



AUSTRALIAN ORTHOPAEDIC ASSOCIATION NATIONAL JOINT REPLACEMENT REGISTRY

Automated Industry Reporting System



AUTOMATED INDUSTRY REPORTING SYSTEM

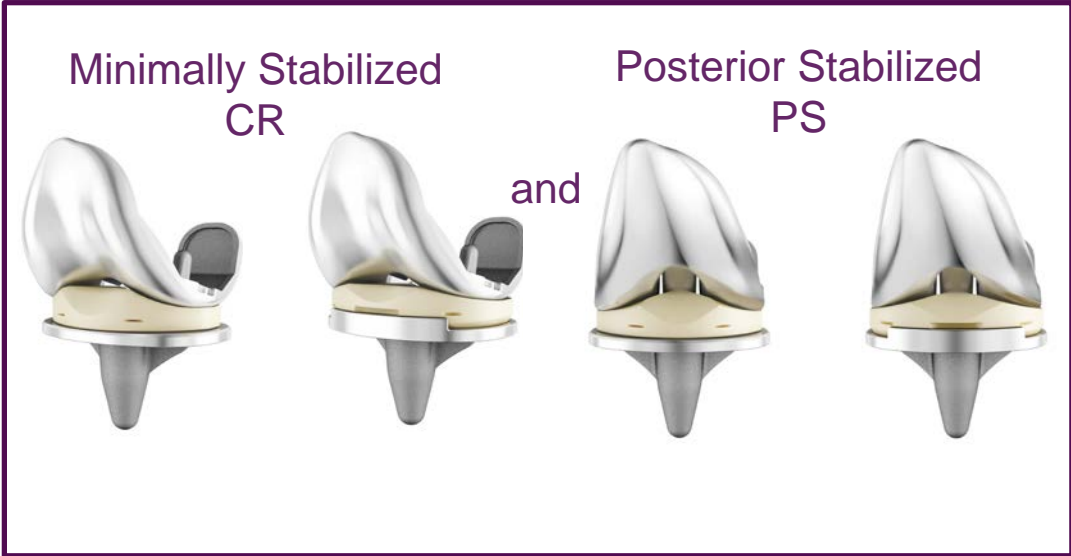
- **Cruciate Retaining (CR) ATTUNE® Knee**
- **Posterior Stabilized (PS) ATTUNE Knee**



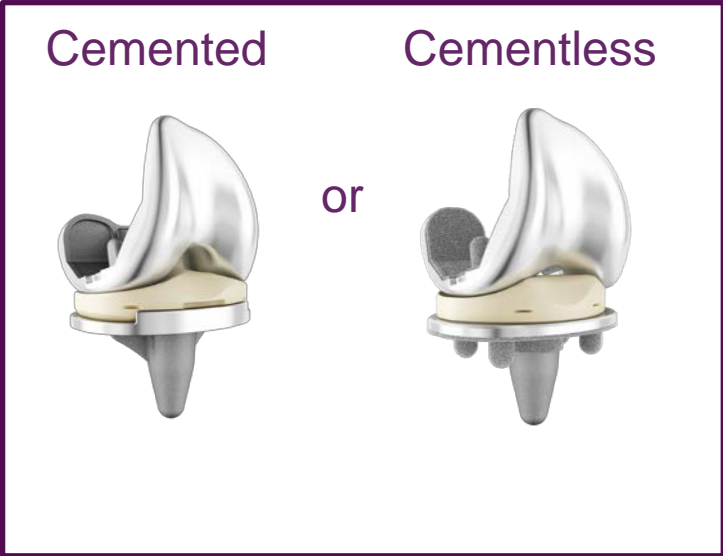
INTRODUCING A RECENTLY AVAILABLE, INDEPENDENT REPORT FROM THE AOANJRR

The AOANJRR publishes an annual report with outcomes data at set intervals of one, three, five-year and beyond. Additional implant survivorship data is now also available more frequently to manufacturers who subscribe to the AOANJRR's Automated Industry Report System (AIRS).

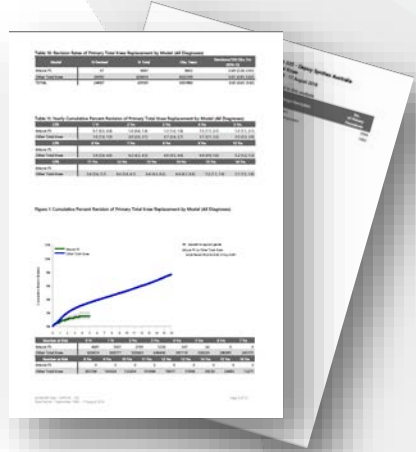
AIRS Reports are:



Reported by femoral component: Cruciate Retaining and Posterior Stabilized



Reported by fixation: cemented or cementless

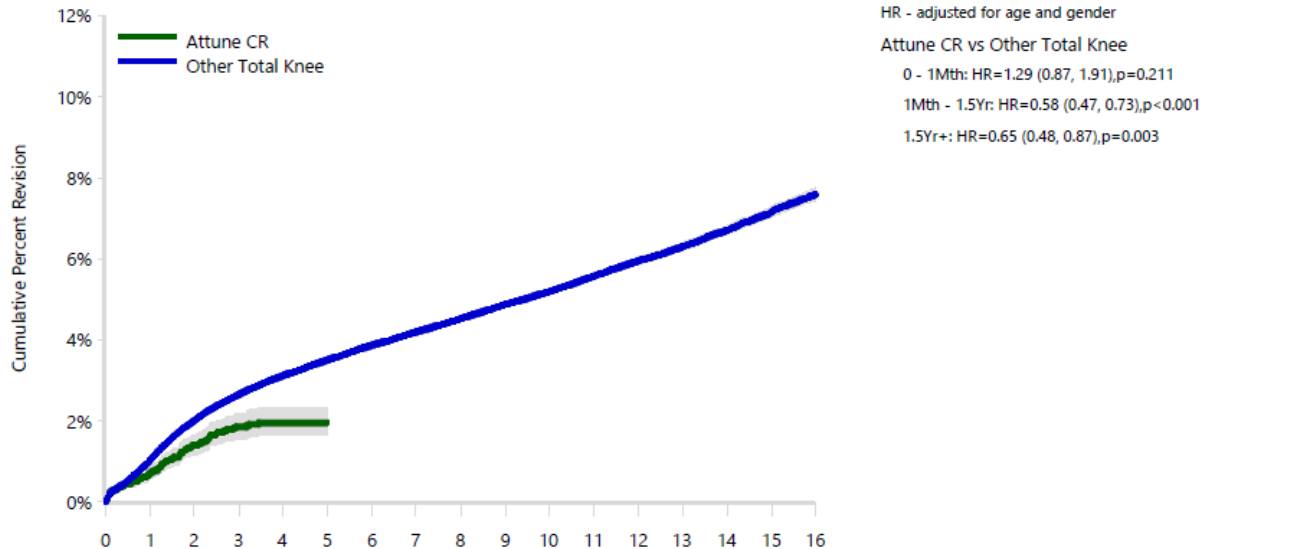


AIRS Reports

- More frequent
- More current

CR ATTUNE® KNEE IMPLANT SURVIVORSHIP

Figure 1: Cumulative Percent Revision of Primary Total Knee Replacement by Model (All Diagnoses)(AOANJRR 9JAN2019)²



| Number at Risk | 0 Yr | 1 Yr | 2 Yrs | 3 Yrs | 4 Yrs | 5 Yrs | 6 Yrs | 7 Yrs |
|------------------|--------|--------|--------|--------|--------|--------|--------|--------|
| Attune CR | 11735 | 8777 | 5562 | 3094 | 957 | 78 | 0 | 0 |
| Other Total Knee | 641149 | 583415 | 521276 | 463086 | 407188 | 354512 | 304806 | 258400 |

Table 11: Yearly Cumulative Percent Revision of Primary Total Knee Replacement by Model (All Diagnoses) AOANJRR 9JAN2019)²

| CPR | 1 Yr | 2 Yrs | 3 Yrs | 4 Yrs | 5 Yrs |
|------------------|----------------|----------------|----------------|----------------|----------------|
| Attune CR | 0.7 (0.6, 0.9) | 1.4 (1.2, 1.6) | 1.8 (1.5, 2.2) | 2.0 (1.6, 2.3) | 2.0 (1.6, 2.3) |
| Other Total Knee | 1.0 (1.0, 1.0) | 2.0 (2.0, 2.0) | 2.6 (2.6, 2.7) | 3.1 (3.1, 3.2) | 3.5 (3.4, 3.5) |

This report indicates that the 11,735 cemented CR ATTUNE® Knee cumulative percent revision of 2.0% (95% CI: 1.6, 2.3%) at four years is **performing significantly better** than all other TKA in the AOANJRR (HR 0.65 (0.48, 0.87), p=0.003).¹

All other TKA in this report had a four year estimated cumulative percent revision of 3.1% (3.1, 3.2).¹ The five year cumulative percent revision for the CR ATTUNE Knee is based on a sample size of 78 patients.¹

Expressed as implant survivorship at four years, the CR ATTUNE Knees have a 98.0% implant survivorship (97.7, 98.4), which is performing favorably to the overall class of knees of 96.9% (96.8, 96.9) implant survivorship.¹

1. Australian Orthopaedic Association National Joint Replacement Registry (AOANJRR), Automated Industry Report System (AIRS), ID No. 823 for DePuy Synthes, ATTUNE CR/ATTUNE Total Knee, (Procedures from 1 September 1999 – 8 January 2019), Accessed 8 January 2019, AOA, Adelaide: 1-14. .

CR ATTUNE KNEE TOP 5 REASONS FOR REVISION

Table 13: Yearly Cumulative Incidence Revision Diagnosis of Primary Total Knee Replacement by Model (All Diagnoses)

| Model | Event | N Events | 1 Yr | 2 Yrs | 3 Yrs | 5 Yrs | 10 Yrs | 15 Yrs |
|------------------|---------------------|----------|----------------|----------------|----------------|----------------|-------------------|-------------------|
| Attune CR | Infection | 65 | 0.4 (0.3, 0.6) | 0.6 (0.5, 0.8) | 0.7 (0.5, 0.9) | 0.7 (0.5, 0.9) | | |
| | Loosening | 19 | 0.0 (0.0, 0.1) | 0.2 (0.1, 0.3) | 0.3 (0.2, 0.4) | 0.3 (0.2, 0.4) | | |
| | Pain | 13 | 0.0 (0.0, 0.1) | 0.1 (0.1, 0.2) | 0.2 (0.1, 0.3) | 0.2 (0.1, 0.3) | | |
| | Instability | 12 | 0.0 (0.0, 0.1) | 0.1 (0.0, 0.2) | 0.2 (0.1, 0.3) | 0.2 (0.1, 0.3) | | |
| | Patellofemoral Pain | 10 | 0.0 (0.0, 0.1) | 0.1 (0.0, 0.2) | 0.1 (0.1, 0.3) | 0.2 (0.1, 0.4) | | |
| | Other | 30 | 0.1 (0.1, 0.2) | 0.3 (0.2, 0.4) | 0.4 (0.3, 0.5) | 0.4 (0.3, 0.6) | | |
| | Deceased | 151 | 0.4 (0.3, 0.5) | 1.1 (0.9, 1.3) | 2.0 (1.7, 2.4) | 3.3 (2.6, 4.2) | | |
| | All Revision | 149 | 0.7 (0.6, 0.9) | 1.4 (1.1, 1.6) | 1.8 (1.5, 2.2) | 1.9 (1.6, 2.3) | | |
| Other Total Knee | Infection | 5761 | 0.4 (0.4, 0.4) | 0.6 (0.6, 0.6) | 0.7 (0.7, 0.7) | 0.9 (0.8, 0.9) | 1.1 (1.0, 1.1) | 1.2 (1.2, 1.3) |
| | Loosening | 6250 | 0.2 (0.2, 0.2) | 0.4 (0.4, 0.4) | 0.6 (0.6, 0.6) | 0.8 (0.8, 0.8) | 1.3 (1.2, 1.3) | 1.7 (1.7, 1.8) |
| | Pain | 2013 | 0.0 (0.0, 0.1) | 0.2 (0.1, 0.2) | 0.2 (0.2, 0.2) | 0.3 (0.3, 0.3) | 0.4 (0.4, 0.4) | 0.5 (0.4, 0.5) |
| | Instability | 1975 | 0.1 (0.1, 0.1) | 0.2 (0.2, 0.2) | 0.2 (0.2, 0.2) | 0.3 (0.3, 0.3) | 0.4 (0.4, 0.4) | 0.5 (0.4, 0.5) |
| | Patellofemoral Pain | 2454 | 0.1 (0.1, 0.1) | 0.2 (0.2, 0.2) | 0.3 (0.3, 0.3) | 0.4 (0.3, 0.4) | 0.5 (0.5, 0.5) | 0.6 (0.5, 0.6) |
| | Other | 6348 | 0.2 (0.2, 0.2) | 0.4 (0.4, 0.5) | 0.6 (0.6, 0.6) | 0.8 (0.8, 0.8) | 1.2 (1.2, 1.3) | 1.8 (1.7, 1.8) |
| | Deceased | 95841 | 0.8 (0.7, 0.8) | 1.8 (1.8, 1.8) | 3.1 (3.1, 3.2) | 6.7 (6.6, 6.8) | 20.7 (20.6, 20.8) | 38.8 (38.5, 39.0) |
| | All Revision | 24801 | 1.0 (1.0, 1.0) | 2.0 (2.0, 2.0) | 2.6 (2.6, 2.6) | 3.4 (3.4, 3.5) | 4.9 (4.8, 5.0) | 6.2 (6.2, 6.3) |

Based on point estimates and confidence intervals, there is less incidence of revision for loosening with the CR ATTUNE Knee than all other Total Knee at 3 years follow-up.¹

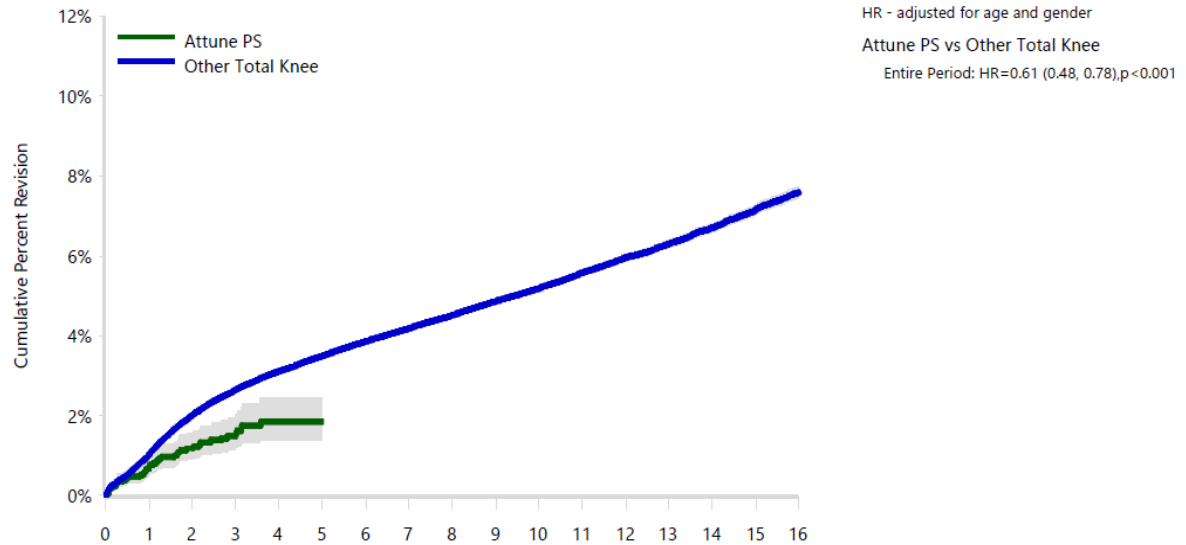
The CR ATTUNE Knee is performing in line with the class for the remaining reasons for revision in this report.¹

The five year cumulative incidence rates for the CR ATTUNE Knee is based on a sample size of 78 patients.¹

1. Australian Orthopaedic Association National Joint Replacement Registry (AOANJRR), Automated Industry Report System (AIRS), ID No. 823 for DePuy Synthes, ATTUNE CR/ATTUNE Total Knee, (Procedures from 1 September 1999 – 8 January 2019), Accessed 8 January 2019, AOA, Adelaide: 1-14. .

PS ATTUNE KNEE IMPLANT SURVIVORSHIP

Figure 1: Cumulative Percent Revision of Primary Total Knee Replacement by Model (All Diagnoses)(AOANJRR 9JAN2019)²



| Number at Risk | 0 Yr | 1 Yr | 2 Yrs | 3 Yrs | 4 Yrs | 5 Yrs | 6 Yrs | 7 Yrs |
|------------------|--------|--------|--------|--------|--------|--------|--------|--------|
| Attune PS | 5263 | 4003 | 2627 | 1588 | 690 | 143 | 0 | 0 |
| Other Total Knee | 647621 | 588189 | 524211 | 464592 | 407455 | 354447 | 304806 | 258400 |

Table 11: Yearly Cumulative Percent Revision of Primary Total Knee Replacement by Model (All Diagnoses) AOANJRR 9JAN2019)²

| CPR | 1 Yr | 2 Yrs | 3 Yrs | 4 Yrs | 5 Yrs |
|------------------|----------------|----------------|----------------|----------------|----------------|
| Attune PS | 0.7 (0.5, 0.9) | 1.2 (0.9, 1.6) | 1.5 (1.1, 1.9) | 1.8 (1.4, 2.4) | 1.8 (1.4, 2.4) |
| Other Total Knee | 1.0 (1.0, 1.0) | 2.0 (2.0, 2.0) | 2.6 (2.6, 2.7) | 3.1 (3.1, 3.2) | 3.5 (3.4, 3.5) |

This report indicates that the 5,263 cemented PS ATTUNE[®] Knee with a cumulative percent revision of 1.8% at four years (95% CI: 1.4, 2.4%) is **performing significantly better** than all other TKA in the AOANJRR (HR 0.61 (0.48, 0.78), p<0.001).²

All other TKA in this report had a four year estimated cumulative percent revision of 3.1% (3.1, 3.2).² The five year cumulative percent revision for the PS ATTUNE Knee is based on a sample size of 143 patients.²

Expressed as implant survivorship at four years, the PS ATTUNE Knees have a 98.2% implant survivorship (97.6, 98.6), which is performing favorably to the overall class of knees of 96.9% (96.8, 96.9) implant survivorship.²

2. Australian Orthopaedic Association National Joint Replacement Registry (AOANJRR), Automated Industry Report System (AIRS), ID No. 824 for DePuy Synthes, ATTUNE PS/ATTUNE Total Knee, (Procedures from 1 September 1999 – 8 January 2019), Accessed 8 January 2019, AOA, Adelaide: 1-14. .

PS ATTUNE KNEE TOP 5 REASONS FOR REVISION

Table 13: Yearly Cumulative Incidence Revision Diagnosis of Primary Total Knee Replacement by Model (All Diagnoses)

| Model | Event | N Events | 1 Yr | 2 Yrs | 3 Yrs | 5 Yrs | 10 Yrs | 15 Yrs |
|------------------|----------------|----------|----------------|----------------|----------------|----------------|-------------------|-------------------|
| Attune PS | Infection | 25 | 0.3 (0.1, 0.4) | 0.5 (0.3, 0.8) | 0.6 (0.4, 0.9) | 0.6 (0.4, 1.0) | | |
| | Loosening | 12 | 0.1 (0.0, 0.2) | 0.2 (0.1, 0.4) | 0.3 (0.1, 0.5) | 0.5 (0.2, 0.9) | | |
| | Instability | 9 | 0.2 (0.1, 0.3) | 0.2 (0.1, 0.4) | 0.2 (0.1, 0.4) | 0.2 (0.1, 0.4) | | |
| | Arthrofibrosis | 5 | 0.1 (0.0, 0.2) | 0.1 (0.0, 0.3) | 0.1 (0.0, 0.3) | 0.1 (0.0, 0.3) | | |
| | Fracture | 4 | 0.1 (0.0, 0.2) | 0.1 (0.0, 0.2) | 0.1 (0.0, 0.2) | 0.1 (0.0, 0.2) | | |
| | Other | 7 | 0.0 (0.0, 0.2) | 0.0 (0.0, 0.2) | 0.2 (0.1, 0.5) | 0.3 (0.1, 0.6) | | |
| | Deceased | 99 | 0.5 (0.3, 0.7) | 1.6 (1.2, 2.1) | 2.5 (1.9, 3.1) | 6.0 (4.0, 8.5) | | |
| | All Revision | 62 | 0.7 (0.5, 0.9) | 1.2 (0.9, 1.5) | 1.5 (1.1, 1.9) | 1.8 (1.4, 2.4) | | |
| Other Total Knee | Infection | 5801 | 0.4 (0.4, 0.4) | 0.6 (0.6, 0.6) | 0.7 (0.7, 0.7) | 0.9 (0.8, 0.9) | 1.1 (1.0, 1.1) | 1.2 (1.2, 1.3) |
| | Loosening | 6257 | 0.2 (0.2, 0.2) | 0.4 (0.4, 0.4) | 0.6 (0.6, 0.6) | 0.8 (0.8, 0.8) | 1.3 (1.2, 1.3) | 1.7 (1.7, 1.8) |
| | Instability | 1978 | 0.1 (0.1, 0.1) | 0.2 (0.2, 0.2) | 0.2 (0.2, 0.2) | 0.3 (0.3, 0.3) | 0.4 (0.4, 0.4) | 0.5 (0.4, 0.5) |
| | Arthrofibrosis | 863 | 0.0 (0.0, 0.0) | 0.1 (0.1, 0.1) | 0.1 (0.1, 0.1) | 0.1 (0.1, 0.2) | 0.2 (0.2, 0.2) | 0.2 (0.2, 0.2) |
| | Fracture | 765 | 0.0 (0.0, 0.0) | 0.1 (0.1, 0.1) | 0.1 (0.1, 0.1) | 0.1 (0.1, 0.1) | 0.1 (0.1, 0.2) | 0.2 (0.2, 0.2) |
| | Other | 9224 | 0.3 (0.3, 0.3) | 0.7 (0.6, 0.7) | 0.9 (0.9, 0.9) | 1.2 (1.2, 1.3) | 1.9 (1.8, 1.9) | 2.4 (2.4, 2.5) |
| | Deceased | 95893 | 0.8 (0.7, 0.8) | 1.8 (1.7, 1.8) | 3.1 (3.1, 3.2) | 6.7 (6.6, 6.7) | 20.7 (20.5, 20.8) | 38.8 (38.5, 39.0) |
| | All Revision | 24888 | 1.0 (1.0, 1.0) | 2.0 (1.9, 2.0) | 2.6 (2.6, 2.6) | 3.4 (3.4, 3.5) | 4.9 (4.8, 5.0) | 6.2 (6.1, 6.3) |

Based on point estimates and confidence intervals, there is less incidence of revision for loosening with the PS ATTUNE Knee than all other Total Knee at 3 years follow-up.²

The PS ATTUNE Knee is performing in line with the class for the remaining reasons for revision in this report.²

The five year cumulative incidence rates for the PS ATTUNE Knee is based on a sample size of 143 patients.²

2. Australian Orthopaedic Association National Joint Replacement Registry (AOANJRR), Automated Industry Report System (AIRS), ID No. 824 for DePuy Synthes, ATTUNE PS/ATTUNE Total Knee, (Procedures from 1 September 1999 – 8 January 2019), Accessed 8 January 2019, AOA, Adelaide: 1-14. .