

Score (cementless)/Score (cemented) Total Knee Investigation

Note: This analysis compares the Score (cless)/Score (ctd) femoral/tibial combination with all other total knee prostheses.

This combination has been identified as having a significantly higher rate of revision. For a detailed explanation of the process used by the Registry that results in identification of prostheses that have a higher than anticipated rate of revision please refer to the Prostheses with Higher than Anticipated Rates of Revision chapter of the most recent AOANJRR Annual Report, <https://aoanjrr.sahmri.com/annual-reports-2026>.

Note: Procedures using prostheses with no recorded use in 2025 are excluded from the comparator.

TABLE 1

Revision Rate of Primary Total Knee Replacement

The revision rate of the Score (cless)/Score (ctd) total knee combination is compared to all other total knee prostheses.

Table 1: Revision Rates of Primary Total Knee Replacement

Component	N Revised	N Total	Obs. Years	Revisions/100 Obs. Yrs (95% CI)
Score (cless)/Score (ctd)	135	1679	13592	0.99 (0.83, 1.18)
Other Total Knee	27149	789751	5132330	0.53 (0.52, 0.54)
TOTAL	27284	791430	5145922	0.53 (0.52, 0.54)

Note: Prostheses no longer used in 2025 are excluded from the comparator.

TABLE 2

Yearly Cumulative Percent Revision of Primary Total Knee Replacement

The yearly cumulative percent revision of the Score (class)/Score (ctd) total knee combination is compared to all other total knee prostheses.

Table 2: Yearly Cumulative Percent Revision (95% CI) of Primary Total Knee Replacement

CPR	1 Yr	2 Yrs	3 Yrs	4 Yrs	5 Yrs	6 Yrs
Score (class)/Score (ctd)	1.5 (1.0, 2.2)	2.9 (2.2, 3.8)	3.8 (3.0, 4.9)	4.7 (3.8, 5.8)	5.6 (4.6, 6.8)	6.5 (5.4, 7.8)
Other Total Knee	1.0 (1.0, 1.0)	1.8 (1.8, 1.8)	2.4 (2.3, 2.4)	2.8 (2.7, 2.8)	3.1 (3.0, 3.1)	3.4 (3.4, 3.4)

CPR	7 Yrs	8 Yrs	9 Yrs	10 Yrs	11 Yrs	12 Yrs
Score (class)/Score (ctd)	7.3 (6.1, 8.7)	7.9 (6.7, 9.4)	8.2 (6.9, 9.7)	9.1 (7.7, 10.8)	9.5 (8.0, 11.2)	9.9 (8.2, 11.9)
Other Total Knee	3.7 (3.7, 3.7)	4.0 (3.9, 4.0)	4.3 (4.2, 4.4)	4.6 (4.6, 4.7)	4.9 (4.9, 5.0)	5.2 (5.2, 5.3)

CPR	13 Yrs	14 Yrs	15 Yrs	16 Yrs	17 Yrs	18 Yrs
Score (class)/Score (ctd)						
Other Total Knee	5.6 (5.5, 5.7)	5.9 (5.8, 6.0)	6.2 (6.2, 6.3)	6.7 (6.6, 6.8)	7.1 (7.0, 7.3)	7.5 (7.4, 7.7)

CPR	19 Yrs	20 Yrs	21 Yrs	22 Yrs	23 Yrs	24 Yrs	25 Yrs
Score (class)/Score (ctd)							
Other Total Knee	7.8 (7.7, 8.0)	8.1 (7.9, 8.3)	8.5 (8.2, 8.7)	8.7 (8.4, 9.0)	8.8 (8.5, 9.1)	9.1 (8.7, 9.5)	9.5 (8.8, 10.2)

Note: Prostheses no longer used in 2025 are excluded from the comparator.

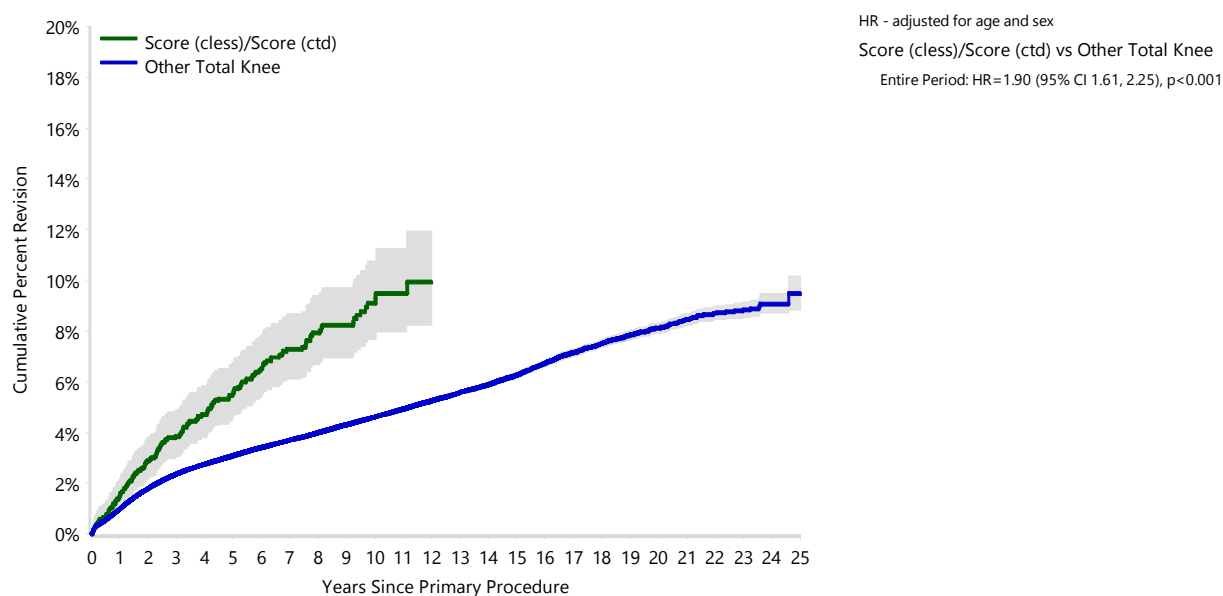
FIGURE 1

Yearly Cumulative Percent Revision of Primary Total Knee Replacement

The yearly cumulative percent revision of the Score (class)/Score (ctd) total knee combination is compared to all other total knee prostheses. In addition, hazard ratios are reported.

Hazard ratios are reported for specific time periods during which the hazard ratio is constant. This is done to enable more specific and valid comparisons of the risk of revision over time. The pattern of variation in risk has important implications with respect to the underlying reasons for any difference.

Figure 1: Cumulative Percent Revision of Primary Total Knee Replacement



Number at Risk	0 Yr	1 Yr	2 Yrs	3 Yrs	4 Yrs	5 Yrs	6 Yrs	7 Yrs
Score (class)/Score (ctd)	1679	1645	1611	1579	1539	1462	1318	1092
Other Total Knee	789751	707054	626663	549256	486005	423406	368527	314907

Number at Risk	8 Yrs	9 Yrs	10 Yrs	11 Yrs	12 Yrs	13 Yrs	14 Yrs	15 Yrs	16 Yrs
Score (class)/Score (ctd)	952	728	476	220	85	17	7	4	4
Other Total Knee	265864	221592	182178	146760	117116	92170	70373	52522	38347

Number at Risk	17 Yrs	18 Yrs	19 Yrs	20 Yrs	21 Yrs	22 Yrs	23 Yrs	24 Yrs	25 Yrs
Score (class)/Score (ctd)	3	1	0	0	0	0	0	0	0
Other Total Knee	27625	19433	13616	9427	6164	3657	2096	972	244

Note: Prostheses no longer used in 2025 are excluded from the comparator.

TABLE 3**Primary Diagnosis for Revised Primary Total Knee Replacement**

This table identifies the diagnosis of the primary procedure which was subsequently revised. This information is provided as there is a variation on outcome depending on the primary diagnosis. It is therefore important when considering the reasons for a higher than anticipated rate of revision that there is identification of the primary diagnosis. This information should be compared to the primary diagnosis for the revisions of all other total knee prostheses.

Table 3: Primary Diagnosis for Revised Primary Total Knee Replacement

Primary Diagnosis	Score (class)/Score (ctd)		Other Total Knee	
	Number	Percent	Number	Percent
Osteoarthritis	135	100.0	26257	96.7
Rheumatoid Arthritis			330	1.2
Tumour			199	0.7
Other Inflammatory Arthritis			177	0.7
Osteonecrosis			104	0.4
Fracture			55	0.2
Other			26	0.1
Chondrocalcinosis			1	0.0
TOTAL	135	100.0	27149	100.0

Note: Prostheses no longer used in 2025 are excluded from the comparator.

TABLE 4

Reasons for Revision

This is reported in two ways: a percentage of primary procedures revised and as a percentage of all revision procedures.

% Primaries Revised: This shows the proportional contribution of each revision diagnosis as a percentage of the total number of primary procedures. This percentage can be used to approximate the risk of being revised for that diagnosis. Differing percentages between groups, with the same distribution of follow up time, may identify problems of concern.

% Revisions: The number of revisions for each diagnosis is expressed as a percentage of the total number of revisions. This shows the distribution of reasons for revision within a group but cannot be used as a comparison between groups.

Table 4: Primary Total Knee Replacement - Reason for Revision (Follow-up Limited to 18.4 Years)

Revision Diagnosis	Score (class)/Score (ctd)			Other Total Knee		
	Number	% Primaries Revised	% Revisions	Number	% Primaries Revised	% Revisions
Infection	27	1.6	20.0	7849	1.0	29.0
Loosening	39	2.3	28.9	5693	0.7	21.1
Instability	19	1.1	14.1	2847	0.4	10.5
Patella Erosion	4	0.2	3.0	2015	0.3	7.5
Pain	16	1.0	11.9	1846	0.2	6.8
Patellofemoral Pain				1554	0.2	5.7
Arthrofibrosis	4	0.2	3.0	1177	0.1	4.4
Fracture	13	0.8	9.6	1114	0.1	4.1
Malalignment	2	0.1	1.5	509	0.1	1.9
Wear Tibial Insert				367	0.0	1.4
Lysis	3	0.2	2.2	283	0.0	1.0
Implant Breakage Tibial Insert				250	0.0	0.9
Incorrect Sizing	1	0.1	0.7	217	0.0	0.8
Patella Maltracking				192	0.0	0.7
Bearing Dislocation				150	0.0	0.6
Implant Breakage Patella	1	0.1	0.7	146	0.0	0.5
Metal Related Pathology	1	0.1	0.7	113	0.0	0.4
Prosthesis Dislocation				78	0.0	0.3
Synovitis				64	0.0	0.2
Osteonecrosis				51	0.0	0.2
Wear Patella	1	0.1	0.7	51	0.0	0.2
Implant Breakage Femoral				47	0.0	0.2
Implant Breakage Tibial				39	0.0	0.1
Tumour				36	0.0	0.1
Heterotopic Bone				16	0.0	0.1
Progression Of Disease				8	0.0	0.0
Wear Tibial				6	0.0	0.0
Patella Dislocation				3	0.0	0.0
Incorrect Side				1	0.0	0.0
Wear Femoral				1	0.0	0.0
Other	4	0.2	3.0	309	0.0	1.1
N Revision	135	8.0	100.0	27032	3.4	100.0
N Primary	1679			789751		

Note: This table is restricted to revisions within 18.4 years for all groups to allow a time-matched comparison of revisions.

Note: Prostheses no longer used in 2025 are excluded from the comparator.

FIGURE 2**Cumulative Incidence Revision Diagnosis of Primary Total Knee Replacement**

This figure details the cumulative incidence of the most common reasons for revision. The five most common reasons for revision are included as long as each of these reasons account for more than 10 procedures or at least 5% of all revisions for the Score (class)/Score (ctd) total knee combination. A comparative graph is provided of the cumulative incidence for the same reasons for revisions for all other total knee prostheses.

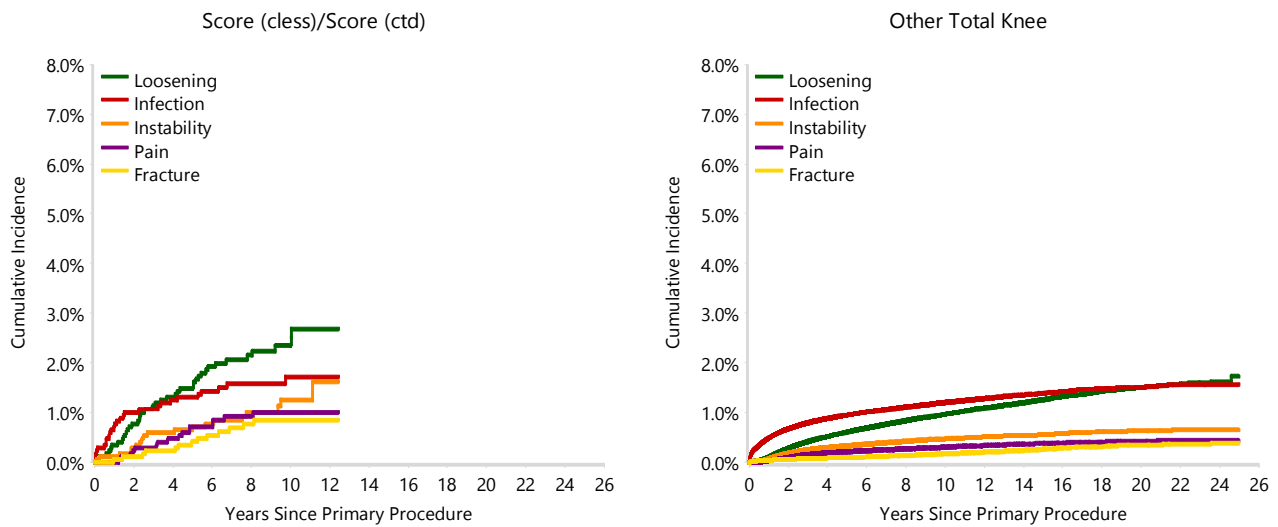
Figure 2: Cumulative Incidence Revision Diagnosis for Primary Total Knee Replacement

TABLE 5

Type of Revision Performed for Primary Total Knee Replacement

This analysis identifies the components used in the revision of the Score (class)/Score (ctd) total knee combination and compares it to the components used in the revision of all other total knee prostheses.

The reason this analysis is undertaken is to identify whether there is one or more components which are being replaced that differ from the components replaced for revisions of all other total knee prostheses i.e. is there a difference in the type of revision undertaken for the Score (class)/Score (ctd) total knee combination compared to all other total knee prostheses.

Table 5: Primary Total Knee Replacement - Type of Revision (Follow-up Limited to 18.4 Years)

Type of Revision	Score (class)/Score (ctd)		Other Total Knee	
	Number	Percent	Number	Percent
TKR (Tibial/Femoral)	85	63.0	6538	24.2
Tibial Component	1	0.7	1906	7.1
Femoral Component	9	6.7	1304	4.8
Cement Spacer	4	3.0	1132	4.2
Removal of Prostheses			133	0.5
Total Femoral	1	0.7	22	0.1
Reinsertion of Components			8	0.0
N Major	100	74.1	11043	40.9
Insert Only	16	11.9	8539	31.6
Patella Only	17	12.6	4471	16.5
Insert/Patella	2	1.5	2902	10.7
Minor Components			66	0.2
Cement Only			11	0.0
N Minor	35	25.9	15989	59.1
TOTAL	135	100.0	27032	100.0

Note: This table is restricted to revisions within 18.4 years for all groups to allow a time-matched comparison of revisions.

Note: Prostheses no longer used in 2025 are excluded from the comparator.

TABLE 6**Revision Rates of Score (class)/Score (ctd) Primary Total Knee Replacement by Fixation**

This analysis is provided as some prostheses have more than one fixation option. Additionally there are prostheses where an alternative to the recommended approach to fixation was used e.g. a cementless prosthesis that has been cemented or vice-versa.

Table 6: Revised Number of Score (class)/Score (ctd) Primary Total Knee Replacement by Fixation

Fixation	N Revised	N Total
Cemented	0	14
Cementless	0	2
Hybrid (Tibial Cemented)	135	1663
TOTAL	135	1679

TABLE 7**Revision Rates of Score (class)/Score (ctd) Primary Total Knee Replacement by Bearing Surface**

This analysis is provided as some prostheses are combined with a variety of bearing surfaces. All bearing surfaces used with this combination are listed.

Table 7: Revised Number of Score (class)/Score (ctd) Primary Total Knee Replacement by Bearing Surface

Bearing Surface	N Revised	N Total
Non XLPE	135	1679
TOTAL	135	1679

TABLE 8**Revision Rates of Score (class)/Score (ctd) Primary Total Knee Replacement by Bearing Mobility**

This analysis is provided as some prostheses are combined with a variety of bearing mobilities. All bearing mobilities used with this combination are listed.

Table 8: Revised Number of Score (class)/Score (ctd) Primary Total Knee Replacement by Bearing Mobility

Bearing Mobility	N Revised	N Total
Rotating	135	1679
TOTAL	135	1679

TABLE 9**Revision Rates of Score (class)/Score (ctd) Primary Total Knee Replacement by Stability**

This analysis is provided as some prostheses are combined with a variety of stabilities. All stabilities used with this combination are listed.

Table 9: Revised Number of Score (class)/Score (ctd) Primary Total Knee Replacement by Stability

Stability	N Revised	N Total
Minimally Stabilised	135	1679
TOTAL	135	1679

TABLE 10

Revision Rates of Primary Total Knee Replacement by State

This enables a state by state variation to be identified for the Score (cless)/Score (ctd) total knee combination and provides the comparative data for each of the states for all other total knee prostheses.

The purpose of this analysis is to determine if the higher than anticipated rate of revision has widespread distribution between states. If there is widespread distribution then the reason for the higher than anticipated rate of revision is unlikely to be surgeon specific. If the prosthesis has been used in only a small number of states it is not possible to distinguish if the higher than anticipated rate of revision is related to the prosthesis, surgeon, technique or patient.

Table 10: Revised Number of Primary Total Knee Replacement by State

Component	State	N Revised	N Total
Score (cless)/Score (ctd)	NSW	8	189
	QLD	0	26
	WA	29	599
	SA	98	865
Other Total Knee	NSW	7542	259308
	VIC	6020	163565
	QLD	5789	167218
	WA	3571	92242
	SA	3122	72249
	TAS	475	15075
	ACT/NT	630	20094
TOTAL		27284	791430

Note: Prostheses no longer used in 2025 are excluded from the comparator.

TABLE 11**Number of Revisions of Score (class)/Score (ctd) Primary Total Knee Replacement by Year of Implant**

This analysis details the number of prostheses reported each year to the Registry for the Score (class)/Score (ctd) total knee combination. It also provides the subsequent number of revisions of the primaries reported in that year.

Primary procedures performed in later years have had less follow up time therefore the number revised is expected to be less than the number revised in earlier years. For example, a primary procedure performed in 2025 has a maximum of one year to be revised, whereas a primary procedure performed in 2023 has a maximum of three years to be revised.

Table 11: Number of Revisions of Score (class)/Score (ctd) Primary Total Knee Replacement by Year of Implant

Year of Implant	Number Revised	Total Number
2004	1	3
2007	0	3
2008	0	3
2009	0	3
2011	0	5
2012	3	15
2013	5	90
2014	19	181
2015	26	324
2016	29	300
2017	35	267
2018	6	122
2019	8	205
2020	2	114
2021	1	44
TOTAL	135	1679

TABLE 12

Revision Rates of Score (cless)/Score (ctd) Primary Total Knee Replacement by Catalogue Number Range

Many prostheses have a number of catalogue ranges. The catalogue range is specific to particular design features; more than one catalogue range usually indicates a minor difference in design in a particular Score (cless)/Score (ctd) prosthesis.

This analysis has been undertaken to determine if the revision rate varies according to the catalogue number range.

Model	Catalogue Range	Catalogue Description	Cement	Material	Coating
Femoral					
Score	10200101-10200117	COCR MIN STAB. HA PEGGED STIPPLED SURFACE FEMORAL COMPONENT	NO	METAL	HA COATED
Tibial					
Score	10200501-10200507	COCR POLISHED TIBIAL BASEPLATE	YES		

Table 12: Revised Number of Score (cless)/Score (ctd) Primary Total Knee Replacement by Catalogue Number Range

Femoral Range	Tibial Range	N Revised	N Total
10200101-10200117	10200501-10200507	135	1679
TOTAL		135	1679