
No Yes  
72 26  
3CO - proportion  
All  
variable  
No Yes  
0.7346939 0.2653061

## Complications

Number of reinterventions: 77

	Complication	Impact	N
1:	Minor	Complication	110
2:	Major	Complication	93
3:		Adverse Event	2

	Category of the complication	N
1:	Mechanical complications	108
2:	Other complications	38
3:	Iatrogenic	18
4:	Pain	8
5:	Peripheral neurologic complications	22
6:	Infectious complications	11

## Number of patients in Complications

Number of patients with reinterventions: 32

	Complication	Impact	patients_complications
1:	Minor	Complication	57
2:	Major	Complication	39
3:		Adverse Event	1

	Category of the complication	patients_complications
1:	Mechanical complications	53
2:	Other complications	23
3:	Iatrogenic	15
4:	Pain	8
5:	Peripheral neurologic complications	18
6:	Infectious complications	8