
Prostheses used in hip and knee replacement procedures



National Joint Registry
www.njrcentre.org.uk

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1 Prostheses Used in Hip Procedures

In 2007, 129 different brands of acetabular cups and 144 different brands of femoral stems were used and recorded in the NJR. The total number of acetabular Cups listed is 165 and 187 different brands of femoral stem: an increase of 7% over 2006 for both stems and cups. This was a result of new suppliers entering the market, the introduction of new brands by existing suppliers and/or improved reporting.

1.1 Background

In the NJR 2nd Annual Report of 2004 (pages 86 – 92 available on NJR website www.njrcentre.org), a full description was given of the National Institute for Health and Clinical Excellence (NICE) guidance on the selection of prostheses for primary total hip replacement and hip resurfacing arthroplasty, and the subsequent setting up of the Orthopaedic Data Evaluation Panel (ODEP).

ODEP's main function is to provide an independent assessment of the clinical outcomes data, submitted by manufacturers of prostheses, on the compliance of brands of total hip and hip resurfacing prostheses, with the NICE benchmarks for the effectiveness of primary total hip prostheses. ODEP produced criteria for assessing compliance of products with the NICE guidance.

NICE has indicated that the situation will be reviewed in 2008.

1.2 Results of ODEP assessments

The ODEP committee reviewed the clinical data submissions and as a result, 59 (46%) brands of femoral stems and 51 (46%) brands of acetabular cups used in primary procedures received ODEP ratings. There are however, 47 (43%) brands of acetabular cup and 59 (46%) brands of femoral stem currently being used in England and Wales for which no data has been submitted to the ODEP committee. The latest listings for all brands currently being used by hospitals in England and Wales can be seen by visiting the ODEP website on www.supplychain.nhs.uk/

1.3 Analysis of results

Analysis of the summary data shows that the usage of products in primary procedures meeting the full ten year (10A) benchmark as recommended by NICE is as follows:

- Cemented Stems: 69.9% (made up of 14 brands out of 66 recorded on NJR)
- Cementless Stems: 74.8% (made up 9 brands out of 63 recorded on NJR)
- Cemented Cups: 52.5% (made up 11 brands out of 50 recorded on NJR)
- Cementless Cups: 16.1% (made up 4 brands out of 60 recorded on NJR).

These percentages are only based on clinical outcomes data already submitted to the ODEP committee. Manufacturers may submit additional data that could result in these percentages being revised in the future.

Comparison with the 2006 figures shows that the usage of cemented and cementless stems fully compliant with NICE guidelines is similar to 2007, but there has been an increase of approximately 10% in the usage of fully compliant cemented and cementless cups.

1.4 Brand sales of conventional total hips and resurfacing prostheses

Tables 5 – 10 show the most frequently used brands in England and Wales during 2007, as assessed by their rate of entry into NJR. The level of assessment according to ODEP criteria is given in the final column. The tables have been split into two tables this year to show brand usage in primary procedures and revision procedures separately.

Table 10 provides a summary of procedures where brands of re-surfacing acetabular cups have been used in combination with a conventional stem and a large metal on metal femoral head. This represents a 35% increase on last year.

1.5 Combinations of cups and stems

For 54,642 hip replacement procedures in the 2007 data, both the cup and stem brand were known, and a total of 856 different combinations of cup and stem brands were recorded. This represents a 10% decrease over 2006. The combinations entered into the NJR are listed in Table 11(a) and (b). These tables show Primary and Revision cup-stem combinations. 654 Cup stem combinations were used in primary procedures and 416 used in revision procedures. The most common cup-stem combination was the Exeter V40 stem combined with the Contemporary Duration cup for primary procedures and the Exeter V40 stem combined with the Trident cup for revision procedures.

Highlighted in the Tables are those combinations where the stem manufacturer is different from the cup manufacturer – a practice known as ‘mixing and matching’. Of the 54,642 procedures included in this chapter, 10,622 (20%) used ‘mixed and matched’ cup-stem combinations, approximately 2% fewer than in 2006.

1.6 Femoral head material and size

Table 1 shows the relative usage of different femoral head. The figures are very similar to those in the previous 3 years and demonstrate that there has been no change in surgical practice.

Table 1 Frequency of material chosen for femoral heads in procedures performed in 2007

Material	Number of procedures	
	53,269	
Metal	40,032	75%
Alumina	12,923	24%
Zircon	314	1%

Table 2 shows the frequency of the different femoral head sizes. The main change compared with 2006 is an increase in the use of heads classified as ‘Other’ size and an increase in the use of 36mm heads for metal on metal articulations. Less than 4% of these ‘Other’ sized heads were implanted with a resurfacing cup.

Table 2 Frequency of femoral head sizes for procedures performed in 2007

Head Size	Number of procedures	
	53,278	
22.25mm	1,340	3%
26.00mm	2,587	5%
28.00mm	33,924	64%
32.00mm	7,203	14%
Other size	8,224	15%

1.7 Summary

The total number of brands of acetabular cups and femoral stems recorded in NJR has increased significantly. There are 165 brands of acetabular cups (88 in 2004, 110 in 2005, and 155 in 2006) and 187 brands of femoral stems (101 in 2004, 129 in 2005, and 176 in 2006).

In addition to conventional re-surfacing procedures, there have been almost 3,866 procedures entered into the NJR whereby a re-surfacing cup has been used in conjunction with a large modular head and a conventional stem. Material of femoral heads used in 2007 is very similar to 2004. However, the size of femoral heads used shows an increase in the larger head sizes, ‘other head sizes’ and 32mm.

2 Prostheses Used in Knee Procedures

2.1 Prostheses entered into the NJR

48 brands of total condylar knee prostheses were used and recorded in NJR. All were used in primary procedures and 29 used in revision procedures. There are 65 brands available for selection (20% increase on available brands in 2006). In addition, there were 15 brands of unicompartmental prostheses, 9 brands of patello-femoral replacement prostheses and 14 brands of hinged prostheses. The number of brands for each prosthesis type increased slightly compared with 2006.

Table 12(a) and 12(b) shows the brands of primary and revision total condylar knee replacement prostheses recorded most frequently for TKR and hybrid procedures.

Brands of unicondylar prostheses are shown in Table 13. Nine brands of patello-femoral joint replacements were entered into the NJR in 2007 (Table 14). Brands of hinged prostheses entered on NJR are shown in Table 15.

2.2 Usage of fixed versus mobile bearing tibial inserts

Tibial inserts recorded in total condylar procedures were predominantly fixed bearing 87% (53,570), of all procedures using tibial inserts (an increase of 2% on 2006), compared with 13% (8,268) involving mobile bearing tibial inserts, as shown in Table 3.

Table 3 Tibial Insert Type 2007

Tibial Insert Type	Knee procedures	
	61,838	
Fixed Bearing	53,570	87%
Mobile Bearing	8,268	13%

3 Cement Use

The majority (93%) of procedures involving cement used antibiotic-loaded rather than non antibiotic (Table 4), virtually the same as the last three years.

Manufacturers of antibiotic-loaded cement and non-antibiotic cement are given in Tables 16 and 17. More than one packet of cement could be entered for a particular procedure. For knee procedures, between one and eight packets were entered for a single procedure. For hip procedures, up to 10 packets were entered.

Table 4 Type of cement used in hip and knee replacement procedure cement entered into NJR in 2007

Cement Type	Hip procedures		Knee procedures		All Procedures	
	42,376		62,516		104,892	
Antibiotic	37,695	89%	59,433	95%	97,128	93%
Non Antibiotic	4,681	11%	3,083	5%	7,764	7%

4 Bone Substitute Use

Table 18 lists the manufacturers of bone substitutes for hip and knee procedures in 2007. Although the use of synthetic bone substitute remained relatively low, such products were reported as being used in 575 procedures during 2007, nearly 16% more than 2006 and almost four times as many as in 2004.

One or two units of bone substitute were recorded for a single knee procedure, whilst up to six packets were entered for a hip procedure.

Table 5(a) Cemented cup brands entered during 2007 for primary hip replacements

Manufacturer	Brand	Total Components		ODEP Rating
		25,430		
Stryker Howmedica Osteonics	CONTEMPORARY	6,769	27%	5A
DePuy	ELITE PLUS OGEE	3,878	15%	10A
DePuy	ELITE PLUS CEMENTED CUP	2,408	9%	10A
Stryker Howmedica Osteonics	EXETER DURATION	1,916	8%	10A
DePuy	CHARNLEY OGEE	1,563	6%	10A
DePuy	CHARNLEY CEMENTED CUP	1,557	6%	10A
Zimmer	ZCA	1,187	5%	10A
Smith & Nephew	OPERA	1,005	4%	5B
Zimmer	LOW PROFILE MULLER	876	3%	unclassified
Biomet	STANMORE-ARCOM	533	2%	10A
Corin	CENATOR CEMENTED CUP	380	1%	3A
Biomet	APOLLO	366	1%	pre-entry
DePuy	ULTIMA CEMENTED CUP	366	1%	7A
Biomet	M2A CEMENTED CUP	319	1%	pre-entry
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	279	1%	10B
Biomet	ARCOM SHP	235	1%	5B
Stryker Howmedica Osteonics	ODC	213	1%	unclassified
Zimmer	ZIMMER CEMENTED CUP	209	1%	7B
DePuy	WROBLESKI GOLF BALL	207	1%	3B
Smith & Nephew	REFLECTION CEMENTED	100	<0.0%	10A
Mathys Orthopaedics Ltd	CCB MATHYS	94	<0.0%	10A
Smith & Nephew	SP3	93	<0.0%	unclassified
Waldemar Link	INTERPLANTA	91	<0.0%	10A
B Braun / Aesculap	CHIRULEN	82	<0.0%	unclassified
DePuy	WROBLEWSKI ANGLE BORE SOCKET	74	<0.0%	7B
Zimmer	METASUL-WEBER	72	<0.0%	3A
Waldemar Link	LINK FLANGE CUP	72	<0.0%	unclassified
Ortho-ID	POLAR CEMENTED CUP	69	<0.0%	unclassified
Zimmer	CENTERPULSE MULLER	67	<0.0%	unclassified
Smith & Nephew	PE-PLUS	65	<0.0%	10C
Biomet	CMK CEMENTED CUP	47	<0.0%	unclassified
Implants International	EDINBURGH CUP	41	<0.0%	unclassified
Biomet	BIOMET MULLER	30	<0.0%	5B

Manufacturer	Brand	Total Components		ODEP Rating
Corin	HI-NEK CEMENTED CUP	29	<0.0%	unclassified
Implants International	CCB	28	<0.0%	unclassified
Zimmer	METASUL-MULLER	27	<0.0%	unclassified
Waldemar Link	SNAP FIT	21	<0.0%	unclassified
Stryker Howmedica Osteonics	EXETER CEMENTED CUP	19	<0.0%	10A
Zimmer	SPC	14	<0.0%	unclassified
Biomet	BIOMET BI-POLAR CEMENTED CUP	7	<0.0%	unclassified
Orthodynamics	ORTHODYNAMICS	5	<0.0%	7B
Corin	CTI CEMENTED CUP	4	<0.0%	unclassified
Corin	METALOK CEMENTED CUP	3	<0.0%	unclassified
Sovereign Medical	BICANA CUP	3	<0.0%	unclassified
Medacta UK Ltd	CONE CUP	2	<0.0%	unclassified
B Braun / Aesculap	ALFA CEMENTED CUP	1	<0.0%	unclassified
DePuy	ELITE PLUS FLANGED	1	<0.0%	5B
Sovereign Medical	SOVEREIGN MULLER	1	<0.0%	unclassified
Symbios SA	PE	1	<0.0%	unclassified
Zimmer	HEDROCEL ELLIPTICAL	1	<0.0%	unclassified

Table 5(b) Cemented cup brands entered during 2007 for revision hip replacements

Manufacturer	Brand	Total Components	
		1,479	
DePuy	ELITE PLUS OGEE	298	20%
Stryker Howmedica Osteonics	CONTEMPORARY	250	17%
DePuy	ELITE PLUS CEMENTED CUP	189	13%
Stryker Howmedica Osteonics	EXETER DURATION	126	9%
Zimmer	LOW PROFILE MULLER	63	4%
Smith & Nephew	OPERA	60	4%
DePuy	CHARNLEY CEMENTED CUP	54	4%
DePuy	CHARNLEY OGEE	53	4%
Zimmer	ZCA	45	3%
DePuy	ULTIMA CEMENTED CUP	34	2%
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	30	2%
Zimmer	ZIMMER CEMENTED CUP	30	2%
Corin	CENATOR CEMENTED CUP	29	2%
Biomet	APOLLO	20	1%
Smith & Nephew	REFLECTION CEMENTED	20	1%
Biomet	STANMORE-ARCOM	19	1%
DePuy	WROBLESKI GOLF BALL	19	1%
Stryker Howmedica Osteonics	ODC	17	1%
B Braun / Aesculap	CHIRULEN	13	1%
Implants International	EDINBURGH CUP	13	1%
Stryker Howmedica Osteonics	EXETER CEMENTED CUP	13	1%
DePuy	WROBLEWSKI ANGLE BORE SOCKET	12	1%
Biomet	ARCOM SHP	9	1%
Smith & Nephew	SP3	9	1%
Biomet	M2A CEMENTED CUP	7	<0.0%
Corin	HI-NEK CEMENTED CUP	7	<0.0%
Waldemar Link	INTERPLANTA	7	<0.0%
Biomet	BIOMET MULLER	4	<0.0%
Zimmer	CENTERPULSE MULLER	4	<0.0%
Zimmer	METASUL-MULLER	3	<0.0%
Soverign Medical	BICANA CUP	3	<0.0%
Corin	CTI CEMENTED CUP	2	<0.0%
Smith & Nephew	PE-PLUS	2	<0.0%

Manufacturer	Brand	Total Components	
Mathys Orthopaedics Ltd	CCB MATHYS	2	<0.0%
Van Straten Medical	VAN STRATEN-MULLER	2	<0.0%
Waldemar Link	SNAP FIT	2	<0.0%
Zimmer	HEDROCEL ELLIPTICAL	2	<0.0%
Biomet	BIOMET BI-POLAR CEMENTED CUP	1	<0.0%
Biomet	ETERNITY CEMENTED CUP	1	<0.0%
Corin	METALOK CEMENTED CUP	1	<0.0%
DePuy	ELITE PLUS FLANGED	1	<0.0%
Orthodynamics	ORTHODYNAMICS	1	<0.0%
Ortho-ID	POLAR CEMENTED CUP	1	<0.0%
Soverign Medical	SOVERIEGN MULLER	1	<0.0%

Table 6(a) Cementless cup brands entered during 2006 for primary hip procedures

Manufacturer	Brand	Total Components		ODEP Rating
		26,761		
DePuy	PINNACLE	7,814	29.2%	3A
Stryker Howmedica Osteonics	TRIDENT	5,295	19.8%	3A
Zimmer	TRILOGY	3,785	14.1%	7A
Joint Replacement Instrumentation Ltd	CSF	3,068	11.5%	10A
DePuy	DURALOC CEMENTLESS CUP	986	3.7%	10A
Biomet	EXCEED	918	3.4%	5A
Smith & Nephew	EPF-PLUS	898	3.4%	3A
Smith & Nephew	REFLECTION CEMENTLESS	745	2.8%	7B
Zimmer	ALLOFIT	506	1.9%	5A
Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	446	1.7%	3A
Zimmer	TRABECULAR METAL CEMENTLESS CUP	388	1.4%	pre-entry
B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	279	1.0%	5A
Joint Replacement Instrumentation Ltd	CSF PLUS	247	0.9%	pre-entry
Joint Replacement Instrumentation Ltd	FURLONG THREADED CUP	211	0.8%	10A
Biomet	MALLORY-HEAD CEMENTLESS CUP	196	0.7%	5A
Smith & Nephew	BICON-PLUS	103	0.4%	7A
Wright Medical UK Ltd	ANCAFIT CEMENTLESS CUP	87	0.3%	3A
Smith & Nephew	POLAR CEMENTLESS CUP	73	0.3%	unacceptable
Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	73	0.3%	5A
Wright Medical UK Ltd	LINEAGE	72	0.3%	pre-entry
Surgicraft	SPLIT CUP	65	0.2%	unclassified
Zimmer	CLS CEMENTLESS CUP	54	0.2%	10A
Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	51	0.2%	pre-entry
Waldemar Link	MCMINN	44	0.2%	unclassified
Biomet	RINGLOC	41	0.2%	unclassified
Finsbury	SLF CEMENTLESS CUP (FINSBURY)	40	0.1%	10C
Biomet	ALIZE	34	0.1%	7B
Zimmer	FITMORE	28	0.1%	7B
Corin	DC-FIT	24	0.1%	unclassified
Mathys Orthopaedics Ltd	SELEXYS	22	0.1%	unclassified
Wright Medical UK Ltd	CONSERVE-PLUS	18	0.1%	pre-entry
Mathys Orthopaedics Ltd	SELEXYS PC	15	0.1%	pre-entry
Biomet	UNIVERSAL II	13	<0.0%	unacceptable

Manufacturer	Brand	Total Components		ODEP Rating
DePuy	J-LOC	11	<0.0%	unclassified
Biomet	BIOMEX	10	<0.0%	pre-entry
Biomet	BIHAPRO	9	<0.0%	7B
Biomet	M2A CEMENTLESS CUP	8	<0.0%	pre-entry
DePuy	S-ROM CEMENTLESS CUP	8	<0.0%	3A
Medacta UK Ltd	VERSAFIT	8	<0.0%	pre-entry
Symbios SA	APRIL	8	<0.0%	unclassified
Mathys Orthopaedics Ltd	SELEXYS TH	7	<0.0%	pre-entry
Joint Replacement Instrumentation Ltd	FRF	6	<0.0%	3A
Smith & Nephew	BOFOR	5	<0.0%	unclassified
Mathys Orthopaedics Ltd	RM CEMENTLESS CUP (MATHYS)	5	<0.0%	10B
Orthodynamics	NOVAE STICK	5	<0.0%	unclassified
Wright Medical UK Ltd	PROCOTYL	5	<0.0%	unclassified
Amplitude	SATURNE	4	<0.0%	3B
Wright Medical UK Ltd	MATHYS CEMENTLESS CUP	4	<0.0%	unclassified
Stryker Howmedica Osteonics	Restoration GAP2	3	<0.0%	unclassified
Symbios SA	SYMBIOS HILOCK	3	<0.0%	5B
Orthodynamics	NOVAE SF	2	<0.0%	unclassified
Stryker Howmedica Osteonics	TRITANIUM	2	<0.0%	unclassified
Waldemar Link	PRESSFIT	2	<0.0%	unclassified
Amplitude	INITIALE CEMENTLESS CUP	1	<0.0%	unclassified
Biomet	ETERNITY	1	<0.0%	unclassified
Biomet	RANAWAT/BURSTEIN	1	<0.0%	unclassified
DePuy	OCTOPUS	1	<0.0%	unclassified
Implants International	RM CEMENTLESS CUP (IMPLANT INTERNATIONAL)	1	<0.0%	unclassified
Mathys Orthopaedics Ltd	MONOMESH CEMENTLESS CUP	1	<0.0%	unclassified
Waldemar Link	DAVIS CEMENTLESS CUP	1	<0.0%	unclassified

Table 6(b) Cementless cup brands entered during 2007 for revision hip procedures

Manufacturer	Brand	Total Components	
		3,236	
Stryker Howmedica Osteonics	TRIDENT	824	25.5%
DePuy	PINNACLE	660	20.4%
Zimmer	TRILOGY	521	16.1%
Zimmer	TRABECULAR METAL CEMENTLESS CUP	448	13.8%
Joint Replacement Instrumentation Ltd	CSF	153	4.7%
Smith & Nephew	REFLECTION CEMENTLESS	113	3.5%
Biomet	MALLORY-HEAD CEMENTLESS CUP	74	2.3%
Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	56	1.7%
DePuy	DURALOC CEMENTLESS CUP	46	1.4%
B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	35	1.1%
Wright Medical UK Ltd	PROCOTYL	32	1.0%
Endo Plus (UK) Limited	POLAR CEMENTLESS CUP	28	0.9%
Biomet	EXCEED	20	0.6%
Joint Replacement Instrumentation Ltd	CSF PLUS	19	0.6%
Endo Plus (UK) Limited	EPF-PLUS	17	0.5%
Stryker Howmedica Osteonics	TRITANIUM	16	0.5%
DePuy	S-ROM CEMENTLESS CUP	15	0.5%
Zimmer	ALLOFIT	14	0.4%
Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	14	0.4%
Amplitude	SATURNE	12	0.4%
Biomet	PAR 5 RINOWL CEMENTLESS CUP	12	0.4%
Joint Replacement Instrumentation Ltd	FURLONG THREADED CUP	12	0.4%
Wright Medical UK Ltd	MATHYS CEMENTLESS CUP	11	0.3%
Endo Plus (UK) Limited	BICON-PLUS	10	0.3%
Stryker Howmedica Osteonics	Restoration GAP2	8	0.2%
Waldemar Link	MCMINN	8	0.2%
Orthodynamics	NOVAE STICK	7	0.2%
Surgicraft	SPLIT CUP	6	0.2%
Endo Plus (UK) Limited	BOFOR	5	0.2%
Orthodynamics	NOVAE	5	0.2%
Biomet	RANAWAT/BURSTEIN	4	0.1%
Finsbury	SLF CEMENTLESS CUP (FINSBURY)	4	0.1%

Manufacturer	Brand	Total Components	
Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	3	0.1%
Biomet	BIHAPRO	2	0.1%
Biomet	BIOMEX	2	0.1%
Zimmer	CLS CEMENTLESS CUP	2	0.1%
Corin	DC-FIT	2	0.1%
DePuy	OCTOPUS	2	0.1%
Orthodynamics	NOVAE COPTOS	2	0.1%
Orthodynamics	NOVAE SF	2	0.1%
Wright Medical UK Ltd	ANCAFIT CEMENTLESS CUP	2	0.1%
Wright Medical UK Ltd	LINEAGE	2	0.1%
Biomet	ALIZE	1	<0.0%
Biomet	RINGLOC	1	<0.0%
Zimmer	FITMORE	1	<0.0%
Joint Replacement Instrumentation Ltd	FRF	1	<0.0%
Stanmore Implants Worldwide	SIW	1	<0.0%
Symbios SA	APRIL	1	<0.0%

Table 7(a) Cemented stem brands entered during 2007 for primary hip procedures

Manufacturer	Brand	Total Components		ODEP Rating
		33,991		
Stryker Howmedica Osteonics	EXETER V40	18,524	54.1%	10A
DePuy	C-STEM CEMENTED STEM	3,313	9.7%	10B
Zimmer	CPT	3,160	9.2%	7A
DePuy	CHARNLEY CEMENTED STEM	2,849	8.3%	10A
Biomet	STANMORE MODULAR	945	2.8%	10A
Biomet	TAPERLOC CEMENTED STEM	853	2.5%	unclassified
Biomet	MULLER - BIOMET	452	1.3%	5B
Zimmer	MS-30	449	1.3%	10B
Zimmer	MULLER STR STEM	358	1.0%	10A
Smith & Nephew	CPS-PLUS	314	0.9%	7A
Waldemar Link	SPS11	239	0.7%	10A
Smith & Nephew	CPCS	226	0.7%	pre-entry
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	225	0.7%	10C
DePuy	ELITE PLUS CEMENTED STEM	208	0.6%	10A
Corin	TAPERFIT CEMENTED STEM	200	0.6%	7B
Zimmer	P10 MULLER	166	0.5%	10A
DePuy	CHARNLEY	124	0.4%	5B
Zimmer	VERSYS CEMENTED STEM	115	0.3%	3A
B Braun / Aesculap	CENTRAMENT	109	0.3%	3B
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	109	0.3%	10A
Smith & Nephew	SPECTRON	108	0.3%	10A
Zimmer	MEM	88	0.3%	10A
Stryker Howmedica Osteonics	ACCOLADE CEMENTED	86	0.3%	unclassified
Biomet	BIMETRIC CEMENTED STEM	80	0.2%	10A
Finsbury	ADEPT CEMENTED STEM	69	0.2%	pre-entry
Stryker Howmedica Osteonics	EXETER	58	0.2%	10A
Biomet	CMK CEMENTED STEM	53	0.2%	10C
DePuy	ULTIMA STRAIGHT STEM	53	0.2%	10C
Biomet	MODULAR INTERLOC	50	0.1%	unclassified
Biomet	OLYMPIA	47	0.1%	5B
Implants International	EDINBURGH	37	0.1%	unclassified
Zimmer	ZMR CEMENTED STEM	37	0.1%	unclassified
Corin	HI-NEK CEMENTED STEM	35	0.1%	unclassified

Manufacturer	Brand	Total Components		ODEP Rating
B Braun / Aesculap	METHA CEMENTED	10	<0.0%	unclassified
Centerpulse	REVITAN CEMENTED STEM	10	<0.0%	unclassified
Wright Medical UK Ltd	PROFEMUR CEMENTED STEM	9	<0.0%	pre-entry
Van Straten Medical	CUSTOM DEVICE	6	<0.0%	unclassified
Medacta UK Ltd	CONE	5	<0.0%	unclassified
Waldemar Link	MP NECK CEMENTED STEM	5	<0.0%	unclassified
Van Straten Medical	ECOFIT	3	<0.0%	unclassified
Amplitude	INITIALE CEMENTED STEM	2	<0.0%	unclassified
Biomet	MALLORY-HEAD CEMENTED STEM	2	<0.0%	unclassified
DePuy	ULTIMA TPS STEM	2	<0.0%	5A
Smith & Nephew	SLR-PLUS CEMENTED STEM	2	<0.0%	unclassified
Finsbury	FREEMAN CEMENTED FINSBURY	2	<0.0%	10C
Orthodynamics	LMT	2	<0.0%	7B
Biomet	KENT HIP	1	<0.0%	unclassified
Corin	CENTRAFIX	1	<0.0%	unclassified
DePuy	SILENT CEMENTED STEM	1	<0.0%	unclassified
Exactech (UK) Ltd	ACUMATCH M-SERIES	1	<0.0%	unclassified
Joint Replacement Instrumentation Ltd	FURLONG LOL	1	<0.0%	10C
Mathys Orthopaedics Ltd	TWINSYS CEMENTED STEM	1	<0.0%	pre-entry
Orthodynamics	CANNULOK CEMENTED STEM	1	<0.0%	unclassified
Soverign Medical	SOVERIEGN C	1	<0.0%	unclassified
Stryker Howmedica Osteonics	CUSTOM DEVICE	1	<0.0%	unclassified

Table 7(b) Cemented stem brands entered during 2007 for revision hip procedures

Manufacturer	Brand	Total Components		Procedures Using Femoral Bone graft
		2,342		
Stryker Howmedica Osteonics	EXETER V40	1,118	47.7%	7.2%
Zimmer	ZMR CEMENTED STEM	202	8.6%	11.4%
DePuy	C-STEM CEMENTED STEM	194	8.3%	5.7%
Zimmer	CPT	186	7.9%	5.4%
Centerpulse	REVITAN CEMENTED STEM	68	2.9%	10.3%
Waldemar Link	MP NECK CEMENTED STEM	65	2.8%	6.2%
Corin	OXFORD UNIVERSAL HIP (CORIN) CEMENTED STEM	54	2.3%	70.4%
DePuy	CHARNLEY CEMENTED STEM	47	2.0%	2.1%
Biomet	OXFORD UNIVERSAL HIP (BIOMET) CEMENTED STEM	37	1.6%	13.5%
Biomet	STANMORE MODULAR	29	1.2%	0.0%
Biomet	MULLER - BIOMET	26	1.1%	0.0%
DePuy	ELITE PLUS CEMENTED STEM	26	1.1%	34.6%
DePuy	CHARNLEY	23	1.0%	<0.0%
B Braun / Aesculap	BICONCONTACT CEMENTED STEM	21	0.9%	52.4%
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	19	0.8%	5.3%
Van Straten Medical	CUSTOM DEVICE	19	0.8%	21.1%
Smith & Nephew	CPCS	16	0.7%	<0.0%
Biomet	TAPERLOC CEMENTED STEM	14	0.6%	14.3%
Smith & Nephew	SPECTRON	14	0.6%	<0.0%
Biomet	MALLORY-HEAD CEMENTED STEM	9	0.4%	22.2%
Centerpulse	MS-30	9	0.4%	<0.0%
Zimmer	MS-30	9	0.4%	<0.0%
Corin	TAPERFIT CEMENTED STEM	8	0.3%	<0.0%
Biomet	KENT HIP	7	0.3%	14.3%
Centerpulse	P10 MULLER	7	0.3%	<0.0%
Corin	TRIFIT CEMENTED STEM	7	0.3%	<0.0%
Smith & Nephew	SLR-PLUS CEMENTED STEM	7	0.3%	28.6%
DePuy	ENGAGE	6	0.3%	16.7%
Smith & Nephew	CPS-PLUS	6	0.3%	<0.0%
Finsbury	FREEMAN CEMENTED FINSBURY	6	0.3%	<0.0%

Manufacturer	Brand	Total Components		Procedures Using Femoral Bone graft
B Braun / Aesculap	PREVISION CEMENTED STEM	4	0.2%	25.0%
DePuy	SUMMIT CEMENTED STEM	4	0.2%	<0.0%
Zimmer	VERSYS CEMENTED STEM	4	0.2%	<0.0%
B Braun / Aesculap	EXCIA-CEMENTED	3	0.1%	<0.0%
Biomet	BIMETRIC CEMENTED STEM	3	0.1%	<0.0%
Centerpulse	MULLER STR STEM	3	0.1%	<0.0%
DePuy	ULTIMA STRAIGHT STEM	3	0.1%	<0.0%
Finsbury	ADEPT CEMENTED STEM	3	0.1%	<0.0%
Implants International	EDINBURGH	3	0.1%	<0.0%
Soverign Medical	SOVERIEGN C	3	0.1%	66.7%
Stryker Howmedica Osteonics	ACCOLADE CEMENTED	3	0.1%	<0.0%
Stryker Howmedica Osteonics	GMRS	3	0.1%	<0.0%
Waldemar Link	MEGA SYSTEM	3	0.1%	<0.0%
Biomet	MODULAR INTERLOC	2	0.1%	<0.0%
DePuy	WROBLESKI RESECTION	2	0.1%	<0.0%
Smith & Nephew	SL-PLUS CEMENTED STEM	2	0.1%	<0.0%
Exactech (UK) Ltd	ACUMATCH M-SERIES	2	0.1%	<0.0%
Joint Replacement Instrumentation Ltd	FURLONG LOL	2	0.1%	<0.0%
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	2	0.1%	<0.0%
Stryker Howmedica Osteonics	EXETER	2	0.1%	<0.0%
Van Straten Medical	MUTARS	2	0.1%	<0.0%
B Braun / Aesculap	HUCKSTEP CEMENTED STEM	1	0.0%	100.0%
Biomet	AURA II CEMENTED STEM	1	0.0%	<0.0%
Biomet	OLYMPIA	1	0.0%	<0.0%
Centerpulse	MEM	1	0.0%	<0.0%
DePuy	LPS	1	0.0%	100.0%
DePuy	ULTIMA TPS STEM	1	0.0%	<0.0%
Orthodynamics	CANNULOK CEMENTED STEM	1	0.0%	100.0%
Smith & Nephew	ECHELON CEMENTED STEM	1	0.0%	<0.0%
Wright Medical UK Ltd	PROFEMUR CEMENTED STEM	1	0.0%	<0.0%
Zimmer	WAGNER REVISION STEM	1	0.0%	<0.0%

Table 8(a) Cementless stem brands entered during 2007 for primary hip replacements

Manufacturer	Brand	Total Components		ODEP Rating
		33,991		
DePuy	CORAIL	9,477	44.5%	10A
Joint Replacement Instrumentation Ltd	FURLONG HAC	3,615	17.0%	10A
Stryker Howmedica Osteonics	ACCOLADE	1,584	7.4%	3B
Smith & Nephew	SL-PLUS CEMENTLESS STEM	946	4.4%	10A
Smith & Nephew	SYNERGY CEMENTLESS STEM	766	3.6%	5A
Zimmer	CLS CEMENTLESS STEM	764	3.6%	10A
Biomet	BIMETRIC CEMENTLESS STEM	583	2.7%	10A
Biomet	TAPERLOC CEMENTLESS STEM	476	2.2%	10B
Zimmer	VERSYS CEMENTLESS STEM	476	2.2%	3A
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	406	1.9%	10A
Stryker Howmedica Osteonics	ABG II CEMENTLESS STEM	326	1.5%	5B
DePuy	S-ROM CEMENTLESS STEM	318	1.5%	7B
Smith & Nephew	ANTHOLOGY	236	1.1%	unclassified
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	209	1.0%	pre-entry
DePuy	SUMMIT CEMENTLESS STEM	121	0.6%	3A
Mathys Orthopaedics Ltd	TWINSYS CEMENTLESS STEM	101	0.5%	pre-entry
B Braun / Aesculap	BICONCONTACT CEMENTLESS STEM	99	0.5%	10C
Smith & Nephew	BIRMINGHAM HEAD RESCTION STEM	93	0.4%	unclassified
Waldemar Link	DAVIES CEMENTLESS STEM	84	0.4%	unclassified
Zimmer	ZWEYMULLER	78	0.4%	10A
Finsbury	FREEMAN CEMENTLESS	75	0.4%	10C
Wright Medical UK Ltd	ANCAFIT CEMENTLESS STEM	72	0.3%	3A
DePuy	AML	50	0.2%	10B
Biomet	AURA II CEMENTLESS STEM	36	0.2%	pre-entry
Zimmer	ALLOCLASSIC CEMENTLESS STEM	32	0.2%	10A
Mathys Orthopaedics Ltd	CBC	28	0.1%	pre-entry
B Braun / Aesculap	EXCIA	25	0.1%	3A
Corin	PANATOMIC CEMENTLESS STEM	21	0.1%	unclassified
DePuy	KAR	19	0.1%	unclassified
Corin	PROXIMA	16	0.1%	5A
B Braun / Aesculap	METHA	15	0.1%	unclassified
Zimmer	SL-PLUS CEMENTLESS STEM	14	0.1%	10A

Manufacturer	Brand	Total Components		ODEP Rating
DePuy	PROXIMA	13	0.1%	unclassified
Symbios SA	SPS	12	0.1%	3A
Corin	C FIT	10	<0.0%	unclassified
DePuy	REEF	7	<0.0%	unclassified
Medacta UK Ltd	QUADRA	6	<0.0%	unclassified
Orthodynamics	CANNULOK CEMENTLESS STEM	6	<0.0%	unclassified
Corin	HI-NEK CEMENTLESS STEM	5	<0.0%	unclassified
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	5	<0.0%	unclassified
Biomet	BIHAPRO MK III	4	<0.0%	7B
Zimmer	WAGNER CONE	4	<0.0%	unclassified
DePuy	SOLUTION CEMENTLESS STEM	4	<0.0%	unclassified
Orthodynamics	BRADLEY	4	<0.0%	unclassified
Surgicraft	ESOP	4	<0.0%	unclassified
Symbios SA	SPS HA	4	<0.0%	3A
Biomet	CONELock	3	<0.0%	unclassified
Orthodynamics	SPS HA	3	<0.0%	unclassified
Biomet	ASIAN CEMENTLESS STEM	2	<0.0%	unclassified
Biomet	REACH	2	<0.0%	unclassified
Corin	CERAFIT CEMENTLESS STEM	2	<0.0%	unclassified
Corin	TRIFIT CEMENTLESS STEM	2	<0.0%	unclassified
Finsbury	LPR	2	<0.0%	unclassified
Stryker Howmedica Osteonics	ABG I CEMENTLESS STEM	2	<0.0%	7A
Waldemar Link	CFP	2	<0.0%	unclassified
Amplitude	INTEGRALE	1	<0.0%	unclassified
DePuy	G2 CEMENTLESS STEM	1	<0.0%	unclassified
DePuy	UNIROM	1	<0.0%	unclassified
Smith & Nephew	ENDOPLUS CEMENTLESS HIP	1	<0.0%	unclassified
Finsbury	LIVERPOOL PROXIMAL	1	<0.0%	unclassified
Smith & Nephew	ECHELON CEMENTLESS STEM	1	<0.0%	unclassified
Smith & Nephew	IMAGE	1	<0.0%	unclassified
Zimmer	KINECTIV	1	<0.0%	unclassified

Table 8(b) Cementless stem brands entered during 2007 for revision hip replacements

Manufacturer	Brand	Total Components		Percentage Using Femoral Bone graft
		1,227		
DePuy	KAR	185	15.1%	20.5%
DePuy	CORAIL	163	13.3%	4.9%
Joint Replacement Instrumentation Ltd	FURLONG HAC	157	12.8%	14.0%
DePuy	SOLUTION CEMENTLESS STEM	116	9.5%	19.0%
DePuy	S-ROM CEMENTLESS STEM	102	8.3%	2.9%
DePuy	REEF	85	6.9%	24.7%
Smith & Nephew	ECHELON CEMENTLESS STEM	61	5.0%	9.8%
Smith & Nephew	SYNERGY CEMENTLESS STEM	60	4.9%	<0.0%
Orthodynamics	CANNULOK CEMENTLESS STEM	47	3.8%	12.8%
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	31	2.5%	16.1%
Smith & Nephew	SL-PLUS CEMENTLESS STEM	29	2.4%	<0.0%
Biomet	BIMETRIC CEMENTLESS STEM	22	1.8%	4.5%
Stryker Howmedica Osteonics	ACCOLADE	21	1.7%	4.8%
Biomet	CONELock	15	1.2%	20.0%
Zimmer	CLS CEMENTLESS STEM	15	1.2%	<0.0%
Biomet	TAPERLOC CEMENTLESS STEM	12	1.0%	8.3%
Mathys Orthopaedics Ltd	TWINSYS CEMENTLESS STEM	12	1.0%	<0.0%
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	12	1.0%	<0.0%
Biomet	REACH	10	0.8%	10.0%
Zimmer	ZWEYMULLER	10	0.8%	<0.0%
Zimmer	VERSYS CEMENTLESS STEM	10	0.8%	<0.0%
Smith & Nephew	ANTHOLOGY	9	0.7%	<0.0%
Zimmer	CLS CEMENTLESS STEM	15	0.7%	6.7%
Finsbury	FREEMAN CEMENTLESS	7	0.6%	<0.0%
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	7	0.6%	<0.0%
B Braun / Aesculap	BICONTACT CEMENTLESS STEM	4	0.3%	<0.0%
DePuy	SUMMIT CEMENTLESS STEM	4	0.3%	<0.0%
B Braun / Aesculap	HUCKSTEP CEMENTLESS STEM	3	0.2%	<0.0%
Biomet	AURA II CEMENTLESS STEM	2	0.2%	<0.0%
Corin	PANATOMIC CEMENTLESS STEM	2	0.2%	<0.0%

Manufacturer	Brand	Total Components		Procedures Using Femoral Bone graft
Corin	TRIFIT CEMENTLESS STEM	2	0.2%	<0.0%
Zimmer	ALLOCLASSIC CEMENTLESS STEM	2	0.2%	<0.0%
B Braun / Aesculap	EXCIA	1	0.1%	<0.0%
Biomet	MALLORY-HEAD CEMENTLESS STEM	1	0.1%	<0.0%
DePuy	PROXIMA	1	0.1%	<0.0%
Mathys Orthopaedics Ltd	CBC	1	0.1%	<0.0%
Stryker Howmedica Osteonics	ABG II CEMENTLESS STEM	1	0.1%	<0.0%
Stryker Howmedica Osteonics	CALCAR REP	1	0.1%	<0.0%
Symbios SA	SPS	1	0.1%	<0.0%
Wright Medical UK Ltd	ANCAFIT CEMENTLESS STEM	1	0.1%	<0.0%
Zimmer	WAGNER CONE	1	0.1%	<0.0%
Zimmer	ZMR CEMENTLESS STEM	1	0.1%	<0.0%

Table 9 Brands of resurfacing heads entered into the NJR in 2007

Manufacturer	Brand	Total Components		ODEP Rating
		6,480		
Smith & Nephew	BHR RESURFACING HEAD	3,032	46.8%	7A
Corin	CORMET 2000 RESURFACING HEAD	873	13.5%	3A
DePuy	ASR RESURFACING HEAD	766	11.8%	pre-entry
Finsbury	ADEPT RESURFACING HEAD	580	9.0%	pre-entry
Wright Medical UK Ltd	CONSERVE	393	6.1%	3A
Zimmer	DUROM RESURFACING HEAD	356	5.4%	pre-entry
Biomet	RECAP RESURFACING HEAD	312	4.8%	pre-entry
Stryker Howmedica Osteonics	MITCH TRH	116	1.8%	pre-entry
Van Straten Medical	ACCIS RESURFACING HEAD	49	0.8%	unclassified
Tricon/Medacta	CORNWALL RESURFACING HEAD	3	<0.0%	pre-entry

Table 10 Procedures using a resurfacing cup with conventional stem in 2007

Manufacturer	Brand	Total Components	
		3,866	
DePuy	ASR RESURFACING CUP	1,075	27.8%
Smith & Nephew	BHR RESURFACING CUP	844	21.8%
Biomet	RECAP RESURFACING CUP	587	15.2%
Finsbury	ADEPT RESURFACING CUP	448	11.6%
Zimmer	DUROM RESURFACING CUP	443	11.5%
Corin	CORMET 2000 RESURFACING CUP	250	6.5%
Stryker Howmedica Osteonics	MITCH TRH CUP	154	4.0%
Wright Medical UK Ltd	CONSERVE PLUS CUP	59	1.5%
Symbios SA	SYMBIOS	5	0.1%
ImplantCast	ACCIS RESURFACING CUP	1	<0.0%

Table 11(a) Cup-stem combinations in the NJR in 2007 for hip primary procedures

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
				51,134		
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	CONTEMPORARY	6,615	12.9%	No
DePuy	CORAIL	DePuy	PINNACLE	6,551	12.8%	No
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	TRIDENT	3,174	6.2%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	CSF	2,808	5.5%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	ELITE PLUS OGEE	2,174	4.3%	Yes
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	EXETER DURATION	1,880	3.7%	No
Stryker Howmedica Osteonics	ACCOLADE	Stryker Howmedica Osteonics	TRIDENT	1,418	2.8%	No
Stryker Howmedica Osteonics	EXETER V40	Zimmer	TRILOGY	1,314	2.6%	Yes
DePuy	CHARNLEY CEMENTED STEM	DePuy	CHARNLEY CEMENTED CUP	1,294	2.5%	No
DePuy	CHARNLEY CEMENTED STEM	DePuy	CHARNLEY OGEE	1,243	2.4%	No
DePuy	C-STEM CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	1,092	2.1%	No
Zimmer	CPT	Zimmer	TRILOGY	1,083	2.1%	No
Zimmer	CPT	Zimmer	ZCA	1,046	2.0%	No
DePuy	C-STEM CEMENTED STEM	DePuy	ELITE PLUS OGEE	847	1.7%	No
DePuy	CORAIL	DePuy	DURALOC CEMENTLESS CUP	738	1.4%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	ELITE PLUS CEMENTED CUP	686	1.3%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Smith & Nephew	EPF-PLUS	599	1.2%	No
Biomet	STANMORE MODULAR	Biomet	STANMORE-ARCOM	510	1.0%	No
Biomet	TAPERLOC CEMENTED STEM	Biomet	EXCEED	478	0.9%	No
Zimmer	VERSYS CEMENTLESS STEM	Zimmer	TRILOGY	378	0.7%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	REFLECTION CEMENTLESS	350	0.7%	Yes
Zimmer	CPT	DePuy	ELITE PLUS OGEE	349	0.7%	Yes
DePuy	CORAIL	DePuy	ELITE PLUS CEMENTED CUP	342	0.7%	No
DePuy	C-STEM CEMENTED STEM	DePuy	PINNACLE	340	0.7%	No
DePuy	C-STEM CEMENTED STEM	Smith & Nephew	OPERA	301	0.6%	Yes
Biomet	MULLER - BIOMET	Biomet	APOLLO	291	0.6%	No
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	276	0.5%	No
Zimmer	MULLER STR STEM	Zimmer	LOW PROFILE MULLER	272	0.5%	No
DePuy	CORAIL	DePuy	ELITE PLUS OGEE	270	0.5%	No
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	M2A CEMENTED CUP	266	0.5%	No
Smith & Nephew	SYNERGY CEMENTLESS STEM	Smith & Nephew	REFLECTION CEMENTLESS	258	0.5%	No
Zimmer	CLS CEMENTLESS STEM	Zimmer	ALLOFIT	250	0.5%	No
DePuy	CORAIL	Zimmer	TRILOGY	244	0.5%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	CSF PLUS	240	0.5%	No
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	OPERA	238	0.5%	Yes
Stryker Howmedica Osteonics	EXETER V40	DePuy	PINNACLE	222	0.4%	Yes
Biomet	TAPERLOC CEMENTLESS STEM	Biomet	EXCEED	214	0.4%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	FURLONG THREADED CUP	214	0.4%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	ULTIMA CEMENTED CUP	210	0.4%	Yes
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	210	0.4%	No
Stryker Howmedica Osteonics	EXETER V40	Corin	CENATOR CEMENTED CUP	202	0.4%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	CHARNLEY CEMENTED STEM	Smith & Nephew	OPERA	197	0.4%	Yes
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Stryker Howmedica Osteonics	ODC	192	0.4%	No
DePuy	S-ROM CEMENTED STEM	DePuy	PINNACLE	189	0.4%	No
Zimmer	MS-30	Zimmer	LOW PROFILE MULLER	185	0.3%	No
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	174	0.3%	No
Stryker Howmedica Osteonics	ABG II CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	166	0.3%	No
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	EPF-PLUS	150	0.3%	Yes
Stryker Howmedica Osteonics	ABG II CEMENTLESS STEM	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	150	0.3%	No
DePuy	C-STEM CEMENTED STEM	DePuy	WROBLESKI GOLF BALL	146	0.3%	No
DePuy	C-STEM CEMENTED STEM	DePuy	CHARNLEY OGEE	142	0.3%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	CHARNLEY CEMENTED CUP	141	0.3%	Yes
Zimmer	CPT	Zimmer	TRABECULAR METAL CEMENTLESS CUP	131	0.3%	No
Biomet	MULLER - BIOMET	Zimmer	LOW PROFILE MULLER	130	0.3%	Yes
Zimmer	P10 MULLER	Zimmer	LOW PROFILE MULLER	126	0.2%	No
Zimmer	CLS CEMENTLESS STEM	Zimmer	TRILOGY	124	0.2%	No
Biomet	STANMORE MODULAR	Biomet	ARCOM SHP	118	0.2%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	CHARNLEY OGEE	117	0.2%	Yes
Zimmer	CPT	Smith & Nephew	OPERA	108	0.2%	Yes
Smith & Nephew	CPS-PLUS	Corin	CENATOR CEMENTED CUP	103	0.2%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Smith & Nephew	BICON-PLUS	102	0.2%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
B Braun / Aesculap	BICONCONTACT CEMENTLESS STEM	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	99	0.2%	No
Stryker Howmedica Osteonics	EXETER V40	Biomet	EXCEED	99	0.2%	Yes
Biomet	STANMORE MODULAR	DePuy	ELITE PLUS CEMENTED CUP	96	0.2%	Yes
Zimmer	MS-30	Zimmer	ALLOFIT	90	0.2%	No
Zimmer	MEM	Zimmer	LOW PROFILE MULLER	87	0.2%	No
Waldemar Link	SP112	Waldemar Link	INTERPLANTA	85	0.2%	No
DePuy	C-STEM CEMENTED STEM	Zimmer	TRILOGY	84	0.2%	Yes
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	82	0.2%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Zimmer	TRILOGY	81	0.2%	Yes
Stryker Howmedica Osteonics	ACCOLADE CEMENTED	Stryker Howmedica Osteonics	TRIDENT	79	0.2%	No
Zimmer	CPT	Zimmer	ALLOFIT	79	0.2%	No
DePuy	ELITE PLUS CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	78	0.2%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	DURALOC CEMENTLESS CUP	75	0.1%	Yes
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	Mathys Orthopaedics Ltd	CCB MATHYS	73	0.1%	No
Zimmer	MS-30	Zimmer	METASUL-WEBER	73	0.1%	No
Stryker Howmedica Osteonics	EXETER V40	Zimmer	TRABECULAR METAL CEMENTLESS CUP	72	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Zimmer	ZIMMER CEMENTED CUP	72	0.1%	Yes
DePuy	C-STEM CEMENTED STEM	DePuy	CHARNLEY CEMENTED CUP	71	0.1%	No
DePuy	SUMMIT CEMENTLESS STEM	DePuy	PINNACLE	70	0.1%	No
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Wright Medical UK Ltd	ANCAFIT CEMENTLESS CUP	70	0.1%	No
DePuy	CORAIL	Joint Replacement Instrumentation Ltd	CSF	68	0.1%	Yes
B Braun / Aesculap	CENTRAMENT	B Braun / Aesculap	CHIRULEN	65	0.1%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Zimmer	MULLER STR STEM	Zimmer	CENTERPULSE MULLER	64	0.1%	No
DePuy	ELITE PLUS CEMENTED STEM	DePuy	ELITE PLUS OGEE	62	0.1%	No
Smith & Nephew	CPS-PLUS	Smith & Nephew	PE-PLUS	62	0.1%	No
DePuy	C-STEM CEMENTED STEM	Smith & Nephew	POLAR CEMENTLESS CUP	61	0.1%	Yes
Smith & Nephew	CPCS	Smith & Nephew	OPERA	61	0.1%	No
Zimmer	VERSYS CEMENTED STEM	Zimmer	TRILOGY	60	0.1%	No
DePuy	CHARNLEY CEMENTED STEM	DePuy	WROBLEWSKI ANGLE BORE SOCKET	56	0.1%	No
DePuy	C-STEM CEMENTED STEM	Ortho-ID	POLAR CEMENTED CUP	56	0.1%	Yes
Smith & Nephew	SYNERGY CEMENTLESS STEM	Zimmer	TRILOGY	56	0.1%	Yes
Zimmer	CLS CEMENTLESS STEM	Zimmer	CLS CEMENTLESS CUP	54	0.1%	No
Waldemar Link	SP112	Waldemar Link	LINK FLANGE CUP	52	0.1%	No
Smith & Nephew	CPS-PLUS	Smith & Nephew	EPF-PLUS	51	0.1%	No
Corin	TAPERFIT CEMENTED STEM	Zimmer	ZIMMER CEMENTED CUP	50	0.1%	Yes
Zimmer	CPT	Biomet	EXCEED	49	0.1%	Yes
DePuy	CHARNLEY	DePuy	ELITE PLUS CEMENTED CUP	49	0.1%	No
Zimmer	VERSYS CEMENTED STEM	Zimmer	ZCA	49	0.1%	No
Biomet	BIMETRIC CEMENTED STEM	Biomet	ARCOM SHP	47	0.1%	No
Biomet	CMK CEMENTED STEM	Biomet	CMK CEMENTED CUP	47	0.1%	No
Stryker Howmedica Osteonics	EXETER V40	Joint Replacement Instrumentation Ltd	CSF	47	0.1%	Yes
Smith & Nephew	SPECTRON	Smith & Nephew	REFLECTION CEMENTED	46	0.1%	No
Smith & Nephew	CPS-PLUS	Smith & Nephew	OPERA	45	0.1%	No
Wright Medical UK Ltd	ANCAFIT CEMENTLESS STEM	Wright Medical UK Ltd	LINEAGE	45	0.1%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Stryker Howmedica Osteonics	EXETER V40	Zimmer	ZCA	45	0.1%	Yes
Smith & Nephew	ANTHOLOGY	Smith & Nephew	REFLECTION CEMENTLESS	44	0.1%	No
DePuy	ULTIMA STRAIGHT STEM	DePuy	ULTIMA CEMENTED CUP	43	0.1%	No
Stryker Howmedica Osteonics	EXETER V40	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	42	0.1%	Yes
DePuy	CHARNLEY CEMENTED STEM	DePuy	WROBLESKI GOLF BALL	42	0.1%	No
Smith & Nephew	CPCS	Smith & Nephew	REFLECTION CEMENTLESS	42	0.1%	No
Smith & Nephew	SYNERGY CEMENTLESS STEM	Smith & Nephew	SP3	42	0.1%	No
Corin	TAPERFIT CEMENTED STEM	Surgicraft	SPLIT CUP	42	0.1%	Yes
Waldemar Link	DAVIES CEMENTLESS STEM	Waldemar Link	MCMINN	42	0.1%	No
Biomet	STANMORE MODULAR	Zimmer	TRILOGY	41	0.1%	Yes
DePuy	S-ROM CEMENTLESS STEM	DePuy	PINNACLE	40	0.1%	No
Waldemar Link	DAVIES CEMENTLESS STEM	Smith & Nephew	EPF-PLUS	40	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	SP3	39	0.1%	Yes
B Braun / Aesculap	CENTRAMENT	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	38	0.1%	No
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	EXCEED	38	0.1%	No
Finsbury	FREEMAN CEMENTLESS	Finsbury	SLF CEMENTLESS CUP (FINSBURY)	38	0.1%	No
DePuy	C-STEM CEMENTED STEM	DePuy	ULTIMA CEMENTED CUP	37	0.1%	No
Zimmer	CPT	Zimmer	LOW PROFILE MULLER	37	0.1%	No
DePuy	CORAIL	Zimmer	ZIMMER CEMENTED CUP	36	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	35	0.1%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Implants International	EDINBURGH	Implants International	EDINBURGH CUP	34	0.1%	No
Biomet	TAPERLOC CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	33	0.1%	Yes
DePuy	C-STEM CEMENTED STEM	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	32	0.1%	Yes
Biomet	TAPERLOC CEMENTLESS STEM	Biomet	M2A CEMENTED CUP	32	0.1%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	32	0.1%	No
Biomet	TAPERLOC CEMENTED STEM	Biomet	ARCOM SHP	31	0.1%	No
Biomet	OLYMPIA	DePuy	DURALOC CEMENTLESS CUP	31	0.1%	Yes
Biomet	MODULAR INTERLOC	Biomet	BIOMET MULLER	28	0.1%	No
Biomet	TAPERLOC CEMENTED STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	28	0.1%	No
Corin	TAPERFIT CEMENTED STEM	Corin	GENATOR CEMENTED CUP	28	0.1%	No
Zimmer	MS-30	Zimmer	FITMORE	28	0.1%	No
Biomet	TAPERLOC CEMENTLESS STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	27	0.1%	No
Waldemar Link	SP112	Smith & Nephew	EPF-PLUS	27	0.1%	Yes
Zimmer	MS-30	Zimmer	TRILOGY	27	0.1%	No
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	DePuy	DURALOC CEMENTLESS CUP	26	0.1%	Yes
DePuy	CORAIL	DePuy	ULTIMA CEMENTED CUP	26	0.1%	No
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	Implants International	CCB	26	0.1%	Yes
Smith & Nephew	SPECTRON	Smith & Nephew	REFLECTION CEMENTLESS	26	0.1%	No
Stryker Howmedica Osteonics	EXETER V40	Biomet	MALLORY-HEAD CEMENTLESS CUP	25	<0.0%	Yes
Corin	HI-NEK CEMENTED STEM	Corin	HI-NEK CEMENTED CUP	25	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
B Braun / Aesculap	EXCIA	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	24	<0.0%	No
Biomet	BIMETRIC CEMENTED STEM	Biomet	APOLLO	24	<0.0%	No
Biomet	TAPERLOC CEMENTED STEM	Biomet	RINGLOC	24	<0.0%	No
Corin	TAPERFIT CEMENTED STEM	Smith & Nephew	REFLECTION CEMENTED	24	<0.0%	Yes
DePuy	SUMMIT CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	23	<0.0%	No
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	23	<0.0%	Yes
DePuy	CORAIL	Stryker Howmedica Osteonics	CONTEMPORARY	23	<0.0%	Yes
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	23	<0.0%	No
Stryker Howmedica Osteonics	EXETER	Stryker Howmedica Osteonics	TRIDENT	23	<0.0%	No
Zimmer	CLS CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	23	<0.0%	No
Zimmer	ZWEYMULLER	Zimmer	TRILOGY	23	<0.0%	No
Biomet	AURA II CEMENTLESS STEM	Biomet	ALIZE	22	<0.0%	No
DePuy	ELITE PLUS CEMENTED STEM	DePuy	CHARNLEY CEMENTED CUP	22	<0.0%	No
DePuy	CHARNLEY	DePuy	CHARNLEY OGEE	22	<0.0%	No
Zimmer	CPT	DePuy	ULTIMA CEMENTED CUP	22	<0.0%	Yes
Waldemar Link	SP112	Joint Replacement Instrumentation Ltd	CSF	22	<0.0%	Yes
Biomet	STANMORE MODULAR	Biomet	EXCEED	21	<0.0%	No
Corin	PANATOMIC CEMENTLESS STEM	Corin	DC-FIT	21	<0.0%	No
DePuy	AML	DePuy	ELITE PLUS CEMENTED CUP	21	<0.0%	No
Mathys Orthopaedics Ltd	CBC	Mathys Orthopaedics Ltd	SELEXYS	21	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Zimmer	CPT	Stryker Howmedica Osteonics	TRIDENT	21	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Wright Medical UK Ltd	LINEAGE	21	<0.0%	No
DePuy	CORAIL	Zimmer	TRABECULAR METAL CEMENTLESS CUP	21	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	21	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Zimmer	TRILOGY	21	<0.0%	Yes
Zimmer	VERSYS HERITAGE	Zimmer	TRILOGY	21	<0.0%	No
DePuy	CHARNLEY	Zimmer	TRILOGY	20	<0.0%	Yes
Biomet	MODULAR INTERLOC	Biomet	ARCOM SHP	19	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	DePuy	ELITE PLUS OGEE	19	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	19	<0.0%	Yes
Zimmer	CLS CEMENTLESS STEM	Zimmer	ZIMMER CEMENTED CUP	19	<0.0%	No
DePuy	CORAIL	Smith & Nephew	OPERA	18	<0.0%	Yes
Smith & Nephew	SPECTRON	Smith & Nephew	OPERA	18	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	EXETER CEMENTED CUP	18	<0.0%	No
Stryker Howmedica Osteonics	ACCOLADE	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	18	<0.0%	No
Zimmer	P10 MULLER	Zimmer	METASUL-MULLER	18	<0.0%	No
Biomet	MULLER - BIOMET	DePuy	PINNACLE	17	<0.0%	Yes
Zimmer	VERSYS CEMENTLESS STEM	Zimmer	ALLOFIT	17	<0.0%	No
Zimmer	P10 MULLER	Zimmer	ALLOFIT	16	<0.0%	No
DePuy	AML	Smith & Nephew	OPERA	15	<0.0%	Yes
Zimmer	THRUST PLATE	Zimmer	ALLOFIT	15	<0.0%	No
Biomet	STANMORE MODULAR	Biomet	M2A CEMENTED CUP	14	<0.0%	No
Smith & Nephew	SL-PLUS CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	14	<0.0%	Yes
DePuy	ELITE PLUS CEMENTED STEM	DePuy	PINNACLE	14	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	KAR	DePuy	PINNACLE	14	<0.0%	No
Biomet	MULLER - BIOMET	Mathys Orthopaedics Ltd	CCB MATHYS	14	<0.0%	Yes
Mathys Orthopaedics Ltd	TWINSYS CEMENTLESS STEM	Mathys Orthopaedics Ltd	SELEXYS PC	14	<0.0%	No
Biomet	TAPERLOC CEMENTED STEM	Stryker Howmedica Osteonics	ODC	14	<0.0%	Yes
Zimmer	MS-30	Zimmer	SPC	14	<0.0%	No
Zimmer	ZWEYMULLER	Zimmer	TRABECULAR METAL CEMENTLESS CUP	14	<0.0%	No
Stryker Howmedica Osteonics	ACCOLADE	Zimmer	TRILOGY	14	<0.0%	Yes
Waldemar Link	SP112	Zimmer	TRILOGY	14	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	Zimmer	TRILOGY	14	<0.0%	Yes
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	ARCOM SHP	13	<0.0%	No
Biomet	TAPERLOC CEMENTLESS STEM	Biomet	RINGLOC	13	<0.0%	No
DePuy	ELITE PLUS CEMENTED STEM	DePuy	CHARNLEY OGEE	13	<0.0%	No
DePuy	CHARNLEY	DePuy	ELITE PLUS OGEE	13	<0.0%	No
Biomet	STANMORE MODULAR	DePuy	ELITE PLUS OGEE	13	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	DePuy	WROBLEWSKI ANGLE BORE SOCKET	13	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Surgicraft	SPLIT CUP	13	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Wright Medical UK Ltd	CONSERVE-PLUS	13	<0.0%	No
Zimmer	ZWEYMULLER	Zimmer	ALLOFIT	13	<0.0%	No
Zimmer	ALLOCLASSIC CEMENTLESS STEM	Zimmer	TRILOGY	13	<0.0%	No
B Braun / Aesculap	EXCIA-CEMENTED	B Braun / Aesculap	CHIRULEN	12	<0.0%	No
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	UNIVERSAL II	12	<0.0%	No
DePuy	C-STEM CEMENTED STEM	DePuy	DURALOC CEMENTLESS CUP	12	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	SUMMIT CEMENTED STEM	DePuy	ULTIMA CEMENTED CUP	12	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	REFLECTION CEMENTED	12	<0.0%	Yes
Stryker Howmedica Osteonics	ACCOLADE	Stryker Howmedica Osteonics	CONTEMPORARY	12	<0.0%	No
Waldemar Link	SP112	Waldemar Link	SNAP FIT	12	<0.0%	No
B Braun / Aesculap	BICONCONTACT CEMENTED STEM	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	11	<0.0%	No
Biomet	AURA II CEMENTED STEM	Biomet	ALIZE	11	<0.0%	No
Waldemar Link	SP112	Biomet	STANMORE-ARCOM	11	<0.0%	Yes
Corin	CENATOR CEMENTED STEM	Corin	CENATOR CEMENTED CUP	11	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	DePuy	ELITE PLUS CEMENTED CUP	11	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER	DePuy	ELITE PLUS OGEE	11	<0.0%	Yes
Biomet	STANMORE MODULAR	DePuy	PINNACLE	11	<0.0%	Yes
DePuy	CHARNLEY	DePuy	WROBLESKI GOLF BALL	11	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	11	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Waldemar Link	LINK FLANGE CUP	11	<0.0%	Yes
Wright Medical UK Ltd	ANCAFIT CEMENTLESS STEM	Wright Medical UK Ltd	ANCAFIT CEMENTLESS CUP	11	<0.0%	No
Zimmer	VERSYS CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	11	<0.0%	No
DePuy	C-STEM CEMENTED STEM	Zimmer	ZCA	11	<0.0%	Yes
Biomet	OLYMPIA	Biomet	APOLLO	10	<0.0%	No
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Corin	CENATOR CEMENTED CUP	10	<0.0%	Yes
DePuy	AML	DePuy	DURALOC CEMENTLESS CUP	10	<0.0%	No
Smith & Nephew	SL-PLUS CEMENTLESS STEM	DePuy	ELITE PLUS CEMENTED CUP	10	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Smith & Nephew	ANTHOLOGY	Zimmer	TRABECULAR METAL CEMENTLESS CUP	10	<0.0%	Yes
Zimmer	MS-30	Zimmer	TRABECULAR METAL CEMENTLESS CUP	10	<0.0%	No
Zimmer	ZMR CEMENTED STEM	Zimmer	TRILOGY	10	<0.0%	No
DePuy	CORAIL	Corin	CENATOR CEMENTED CUP	9	<0.0%	Yes
Zimmer	CPT	DePuy	DURALOC CEMENTLESS CUP	9	<0.0%	Yes
Zimmer	CPT	DePuy	PINNACLE	9	<0.0%	Yes
DePuy	CORAIL	Smith & Nephew	POLAR CEMENTLESS CUP	9	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	9	<0.0%	No
Smith & Nephew	CPS-PLUS	Ortho-ID	POLAR CEMENTED CUP	9	<0.0%	Yes
Smith & Nephew	ANTHOLOGY	Smith & Nephew	SP3	9	<0.0%	No
Corin	TAPERFIT CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	9	<0.0%	Yes
Zimmer	CPT	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	9	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	9	<0.0%	Yes
Zimmer	MS-30	Zimmer	METASUL-MULLER	9	<0.0%	No
Biomet	STANMORE MODULAR	Biomet	MALLORY-HEAD CEMENTLESS CUP	8	<0.0%	No
DePuy	ELITE PLUS CEMENTED STEM	DePuy	DURALOC CEMENTLESS CUP	8	<0.0%	No
Waldemar Link	SP112	DePuy	DURALOC CEMENTLESS CUP	8	<0.0%	Yes
Corin	TAPERFIT CEMENTED STEM	DePuy	DURALOC CEMENTLESS CUP	8	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER	DePuy	ELITE PLUS CEMENTED CUP	8	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	DePuy	WROBLESKI GOLF BALL	8	<0.0%	Yes
Zimmer	CPT	Stryker Howmedica Osteonics	CONTEMPORARY	8	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Waldemar Link	SP II CEMENTED STEM	Waldemar Link	SNAP FIT	8	<0.0%	No
Corin	HI-NEK CEMENTED STEM	Zimmer	ALLOFIT	8	<0.0%	Yes
Zimmer	SL-PLUS CEMENTLESS STEM	Zimmer	ALLOFIT	8	<0.0%	No
Smith & Nephew	CPS-PLUS	Zimmer	TRILOGY	8	<0.0%	Yes
B Braun / Aesculap	EXCIA-CEMENTED	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	7	<0.0%	No
Zimmer	MULLER STR STEM	Biomet	APOLLO	7	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Implants International	EDINBURGH CUP	7	<0.0%	Yes
Mathys Orthopaedics Ltd	TWINSYS CEMENTLESS STEM	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	7	<0.0%	No
Smith & Nephew	CPS-PLUS	Stryker Howmedica Osteonics	CONTEMPORARY	7	<0.0%	Yes
Symbios SA	SPS	Symbios SA	APRIL	7	<0.0%	No
Wright Medical UK Ltd	PROFEMUR CEMENTED STEM	Zimmer	TRILOGY	7	<0.0%	Yes
Zimmer	CPT	Zimmer	ZIMMER CEMENTED CUP	7	<0.0%	No
DePuy	C-STEM CEMENTED STEM	Zimmer	ZIMMER CEMENTED CUP	7	<0.0%	Yes
Zimmer	MULLER STR STEM	Zimmer	ZIMMER CEMENTED CUP	7	<0.0%	No
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	BIOMEX	6	<0.0%	No
Biomet	TAPERLOC CEMENTED STEM	Biomet	M2A CEMENTLESS CUP	6	<0.0%	No
DePuy	CHARNLEY CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	6	<0.0%	No
Zimmer	CPT	DePuy	ELITE PLUS CEMENTED CUP	6	<0.0%	Yes
Smith & Nephew	CPS-PLUS	DePuy	ELITE PLUS OGEE	6	<0.0%	Yes
Corin	TAPERFIT CEMENTED STEM	DePuy	ELITE PLUS OGEE	6	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	DePuy	PINNACLE	6	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Joint Replacement Instrumentation Ltd	CSF	6	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	FRF	6	<0.0%	No
Smith & Nephew	CPS-PLUS	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	6	<0.0%	Yes
Mathys Orthopaedics Ltd	TWINSYS CEMENTLESS STEM	Mathys Orthopaedics Ltd	SELEXYS TH	6	<0.0%	No
Medacta UK Ltd	QUADRA	Medacta UK Ltd	VERSAFIT	6	<0.0%	No
Biomet	STANMORE MODULAR	Stryker Howmedica Osteonics	TRIDENT	6	<0.0%	Yes
DePuy	CORAIL	Waldemar Link	LINK FLANGE CUP	6	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Zimmer	LOW PROFILE MULLER	6	<0.0%	Yes
Smith & Nephew	CPCS	Zimmer	TRABECULAR METAL CEMENTLESS CUP	6	<0.0%	Yes
Zimmer	REVITAN CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	6	<0.0%	No
DePuy	ELITE PLUS CEMENTED STEM	Zimmer	TRILOGY	6	<0.0%	Yes
Biomet	BIMETRIC CEMENTED STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	5	<0.0%	No
Zimmer	CPT	Biomet	MALLORY-HEAD CEMENTLESS CUP	5	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Corin	CENATOR CEMENTED CUP	5	<0.0%	Yes
DePuy	PROXIMA	DePuy	PINNACLE	5	<0.0%	No
Zimmer	CPT	Smith & Nephew	REFLECTION CEMENTED	5	<0.0%	Yes
Zimmer	CPT	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	5	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	ODC	5	<0.0%	No
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	5	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Zimmer	ALLOFIT	5	<0.0%	Yes
Zimmer	MAYO CEMENTED STEM	Zimmer	TRILOGY	5	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Biomet	TAPERLOC CEMENTLESS STEM	Zimmer	TRILOGY	5	<0.0%	Yes
DePuy	CORAIL	Zimmer	ZCA	5	<0.0%	Yes
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Zimmer	ZCA	5	<0.0%	Yes
Biomet	BIHAPRO MK III	Biomet	BIHAPRO	4	<0.0%	No
Biomet	TAPERLOC CEMENTED STEM	Biomet	M2A CEMENTED CUP	4	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Biomet	RINGLOC	4	<0.0%	Yes
DePuy	CHARNLEY CEMENTED STEM	Corin	CENATOR CEMENTED CUP	4	<0.0%	Yes
Corin	CTI CEMENTED STEM	Corin	CTI CEMENTED CUP	4	<0.0%	No
DePuy	S-ROM CEMENTLESS STEM	DePuy	DURALOC CEMENTLESS CUP	4	<0.0%	No
Biomet	STANMORE MODULAR	DePuy	DURALOC CEMENTLESS CUP	4	<0.0%	Yes
Zimmer	MS-30	DePuy	ELITE PLUS OGEE	4	<0.0%	Yes
DePuy	SUMMIT CEMENTED STEM	DePuy	PINNACLE	4	<0.0%	No
DePuy	ULTIMA STRAIGHT STEM	DePuy	PINNACLE	4	<0.0%	No
DePuy	C-STEM CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	4	<0.0%	Yes
Biomet	STANMORE MODULAR	Joint Replacement Instrumentation Ltd	CSF	4	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER	Stryker Howmedica Osteonics	CONTEMPORARY	4	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Stryker Howmedica Osteonics	CONTEMPORARY	4	<0.0%	Yes
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	4	<0.0%	No
DePuy	CORAIL	Stryker Howmedica Osteonics	TRIDENT	4	<0.0%	Yes
Surgicraft	ESOP	Surgicraft	SPLIT CUP	4	<0.0%	No
Waldemar Link	SP II CEMENTED STEM	Waldemar Link	INTERPLANTA	4	<0.0%	No
Zimmer	CLS CEMENTLESS STEM	Zimmer	LOW PROFILE MULLER	4	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Orthodynamics	BRADLEY	Zimmer	TRILOGY	4	<0.0%	Yes
Biomet	CMK CEMENTED STEM	Zimmer	TRILOGY	4	<0.0%	Yes
Zimmer	MULLER STR STEM	Zimmer	TRILOGY	4	<0.0%	No
Biomet	CONELOCK	Amplitude	SATURNE	3	<0.0%	Yes
Biomet	AURA II CEMENTLESS STEM	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	3	<0.0%	Yes
DePuy	CORAIL	Biomet	APOLLO	3	<0.0%	Yes
Biomet	MODULAR INTERLOC	Biomet	BIOMET BI-POLAR CEMENTED CUP	3	<0.0%	No
Smith & Nephew	ANTHOLOGY	Biomet	EXCEED	3	<0.0%	Yes
Biomet	BIMETRIC CEMENTED STEM	Biomet	EXCEED	3	<0.0%	No
DePuy	CHARNLEY CEMENTED STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	3	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	3	<0.0%	Yes
DePuy	CHARNLEY	DePuy	CHARNLEY CEMENTED CUP	3	<0.0%	No
Zimmer	CPT	DePuy	CHARNLEY OGEE	3	<0.0%	Yes
Smith & Nephew	SPECTRON	DePuy	DURALOC CEMENTLESS CUP	3	<0.0%	Yes
DePuy	S-ROM CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	3	<0.0%	No
DePuy	ULTIMA STRAIGHT STEM	DePuy	ELITE PLUS CEMENTED CUP	3	<0.0%	No
Orthodynamics	SPS HA	DePuy	ELITE PLUS OGEE	3	<0.0%	Yes
DePuy	S-ROM CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	3	<0.0%	No
Stryker Howmedica Osteonics	EXETER	DePuy	ULTIMA CEMENTED CUP	3	<0.0%	Yes
DePuy	CHARNLEY CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	3	<0.0%	Yes
Smith & Nephew	CPS-PLUS	Joint Replacement Instrumentation Ltd	CSF	3	<0.0%	Yes
DePuy	CORAIL	Joint Replacement Instrumentation Ltd	CSF PLUS	3	<0.0%	Yes
Zimmer	CLS CEMENTLESS STEM	Mathys Orthopaedics Ltd	CCB MATHYS	3	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	CORAIL	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	3	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	3	<0.0%	Yes
Zimmer	MULLER STR STEM	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	3	<0.0%	Yes
Zimmer	P10 MULLER	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	3	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Mathys Orthopaedics Ltd	RM CEMENTLESS CUP (MATHYS)	3	<0.0%	Yes
Zimmer	CPT	Orthodynamics	NOVAE STICK	3	<0.0%	Yes
Zimmer	CPT	Orthodynamics	ORTHODYNAMICS	3	<0.0%	Yes
DePuy	CORAIL	Ortho-ID	POLAR CEMENTED CUP	3	<0.0%	Yes
Zimmer	ALLOCLASSIC CEMENTLESS STEM	Smith & Nephew	OPERA	3	<0.0%	Yes
Biomet	BIMETRIC CEMENTLESS STEM	Smith & Nephew	OPERA	3	<0.0%	Yes
Smith & Nephew	CPS-PLUS	Smith & Nephew	REFLECTION CEMENTED	3	<0.0%	No
Smith & Nephew	SYNERGY CEMENTLESS STEM	Smith & Nephew	REFLECTION CEMENTED	3	<0.0%	No
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Soverign Medical	BICANA CUP	3	<0.0%	Yes
Stryker Howmedica Osteonics	ABG II CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	3	<0.0%	No
DePuy	AML	Stryker Howmedica Osteonics	CONTEMPORARY	3	<0.0%	Yes
Zimmer	CLS CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	3	<0.0%	Yes
Implants International	EDINBURGH	Stryker Howmedica Osteonics	EXETER DURATION	3	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	Restoration GAP2	3	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Stryker Howmedica Osteonics	TRIDENT	3	<0.0%	Yes
Zimmer	CPT	Waldemar Link	INTERPLANTA	3	<0.0%	Yes
Waldemar Link	SP II CEMENTED STEM	Waldemar Link	LINK FLANGE CUP	3	<0.0%	No
Corin	TAPERFIT CEMENTED STEM	Wright Medical UK Ltd	ANCAFIT CEMENTLESS CUP	3	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Stryker Howmedica Osteonics	ACCOLADE	Zimmer	TRABECULAR METAL CEMENTLESS CUP	3	<0.0%	Yes
Zimmer	ALLOCLASSIC CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	3	<0.0%	No
Waldemar Link	MP NECK CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	3	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	3	<0.0%	Yes
Zimmer	ZMR CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	3	<0.0%	No
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	Zimmer	TRILOGY	3	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER	Zimmer	TRILOGY	3	<0.0%	Yes
DePuy	S-ROM CEMENTLESS STEM	Zimmer	TRILOGY	3	<0.0%	Yes
Biomet	OLYMPIA	Zimmer	ZCA	3	<0.0%	Yes
Biomet	AURA II CEMENTLESS STEM	Zimmer	ZIMMER CEMENTED CUP	3	<0.0%	Yes
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	Zimmer	ZIMMER CEMENTED CUP	3	<0.0%	Yes
Smith & Nephew	CPS-PLUS	B Braun / Aesculap	ALFA CEMENTED CUP	2	<0.0%	Yes
Zimmer	P10 MULLER	Biomet	APOLLO	2	<0.0%	Yes
Smith & Nephew	SPECTRON	Biomet	ARCOM SHP	2	<0.0%	Yes
Biomet	STANMORE MODULAR	Biomet	BIHAPRO	2	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Biomet	BIOMEX	2	<0.0%	Yes
Biomet	STANMORE MODULAR	Biomet	BIOMEX	2	<0.0%	No
DePuy	CORAIL	Biomet	EXCEED	2	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Biomet	EXCEED	2	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Corin	CENATOR CEMENTED CUP	2	<0.0%	Yes
Corin	C FIT	Corin	DC-FIT	2	<0.0%	No
Corin	HI-NEK CEMENTED STEM	Corin	METALOK CEMENTED CUP	2	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	CORAIL	DePuy	CHARNLEY OGEE	2	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	DePuy	DURALOC CEMENTLESS CUP	2	<0.0%	Yes
DePuy	S-ROM CEMENTED STEM	DePuy	DURALOC CEMENTLESS CUP	2	<0.0%	No
Zimmer	VERSYS CEMENTED STEM	DePuy	DURALOC CEMENTLESS CUP	2	<0.0%	Yes
DePuy	CHARNLEY CEMENTED STEM	DePuy	ELITE PLUS OGEE	2	<0.0%	No
Biomet	OLYMPIA	DePuy	ELITE PLUS OGEE	2	<0.0%	Yes
Symbios SA	SPS	DePuy	ELITE PLUS OGEE	2	<0.0%	Yes
Stryker Howmedica Osteonics	ABG II CEMENTLESS STEM	DePuy	PINNACLE	2	<0.0%	Yes
Zimmer	CLS CEMENTLESS STEM	DePuy	PINNACLE	2	<0.0%	Yes
DePuy	REEF	DePuy	PINNACLE	2	<0.0%	No
DePuy	SOLUTION CEMENTLESS STEM	DePuy	PINNACLE	2	<0.0%	No
DePuy	S-ROM CEMENTLESS STEM	DePuy	S-ROM CEMENTLESS CUP	2	<0.0%	No
DePuy	ELITE PLUS CEMENTED STEM	DePuy	WROBLEWSKI ANGLE BORE SOCKET	2	<0.0%	No
Corin	CERAFIT CEMENTLESS STEM	Smith & Nephew	EPF-PLUS	2	<0.0%	Yes
Zimmer	CPT	Smith & Nephew	EPF-PLUS	2	<0.0%	Yes
Corin	TAPERFIT CEMENTED STEM	Smith & Nephew	EPF-PLUS	2	<0.0%	Yes
Biomet	TAPERLOC CEMENTLESS STEM	Smith & Nephew	EPF-PLUS	2	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Smith & Nephew	PE-PLUS	2	<0.0%	No
Smith & Nephew	CPS-PLUS	Smith & Nephew	POLAR CEMENTLESS CUP	2	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Joint Replacement Instrumentation Ltd	CSF PLUS	2	<0.0%	Yes
DePuy	CORAIL	Mathys Orthopaedics Ltd	CCB MATHYS	2	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	2	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Medacta UK Ltd	CONE	Medacta UK Ltd	CONE CUP	2	<0.0%	No
Orthodynamics	LMT	Orthodynamics	ORTHODYNAMICS	2	<0.0%	No
Zimmer	ALLOCLASSIC CEMENTLESS STEM	Ortho-ID	POLAR CEMENTED CUP	2	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Smith & Nephew	OPERA	2	<0.0%	Yes
DePuy	CORAIL	Smith & Nephew	REFLECTION CEMENTED	2	<0.0%	Yes
Smith & Nephew	CPCS	Smith & Nephew	REFLECTION CEMENTED	2	<0.0%	No
Biomet	STANMORE MODULAR	Smith & Nephew	REFLECTION CEMENTED	2	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Smith & Nephew	REFLECTION CEMENTLESS	2	<0.0%	Yes
Stryker Howmedica Osteonics	ABG I CEMENTLESS STEM	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	2	<0.0%	No
Biomet	STANMORE MODULAR	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	2	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	2	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	2	<0.0%	Yes
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Stryker Howmedica Osteonics	EXETER DURATION	2	<0.0%	No
Zimmer	CLS CEMENTLESS STEM	Stryker Howmedica Osteonics	ODC	2	<0.0%	Yes
Biomet	MALLORY-HEAD CEMENTED STEM	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	2	<0.0%	Yes
Waldemar Link	SP112	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	2	<0.0%	Yes
DePuy	CHARNLEY CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	2	<0.0%	Yes
Zimmer	MAYO CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	2	<0.0%	Yes
DePuy	S-ROM CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	2	<0.0%	Yes
Stryker Howmedica Osteonics	ACCOLADE	Stryker Howmedica Osteonics	TRITANIUM	2	<0.0%	No
Zimmer	CPT	Surgicraft	SPLIT CUP	2	<0.0%	Yes
Zimmer	VERSYS CEMENTLESS STEM	Surgicraft	SPLIT CUP	2	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Symbios SA	SPS HA	Symbios SA	SYMBIOS HILOCK	2	<0.0%	No
Waldemar Link	CFP	Waldemar Link	PRESSFIT	2	<0.0%	No
Wright Medical UK Ltd	ANCAFIT CEMENTLESS STEM	Wright Medical UK Ltd	CONSERVE-PLUS	2	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Wright Medical UK Ltd	PROCOTYL	2	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Wright Medical UK Ltd	PROCOTYL	2	<0.0%	No
Zimmer	ZMR CEMENTED STEM	Zimmer	ALLOFIT	2	<0.0%	No
DePuy	C-STEM CEMENTED STEM	Zimmer	CENTERPULSE MULLER	2	<0.0%	Yes
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	Zimmer	LOW PROFILE MULLER	2	<0.0%	Yes
DePuy	S-ROM CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	2	<0.0%	Yes
Stryker Howmedica Osteonics	ACCOLADE CEMENTED	Zimmer	TRILOGY	2	<0.0%	Yes
Smith & Nephew	ANTHOLOGY	Zimmer	TRILOGY	2	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Zimmer	ZCA	2	<0.0%	Yes
Biomet	STANMORE MODULAR	Zimmer	ZCA	2	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Amplitude	INITIALE CEMENTLESS CUP	1	<0.0%	Yes
DePuy	SUMMIT CEMENTLESS STEM	Amplitude	SATURNE	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	B Braun / Aesculap	CHIRULEN	1	<0.0%	Yes
DePuy	SOLUTION CEMENTLESS STEM	B Braun / Aesculap	CHIRULEN	1	<0.0%	Yes
Stryker Howmedica Osteonics	ACCOLADE	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	1	<0.0%	Yes
DePuy	CORAIL	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	1	<0.0%	Yes
B Braun / Aesculap	METHA	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	1	<0.0%	No
B Braun / Aesculap	METHA CEMENTED	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	1	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Stryker Howmedica Osteonics	EXETER V40	Biomet	ALIZE	1	<0.0%	Yes
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	Biomet	APOLLO	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Biomet	APOLLO	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Biomet	APOLLO	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	Biomet	APOLLO	1	<0.0%	No
Biomet	TAPERLOC CEMENTLESS STEM	Biomet	APOLLO	1	<0.0%	No
Zimmer	CPT	Biomet	ARCOM SHP	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Biomet	ARCOM SHP	1	<0.0%	Yes
Biomet	REACH	Biomet	ARCOM SHP	1	<0.0%	No
Waldemar Link	SP112	Biomet	ARCOM SHP	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTLESS STEM	Biomet	ARCOM SHP	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Biomet	BIHAPRO	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	Biomet	BIHAPRO	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Biomet	BIOMET BI-POLAR CEMENTED CUP	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	Biomet	BIOMET MULLER	1	<0.0%	No
Biomet	AURA II CEMENTLESS STEM	Biomet	ETERNITY	1	<0.0%	No
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	M2A CEMENTLESS CUP	1	<0.0%	No
Biomet	TAPERLOC CEMENTLESS STEM	Biomet	M2A CEMENTLESS CUP	1	<0.0%	No
B Braun / Aesculap	EXCIA-CEMENTED	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	Yes
Biomet	MULLER - BIOMET	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	No
Biomet	REACH	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Waldemar Link	SP112	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	Biomet	RANAWAT/BURSTEIN	1	<0.0%	No
Biomet	BIMETRIC CEMENTED STEM	Biomet	STANMORE-ARCOM	1	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	Biomet	STANMORE-ARCOM	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Biomet	STANMORE-ARCOM	1	<0.0%	Yes
Biomet	MODULAR INTERLOC	Biomet	STANMORE-ARCOM	1	<0.0%	No
Biomet	TAPERLOC CEMENTED STEM	Biomet	STANMORE-ARCOM	1	<0.0%	No
Zimmer	VERSYS CEMENTLESS STEM	Biomet	STANMORE-ARCOM	1	<0.0%	Yes
Biomet	BIMETRIC CEMENTED STEM	Biomet	UNIVERSAL II	1	<0.0%	No
Corin	CENTRAFIX	Corin	CENATOR CEMENTED CUP	1	<0.0%	No
Biomet	TAPERLOC CEMENTED STEM	Corin	CENATOR CEMENTED CUP	1	<0.0%	Yes
Waldemar Link	MP NECK CEMENTED STEM	Corin	HI-NEK CEMENTED CUP	1	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Corin	HI-NEK CEMENTED CUP	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	DePuy	CHARNLEY CEMENTED CUP	1	<0.0%	Yes
Zimmer	CPT	DePuy	CHARNLEY CEMENTED CUP	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	DePuy	CHARNLEY OGEE	1	<0.0%	Yes
B Braun / Aesculap	BICONACT CEMENTED STEM	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	Yes
DePuy	KAR	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	No
Stryker Howmedica Osteonics	ABG II CEMENTLESS STEM	DePuy	ELITE PLUS CEMENTED CUP	1	<0.0%	Yes
Stryker Howmedica Osteonics	ACCOLADE	DePuy	ELITE PLUS CEMENTED CUP	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	KAR	DePuy	ELITE PLUS CEMENTED CUP	1	<0.0%	No
DePuy	S-ROM CEMENTLESS STEM	DePuy	ELITE PLUS CEMENTED CUP	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	ELITE PLUS FLANGED	1	<0.0%	Yes
Stryker Howmedica Osteonics	ACCOLADE	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
Smith & Nephew	ANTHOLOGY	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
DePuy	REEF	DePuy	ELITE PLUS OGEE	1	<0.0%	No
Waldemar Link	SP112	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
DePuy	S-ROM CEMENTED STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	No
Zimmer	VERSYS CEMENTED STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
Zimmer	VERSYS CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
DePuy	CORAIL	DePuy	OCTOPUS	1	<0.0%	No
DePuy	AML	DePuy	PINNACLE	1	<0.0%	No
Wright Medical UK Ltd	ANCAFIT CEMENTLESS STEM	DePuy	PINNACLE	1	<0.0%	Yes
Smith & Nephew	ANTHOLOGY	DePuy	PINNACLE	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	DePuy	PINNACLE	1	<0.0%	Yes
Smith & Nephew	CPS-PLUS	DePuy	PINNACLE	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	DePuy	PINNACLE	1	<0.0%	Yes
DePuy	G2 CEMENTLESS STEM	DePuy	PINNACLE	1	<0.0%	No
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	DePuy	PINNACLE	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	DePuy	PINNACLE	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	DePuy	PINNACLE	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	UNIROM	DePuy	PINNACLE	1	<0.0%	No
DePuy	CORAIL	DePuy	S-ROM CEMENTLESS CUP	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	S-ROM CEMENTLESS CUP	1	<0.0%	Yes
Smith & Nephew	SYNERGY CEMENTLESS STEM	DePuy	S-ROM CEMENTLESS CUP	1	<0.0%	Yes
Biomet	BIMETRIC CEMENTLESS STEM	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	Yes
Smith & Nephew	SPECTRON	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	Yes
Biomet	STANMORE MODULAR	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	Yes
DePuy	ULTIMA TPS STEM	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	No
DePuy	CORAIL	DePuy	WROBLEWSKI ANGLE BORE SOCKET	1	<0.0%	No
Zimmer	CLS CEMENTLESS STEM	Smith & Nephew	BICON-PLUS	1	<0.0%	Yes
Smith & Nephew	CPS-PLUS	Smith & Nephew	BOFOR	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	BOFOR	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Smith & Nephew	BOFOR	1	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Smith & Nephew	BOFOR	1	<0.0%	No
Stryker Howmedica Osteonics	ACCOLADE	Smith & Nephew	EPF-PLUS	1	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Smith & Nephew	EPF-PLUS	1	<0.0%	Yes
Smith & Nephew	ENDOPLUS CEMENTLESS HIP	Smith & Nephew	EPF-PLUS	1	<0.0%	No
Amplitude	INITIALE CEMENTED STEM	Smith & Nephew	EPF-PLUS	1	<0.0%	Yes
Zimmer	MS-30	Smith & Nephew	EPF-PLUS	1	<0.0%	Yes
Zimmer	MULLER STR STEM	Smith & Nephew	EPF-PLUS	1	<0.0%	Yes
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Smith & Nephew	EPF-PLUS	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Smith & Nephew	SLR-PLUS CEMENTED STEM	Smith & Nephew	EPF-PLUS	1	<0.0%	No
Finsbury	FREEMAN CEMENTED FINSBURY	Finsbury	SLF CEMENTLESS CUP (FINSBURY)	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Implants International	CCB	1	<0.0%	Yes
Zimmer	MULLER STR STEM	Implants International	CCB	1	<0.0%	Yes
Medacta UK Ltd	CONE	Implants International	RM CEMENTLESS CUP (IMPLANT INTERNATIONAL)	1	<0.0%	Yes
Corin	C FIT	Joint Replacement Instrumentation Ltd	CSF	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	Joint Replacement Instrumentation Ltd	CSF	1	<0.0%	Yes
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	1	<0.0%	Yes
Amplitude	INTEGRALE	Joint Replacement Instrumentation Ltd	CSF	1	<0.0%	Yes
Zimmer	MULLER STR STEM	Joint Replacement Instrumentation Ltd	CSF	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTLESS STEM	Joint Replacement Instrumentation Ltd	CSF	1	<0.0%	Yes
Corin	TRIFIT CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	1	<0.0%	Yes
DePuy	CORAIL	Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	1	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Mathys Orthopaedics Ltd	CCB MATHYS	1	<0.0%	Yes
Biomet	MULLER - BIOMET	Mathys Orthopaedics Ltd	CCN	1	<0.0%	Yes
Medacta UK Ltd	CONE	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	1	<0.0%	Yes
Mathys Orthopaedics Ltd	TWINSYS CEMENTLESS STEM	Mathys Orthopaedics Ltd	MONOMESH CEMENTLESS CUP	1	<0.0%	No
DePuy	C-STEM CEMENTED STEM	Mathys Orthopaedics Ltd	RM CEMENTLESS CUP (MATHYS)	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Mathys Orthopaedics Ltd	RM CEMENTLESS CUP (MATHYS)	1	<0.0%	Yes
Biomet	CMK CEMENTED STEM	Mathys Orthopaedics Ltd	SELEXYS PC	1	<0.0%	Yes
Mathys Orthopaedics Ltd	CBC	Mathys Orthopaedics Ltd	SELEXYS TH	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Orthodynamics	NOVAE SF	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Orthodynamics	NOVAE SF	1	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Orthodynamics	NOVAE STICK	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Orthodynamics	NOVAE STICK	1	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Ortho-ID	POLAR CEMENTED CUP	1	<0.0%	Yes
DePuy	CHARNLEY	Smith & Nephew	OPERA	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER	Smith & Nephew	OPERA	1	<0.0%	Yes
DePuy	REEF	Smith & Nephew	OPERA	1	<0.0%	Yes
DePuy	SUMMIT CEMENTLESS STEM	Smith & Nephew	OPERA	1	<0.0%	Yes
Corin	TAPERFIT CEMENTED STEM	Smith & Nephew	OPERA	1	<0.0%	Yes
Zimmer	ZMR CEMENTED STEM	Smith & Nephew	OPERA	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Smith & Nephew	REFLECTION CEMENTED	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	Smith & Nephew	REFLECTION CEMENTLESS	1	<0.0%	Yes
DePuy	CORAIL	Smith & Nephew	REFLECTION CEMENTLESS	1	<0.0%	Yes
Zimmer	CPT	Smith & Nephew	REFLECTION CEMENTLESS	1	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Smith & Nephew	REFLECTION CEMENTLESS	1	<0.0%	No
Smith & Nephew	SPECTRON	Smith & Nephew	SP3	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Soverign Medical	SOVERIEGN MULLER	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Joint Replacement Instrumentation Ltd	FURLONG HAC	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	1	<0.0%	Yes
Biomet	ASIAN CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes
Biomet	BIMETRIC CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes
Zimmer	REVITAN CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes
Mathys Orthopaedics Ltd	TWINSYS CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTED STEM	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
DePuy	CORAIL	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
Smith & Nephew	CPCS	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
Smith & Nephew	CPS-PLUS	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
Zimmer	CPT	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
Amplitude	INITIALE CEMENTED STEM	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
Biomet	KENT HIP	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
Biomet	STANMORE MODULAR	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	Yes
DePuy	CHARNLEY CEMENTED STEM	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	1	<0.0%	Yes
DePuy	CORAIL	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	1	<0.0%	Yes
Smith & Nephew	CPCS	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	1	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTLESS STEM	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Zimmer	ZMR CEMENTED STEM	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	1	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	Yes
Zimmer	VERSYS CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	Yes
Symbios SA	SPS	Symbios SA	SYMBIOS HILOCK	1	<0.0%	No
Waldemar Link	DAVIES CEMENTLESS STEM	Waldemar Link	DAVIS CEMENTLESS CUP	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Wright Medical UK Ltd	ANCAFIT CEMENTLESS CUP	1	<0.0%	Yes
Zimmer	CLS CEMENTLESS STEM	Wright Medical UK Ltd	MATHYS CEMENTLESS CUP	1	<0.0%	Yes
DePuy	CORAIL	Wright Medical UK Ltd	MATHYS CEMENTLESS CUP	1	<0.0%	Yes
Zimmer	CPT	Wright Medical UK Ltd	MATHYS CEMENTLESS CUP	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Wright Medical UK Ltd	MATHYS CEMENTLESS CUP	1	<0.0%	No
Wright Medical UK Ltd	PROFEMUR CEMENTED STEM	Wright Medical UK Ltd	PROCOTYL	1	<0.0%	No
Biomet	CMK CEMENTED STEM	Zimmer	ALLOFIT	1	<0.0%	Yes
DePuy	CORAIL	Zimmer	ALLOFIT	1	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Zimmer	ALLOFIT	1	<0.0%	Yes
Zimmer	MULLER STR STEM	Zimmer	ALLOFIT	1	<0.0%	No
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Zimmer	ALLOFIT	1	<0.0%	Yes
Biomet	BIMETRIC CEMENTED STEM	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes
Finsbury	FREEMAN CEMENTED FINSBURY	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes
DePuy	SOLUTION CEMENTLESS STEM	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Waldemar Link	SP112	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes
DePuy	ULTIMA STRAIGHT STEM	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes
Zimmer	CLS CEMENTLESS STEM	Zimmer	METASUL-MULLER	1	<0.0%	No
Finsbury	ADEPT CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
Zimmer	MULLER STR STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	No
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
DePuy	REEF	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
Zimmer	VERSYS CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	No
Stryker Howmedica Osteonics	ABG II CEMENTLESS STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Exactech (UK) Ltd	ACUMATCH M-SERIES	Zimmer	TRILOGY	1	<0.0%	Yes
Finsbury	ADEPT CEMENTED STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Biomet	ASIAN CEMENTLESS STEM	Zimmer	TRILOGY	1	<0.0%	Yes
DePuy	CHARNLEY CEMENTED STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Smith & Nephew	ECHELON CEMENTLESS STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Corin	HI-NEK CEMENTLESS STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Zimmer	KINECTIV	Zimmer	TRILOGY	1	<0.0%	No
Biomet	OLYMPIA	Zimmer	TRILOGY	1	<0.0%	Yes
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Zimmer	P10 MULLER	Zimmer	TRILOGY	1	<0.0%	No
DePuy	REEF	Zimmer	TRILOGY	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Zimmer	REVITAN CEMENTED STEM	Zimmer	TRILOGY	1	<0.0%	No
Smith & Nephew	SPECTRON	Zimmer	TRILOGY	1	<0.0%	Yes
DePuy	S-ROM CEMENTED STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Mathys Orthopaedics Ltd	TWINSYS CEMENTLESS STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Zimmer	WAGNER CONE	Zimmer	TRILOGY	1	<0.0%	No
Smith & Nephew	CPS-PLUS	Zimmer	ZCA	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	Zimmer	ZCA	1	<0.0%	Yes
Corin	TAPERFIT CEMENTED STEM	Zimmer	ZCA	1	<0.0%	Yes
Zimmer	VERSYS CEMENTLESS STEM	Zimmer	ZCA	1	<0.0%	No
Zimmer	VERSYS HERITAGE	Zimmer	ZCA	1	<0.0%	No
Biomet	MULLER - BIOMET	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	Yes
Zimmer	VERSYS CEMENTLESS STEM	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	No

Table 11(b) Cup-stem combinations in the NJR in 2007 for Hip Revision Procedures where both were implanted during the revision

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
				2,777		
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	TRIDENT	290	10.4%	No
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	CONTEMPORARY	158	5.7%	No
DePuy	KAR	DePuy	PINNACLE	118	4.2%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	ELITE PLUS OGEE	89	3.2%	Yes
DePuy	CORAIL	DePuy	PINNACLE	89	3.2%	No
Stryker Howmedica Osteonics	EXETER V40	Zimmer	TRILOGY	87	3.1%	Yes
Zimmer	ZMR CEMENTED STEM	Zimmer	TRILOGY	87	3.1%	No
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	EXETER DURATION	66	2.4%	No
Zimmer	ZMR CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	61	2.2%	No
DePuy	C-STEM CEMENTED STEM	DePuy	ELITE PLUS OGEE	57	2.1%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	CSF	54	1.9%	No
Stryker Howmedica Osteonics	EXETER V40	Zimmer	TRABECULAR METAL CEMENTLESS CUP	52	1.9%	Yes
Zimmer	CPT	Zimmer	TRABECULAR METAL CEMENTLESS CUP	46	1.7%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	ELITE PLUS CEMENTED CUP	43	1.5%	Yes
DePuy	SOLUTION CEMENTLESS STEM	DePuy	PINNACLE	43	1.5%	No
DePuy	S-ROM CEMENTED STEM	DePuy	PINNACLE	39	1.4%	No
Corin	OXFORD UNIVERSAL HIP (CORIN) CEMENTED STEM	Zimmer	TRILOGY	38	1.4%	Yes
Zimmer	CPT	Zimmer	TRILOGY	37	1.3%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	PINNACLE	35	1.3%	Yes
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	REFLECTION CEMENTLESS	30	1.1%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Zimmer	REVITAN CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	29	1.0%	No
DePuy	C-STEM CEMENTED STEM	DePuy	PINNACLE	27	1.0%	No
Zimmer	CPT	Zimmer	ZCA	26	0.9%	No
DePuy	REEF	DePuy	PINNACLE	26	0.9%	No
DePuy	C-STEM CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	21	0.8%	No
Biomet	OXFORD UNIVERSAL HIP (BIOMET) CEMENTED STEM	Zimmer	TRILOGY	19	0.7%	Yes
DePuy	CHARNLEY CEMENTED STEM	DePuy	CHARNLEY CEMENTED CUP	15	0.5%	No
Stryker Howmedica Osteonics	ACCOLADE	Stryker Howmedica Osteonics	TRIDENT	14	0.5%	No
DePuy	C-STEM CEMENTED STEM	Smith & Nephew	OPERA	14	0.5%	Yes
Smith & Nephew	ECHELON CEMENTLESS STEM	Smith & Nephew	REFLECTION CEMENTLESS	14	0.5%	No
Smith & Nephew	SYNERGY CEMENTLESS STEM	Smith & Nephew	REFLECTION CEMENTLESS	14	0.5%	No
DePuy	S-ROM CEMENTLESS STEM	DePuy	PINNACLE	14	0.5%	No
Smith & Nephew	ECHELON CEMENTLESS STEM	Zimmer	TRILOGY	13	0.5%	Yes
DePuy	ELITE PLUS CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	13	0.5%	No
DePuy	SOLUTION CEMENTLESS STEM	DePuy	ELITE PLUS CEMENTED CUP	13	0.5%	No
DePuy	C-STEM CEMENTED STEM	DePuy	WROBLESKI GOLF BALL	13	0.5%	No
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	12	0.4%	No
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	OPERA	12	0.4%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	CSF PLUS	12	0.4%	No
Zimmer	CPT	DePuy	ELITE PLUS OGEE	12	0.4%	Yes
Stryker Howmedica Osteonics	EXETER V40	DePuy	ULTIMA CEMENTED CUP	12	0.4%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
B Braun / Aesculap	BICONCONTACT CEMENTED STEM	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	11	0.4%	No
Zimmer	MS-30	Zimmer	TRABECULAR METAL CEMENTLESS CUP	10	0.4%	No
DePuy	CHARNLEY	DePuy	ELITE PLUS CEMENTED CUP	10	0.4%	No
Stryker Howmedica Osteonics	EXETER V40	Biomet	MALLORY-HEAD CEMENTLESS CUP	10	0.4%	Yes
Biomet	OXFORD UNIVERSAL HIP (BIOMET) CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	9	0.3%	Yes
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	EXETER CEMENTED CUP	9	0.3%	No
Stryker Howmedica Osteonics	EXETER V40	Implants International	EDINBURGH CUP	9	0.3%	Yes
Biomet	MULLER - BIOMET	Biomet	APOLLO	9	0.3%	No
DePuy	C-STEM CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	8	0.3%	Yes
Zimmer	REVITAN CEMENTED STEM	Zimmer	TRILOGY	8	0.3%	No
Van Straten Medical	CUSTOM DEVICE	Van Straten Medical	VAN STRATEN-MULLER	8	0.3%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Stryker Howmedica Osteonics	TRIDENT	8	0.3%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	FURLONG THREADED CUP	8	0.3%	No
DePuy	CHARNLEY CEMENTED STEM	DePuy	CHARNLEY OGEE	8	0.3%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	DURALOC CEMENTLESS CUP	8	0.3%	Yes
DePuy	SOLUTION CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	8	0.3%	No
Zimmer	REVITAN CEMENTED STEM	Corin	CENATOR CEMENTED CUP	8	0.3%	Yes
Biomet	STANMORE MODULAR	Biomet	STANMORE-ARCOM	8	0.3%	No
Stryker Howmedica Osteonics	EXETER V40	Wright Medical UK Ltd	PROCOTYL	7	0.3%	Yes
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	7	0.3%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Stryker Howmedica Osteonics	EXETER V40	Joint Replacement Instrumentation Ltd	CSF	7	0.3%	Yes
Waldemar Link	MP NECK CEMENTED STEM	DePuy	PINNACLE	7	0.3%	Yes
Biomet	MULLER - BIOMET	DePuy	PINNACLE	7	0.3%	Yes
DePuy	CHARNLEY CEMENTED STEM	DePuy	WROBLEWSKI ANGLE BORE SOCKET	7	0.3%	No
Zimmer	MS-30	Zimmer	LOW PROFILE MULLER	6	0.2%	No
Zimmer	P10 MULLER	Zimmer	LOW PROFILE MULLER	6	0.2%	No
Waldemar Link	MP NECK CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	6	0.2%	Yes
Corin	OXFORD UNIVERSAL HIP (CORIN) CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	6	0.2%	Yes
DePuy	REEF	Zimmer	TRILOGY	6	0.2%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Wright Medical UK Ltd	PROCOTYL	6	0.2%	Yes
Waldemar Link	MP NECK CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	6	0.2%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	6	0.2%	Yes
DePuy	REEF	Stryker Howmedica Osteonics	TRIDENT	6	0.2%	Yes
DePuy	REEF	Smith & Nephew	REFLECTION CEMENTLESS	6	0.2%	Yes
DePuy	C-STEM CEMENTED STEM	DePuy	CHARNLEY OGEE	6	0.2%	No
Zimmer	ZMR CEMENTED STEM	DePuy	ELITE PLUS OGEE	6	0.2%	Yes
DePuy	SOLUTION CEMENTLESS STEM	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	6	0.2%	Yes
Biomet	CONELock	Amplitude	SATURNE	6	0.2%	Yes
Biomet	MULLER - BIOMET	Zimmer	LOW PROFILE MULLER	5	0.2%	Yes
DePuy	CORAIL	Zimmer	TRABECULAR METAL CEMENTLESS CUP	5	0.2%	Yes
DePuy	SOLUTION CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	5	0.2%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Zimmer	ZWEYMULLER	Zimmer	TRABECULAR METAL CEMENTLESS CUP	5	0.2%	No
DePuy	C-STEM CEMENTED STEM	Zimmer	TRILOGY	5	0.2%	Yes
Zimmer	ZMR CEMENTED STEM	Zimmer	ZIMMER CEMENTED CUP	5	0.2%	No
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	5	0.2%	No
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Smith & Nephew	BICON-PLUS	5	0.2%	No
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	EPF-PLUS	5	0.2%	Yes
Zimmer	CPT	Smith & Nephew	POLAR CEMENTLESS CUP	5	0.2%	Yes
DePuy	CORAIL	DePuy	DURALOC CEMENTLESS CUP	5	0.2%	No
DePuy	KAR	DePuy	DURALOC CEMENTLESS CUP	5	0.2%	No
DePuy	S-ROM CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	5	0.2%	No
DePuy	CORAIL	DePuy	ELITE PLUS OGEE	5	0.2%	No
DePuy	SUMMIT CEMENTED STEM	DePuy	PINNACLE	5	0.2%	No
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	5	0.2%	No
Orthodynamics	CANNULOK CEMENTLESS STEM	Zimmer	TRILOGY	4	0.1%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Zimmer	TRILOGY	4	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	4	0.1%	No
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	Stryker Howmedica Osteonics	ODC	4	0.1%	No
Biomet	MALLORY-HEAD CEMENTED STEM	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	4	0.1%	Yes
Zimmer	CPT	Stryker Howmedica Osteonics	TRIDENT	4	0.1%	Yes
DePuy	KAR	Stryker Howmedica Osteonics	TRIDENT	4	0.1%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	4	0.1%	No
Biomet	STANMORE MODULAR	Stryker Howmedica Osteonics	TRIDENT	4	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	REFLECTION CEMENTED	4	0.1%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	4	0.1%	No
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Smith & Nephew	EPF-PLUS	4	0.1%	No
DePuy	CORAIL	DePuy	ELITE PLUS CEMENTED CUP	4	0.1%	No
DePuy	KAR	DePuy	ELITE PLUS CEMENTED CUP	4	0.1%	No
DePuy	ELITE PLUS CEMENTED STEM	DePuy	ELITE PLUS OGEE	4	0.1%	No
Waldemar Link	MP NECK CEMENTED STEM	DePuy	ELITE PLUS OGEE	4	0.1%	Yes
Biomet	TAPERLOC CEMENTLESS STEM	Biomet	EXCEED	4	0.1%	No
Zimmer	CLS CEMENTLESS STEM	Zimmer	ALLOFIT	3	0.1%	No
Waldemar Link	MP NECK CEMENTED STEM	Zimmer	ALLOFIT	3	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Zimmer	LOW PROFILE MULLER	3	0.1%	Yes
Zimmer	MULLER STR STEM	Zimmer	LOW PROFILE MULLER	3	0.1%	No
Zimmer	VERSYS CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	3	0.1%	No
DePuy	SOLUTION CEMENTLESS STEM	Wright Medical UK Ltd	PROCOTYL	3	0.1%	Yes
Waldemar Link	MEGA SYSTEM	Waldemar Link	INTERPLANTA	3	0.1%	No
Waldemar Link	SP112	Waldemar Link	INTERPLANTA	3	0.1%	No
Waldemar Link	MP NECK CEMENTED STEM	Waldemar Link	MCMINN	3	0.1%	No
DePuy	S-ROM CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	3	0.1%	Yes
Zimmer	CPT	Stryker Howmedica Osteonics	EXETER DURATION	3	0.1%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Joint Replacement Instrumentation Ltd	FURLONG HAC	Stryker Howmedica Osteonics	EXETER DURATION	3	0.1%	Yes
Biomet	CONELock	Stryker Howmedica Osteonics	Restoration GAP2	3	0.1%	Yes
Stryker Howmedica Osteonics	ACCOLADE	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	3	0.1%	No
Zimmer	CPT	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	3	0.1%	Yes
Stryker Howmedica Osteonics	ACCOLADE CEMENTED	Stryker Howmedica Osteonics	TRIDENT	3	0.1%	No
Van Straten Medical	CUSTOM DEVICE	Soverign Medical	SOVERIEGN MULLER	3	0.1%	Yes
Corin	TAPERFIT CEMENTED STEM	Smith & Nephew	REFLECTION CEMENTED	3	0.1%	Yes
Smith & Nephew	SPECTRON	Smith & Nephew	REFLECTION CEMENTLESS	3	0.1%	No
DePuy	C-STEM CEMENTED STEM	Joint Replacement Instrumentation Ltd	FURLONG CEMENTED CUP	3	0.1%	Yes
DePuy	KAR	DePuy	ELITE PLUS OGEE	3	0.1%	No
Zimmer	REVITAN CEMENTED STEM	DePuy	ELITE PLUS OGEE	3	0.1%	Yes
DePuy	S-ROM CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	3	0.1%	No
Zimmer	CPT	DePuy	PINNACLE	3	0.1%	Yes
DePuy	SUMMIT CEMENTLESS STEM	DePuy	PINNACLE	3	0.1%	No
Zimmer	CPT	Biomet	EXCEED	3	0.1%	Yes
Biomet	TAPERLOC CEMENTED STEM	Biomet	EXCEED	3	0.1%	No
Biomet	REACH	Biomet	MALLORY-HEAD CEMENTLESS CUP	3	0.1%	No
Biomet	REACH	Biomet	PAR 5 RINOWL CEMENTLESS CUP	3	0.1%	No
B Braun / Aesculap	EXCIA-CEMENTED	B Braun / Aesculap	CHIRULEN	3	0.1%	No
Zimmer	CPT	Zimmer	ALLOFIT	2	0.1%	No
DePuy	KAR	Zimmer	TRILOGY	2	0.1%	Yes
Waldemar Link	MP NECK CEMENTED STEM	Zimmer	TRILOGY	2	0.1%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Zimmer	VERSYS CEMENTLESS STEM	Zimmer	TRILOGY	2	0.1%	No
Stryker Howmedica Osteonics	EXETER V40	Zimmer	ZCA	2	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Wright Medical UK Ltd	MATHYS CEMENTLESS CUP	2	0.1%	Yes
DePuy	C-STEM CEMENTED STEM	Wright Medical UK Ltd	PROCOTYL	2	0.1%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Wright Medical UK Ltd	PROCOTYL	2	0.1%	No
Waldemar Link	MP NECK CEMENTED STEM	Waldemar Link	INTERPLANTA	2	0.1%	No
Waldemar Link	SP112	Waldemar Link	SNAP FIT	2	0.1%	No
Zimmer	ZMR CEMENTED STEM	Surgicraft	SPLIT CUP	2	0.1%	Yes
Zimmer	CPT	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	2	0.1%	Yes
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	2	0.1%	No
Zimmer	CPT	Stryker Howmedica Osteonics	CONTEMPORARY	2	0.1%	Yes
Smith & Nephew	ECHELON CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	2	0.1%	Yes
Zimmer	ZMR CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	2	0.1%	Yes
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Stryker Howmedica Osteonics	ODC	2	0.1%	No
Zimmer	ZMR CEMENTED STEM	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	2	0.1%	Yes
DePuy	CHARNLEY	Stryker Howmedica Osteonics	TRIDENT	2	0.1%	Yes
DePuy	C-STEM CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	2	0.1%	Yes
Smith & Nephew	ECHELON CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	2	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	TRITANIUM	2	0.1%	No
DePuy	CHARNLEY CEMENTED STEM	Smith & Nephew	OPERA	2	0.1%	Yes
Smith & Nephew	CPCS	Smith & Nephew	OPERA	2	0.1%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	KAR	Smith & Nephew	REFLECTION CEMENTED	2	0.1%	Yes
Smith & Nephew	SPECTRON	Smith & Nephew	REFLECTION CEMENTED	2	0.1%	No
Zimmer	ZMR CEMENTED STEM	Smith & Nephew	REFLECTION CEMENTLESS	2	0.1%	Yes
DePuy	CORAIL	Smith & Nephew	SP3	2	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Smith & Nephew	SP3	2	0.1%	Yes
Smith & Nephew	SPECTRON	Smith & Nephew	SP3	2	0.1%	No
DePuy	C-STEM CEMENTED STEM	Orthodynamics	NOVAE STICK	2	0.1%	Yes
Stryker Howmedica Osteonics	EXETER V40	Orthodynamics	NOVAE STICK	2	0.1%	Yes
Exactech (UK) Ltd	ACUMATCH M-SERIES	Joint Replacement Instrumentation Ltd	CSF	2	0.1%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	Joint Replacement Instrumentation Ltd	CSF	2	0.1%	Yes
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	2	0.1%	No
Biomet	MALLORY-HEAD CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	2	0.1%	Yes
Zimmer	ZMR CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	2	0.1%	Yes
Implants International	EDINBURGH	Implants International	EDINBURGH CUP	2	0.1%	No
Smith & Nephew	CPS-PLUS	Smith & Nephew	EPF-PLUS	2	0.1%	No
Smith & Nephew	SLR-PLUS CEMENTED STEM	Smith & Nephew	EPF-PLUS	2	0.1%	No
DePuy	C-STEM CEMENTED STEM	Smith & Nephew	POLAR CEMENTLESS CUP	2	0.1%	Yes
Smith & Nephew	ECHELON CEMENTLESS STEM	Smith & Nephew	POLAR CEMENTLESS CUP	2	0.1%	No
DePuy	S-ROM CEMENTED STEM	Smith & Nephew	POLAR CEMENTLESS CUP	2	0.1%	Yes
Zimmer	CPT	DePuy	CHARNLEY CEMENTED CUP	2	0.1%	Yes
DePuy	ELITE PLUS CEMENTED STEM	DePuy	CHARNLEY CEMENTED CUP	2	0.1%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	CHARNLEY OGEE	2	0.1%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	REEF	DePuy	DURALOC CEMENTLESS CUP	2	0.1%	No
DePuy	CHARNLEY CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	2	0.1%	No
Waldemar Link	MP NECK CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	2	0.1%	Yes
Biomet	OXFORD UNIVERSAL HIP (BIOMET) CEMENTED STEM	DePuy	ELITE PLUS CEMENTED CUP	2	0.1%	Yes
DePuy	REEF	DePuy	ELITE PLUS CEMENTED CUP	2	0.1%	No
B Braun / Aesculap	BICONCONTACT CEMENTED STEM	DePuy	ELITE PLUS OGEE	2	0.1%	Yes
DePuy	CHARNLEY	DePuy	ELITE PLUS OGEE	2	0.1%	No
Smith & Nephew	ECHELON CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	2	0.1%	Yes
DePuy	S-ROM CEMENTED STEM	DePuy	ELITE PLUS OGEE	2	0.1%	No
DePuy	CHARNLEY	DePuy	PINNACLE	2	0.1%	No
DePuy	ELITE PLUS CEMENTED STEM	DePuy	PINNACLE	2	0.1%	No
DePuy	ENGAGE	DePuy	PINNACLE	2	0.1%	No
Waldemar Link	SP112	DePuy	PINNACLE	2	0.1%	Yes
Biomet	STANMORE MODULAR	DePuy	PINNACLE	2	0.1%	Yes
Biomet	MULLER - BIOMET	DePuy	S-ROM CEMENTLESS CUP	2	0.1%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Corin	CENATOR CEMENTED CUP	2	0.1%	Yes
DePuy	SOLUTION CEMENTLESS STEM	Biomet	APOLLO	2	0.1%	Yes
Biomet	BIMETRIC CEMENTED STEM	Biomet	ARCOM SHP	2	0.1%	No
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	ARCOM SHP	2	0.1%	No
Biomet	MODULAR INTERLOC	Biomet	BIOMET MULLER	2	0.1%	No
Biomet	KENT HIP	Biomet	BIOMEX	2	0.1%	No
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	M2A CEMENTED CUP	2	0.1%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Biomet	TAPERLOC CEMENTLESS STEM	Biomet	M2A CEMENTED CUP	2	0.1%	No
Biomet	CONELOCK	Biomet	MALLORY-HEAD CEMENTLESS CUP	2	0.1%	No
Zimmer	CPT	Biomet	MALLORY-HEAD CEMENTLESS CUP	2	0.1%	Yes
Smith & Nephew	ECHELON CEMENTLESS STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	2	0.1%	Yes
Biomet	STANMORE MODULAR	Biomet	MALLORY-HEAD CEMENTLESS CUP	2	0.1%	No
Stryker Howmedica Osteonics	EXETER V40	Biomet	PAR 5 RINOWL CEMENTLESS CUP	2	0.1%	Yes
Biomet	CONELOCK	Biomet	STANMORE-ARCOM	2	0.1%	No
B Braun / Aesculap	BICONTACT CEMENTED STEM	B Braun / Aesculap	CHIRULEN	2	0.1%	No
B Braun / Aesculap	BICONTACT CEMENTLESS STEM	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	2	0.1%	No
B Braun / Aesculap	PREVISION CEMENTED STEM	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	2	0.1%	No
Zimmer	REVITAN CEMENTED STEM	Zimmer	ALLOFIT	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Zimmer	CENTERPULSE MULLER	1	<0.0%	Yes
DePuy	KAR	Zimmer	CENTERPULSE MULLER	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Zimmer	HEDROCEL ELLIPTICAL	1	<0.0%	Yes
DePuy	S-ROM CEMENTLESS STEM	Zimmer	HEDROCEL ELLIPTICAL	1	<0.0%	Yes
Finsbury	FREEMAN CEMENTLESS	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes
Zimmer	MEM	Zimmer	LOW PROFILE MULLER	1	<0.0%	No
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes
DePuy	REEF	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes
DePuy	SOLUTION CEMENTLESS STEM	Zimmer	LOW PROFILE MULLER	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Zimmer	CPT	Zimmer	METASUL-MULLER	1	<0.0%	No
Zimmer	ALLOCLASSIC CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	No
Zimmer	CLS CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	No
Smith & Nephew	CPCS	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
Smith & Nephew	ECHELON CEMENTLESS STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
DePuy	ENGAGE	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
DePuy	KAR	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
DePuy	REEF	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
Smith & Nephew	SPECTRON	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
DePuy	S-ROM CEMENTED STEM	Zimmer	TRABECULAR METAL CEMENTLESS CUP	1	<0.0%	Yes
DePuy	CORAIL	Zimmer	TRILOGY	1	<0.0%	Yes
Zimmer	MS-30	Zimmer	TRILOGY	1	<0.0%	No
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Smith & Nephew	SLR-PLUS CEMENTED STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Waldemar Link	SP112	Zimmer	TRILOGY	1	<0.0%	Yes
Smith & Nephew	SYNERGY CEMENTLESS STEM	Zimmer	TRILOGY	1	<0.0%	Yes
Zimmer	ZWEYMULLER	Zimmer	TRILOGY	1	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Zimmer	ZCA	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Zimmer	ZCA	1	<0.0%	Yes
Zimmer	VERSYS CEMENTED STEM	Zimmer	ZCA	1	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Zimmer	ZMR CEMENTED STEM	Zimmer	ZCA	1	<0.0%	No
DePuy	CORAIL	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	Yes
Zimmer	CPT	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	No
DePuy	KAR	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	Yes
Waldemar Link	MP NECK CEMENTED STEM	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	Yes
Corin	TAPERFIT CEMENTED STEM	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	Yes
Mathys Orthopaedics Ltd	TWINSYS CEMENTLESS STEM	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	Yes
Zimmer	VERSYS CEMENTLESS STEM	Zimmer	ZIMMER CEMENTED CUP	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Wright Medical UK Ltd	ANCAFIT CEMENTLESS CUP	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Wright Medical UK Ltd	LINEAGE	1	<0.0%	No
DePuy	C-STEM CEMENTED STEM	Wright Medical UK Ltd	MATHYS CEMENTLESS CUP	1	<0.0%	Yes
DePuy	SOLUTION CEMENTLESS STEM	Wright Medical UK Ltd	MATHYS CEMENTLESS CUP	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	Wright Medical UK Ltd	PROCOTYL	1	<0.0%	Yes
Zimmer	CPT	Wright Medical UK Ltd	PROCOTYL	1	<0.0%	Yes
Van Straten Medical	MUTARS	Van Straten Medical	VAN STRATEN-MULLER	1	<0.0%	No
Symbios SA	SPS	Symbios SA	APRIL	1	<0.0%	No
Waldemar Link	MP NECK CEMENTED STEM	Surgicraft	SPLIT CUP	1	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	Stryker Howmedica Osteonics	ABG II CEMENTLESS CUP	1	<0.0%	Yes
Stryker Howmedica Osteonics	ACCOLADE	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	No
B Braun / Aesculap	BICONCONTACT CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	C-STEM CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	No
Zimmer	REVITAN CEMENTED STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Stryker Howmedica Osteonics	CONTEMPORARY	1	<0.0%	Yes
DePuy	REEF	Stryker Howmedica Osteonics	EXETER CEMENTED CUP	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER	Stryker Howmedica Osteonics	EXETER DURATION	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	ODC	1	<0.0%	No
Zimmer	ZMR CEMENTED STEM	Stryker Howmedica Osteonics	ODC	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Stryker Howmedica Osteonics	Restoration GAP2	1	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	1	<0.0%	Yes
DePuy	KAR	Stryker Howmedica Osteonics	SECURE FIT CEMENTLESS CUP	1	<0.0%	Yes
Stryker Howmedica Osteonics	ABG II CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	No
Stryker Howmedica Osteonics	CALCAR REP	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	Yes
Corin	OXFORD UNIVERSAL HIP (CORIN) CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	Yes
DePuy	SOLUTION CEMENTLESS STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	Yes
Zimmer	ZMR CEMENTED STEM	Stryker Howmedica Osteonics	TRIDENT	1	<0.0%	Yes
Van Straten Medical	MUTARS	Soverign Medical	SOVERIEGN MULLER	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Soverign Medical	SOVERIEGN C	Soverign Medical	SOVERIEGN MULLER	1	<0.0%	No
DePuy	REEF	Smith & Nephew	OPERA	1	<0.0%	Yes
DePuy	WROBLESKI RESECTION	Smith & Nephew	OPERA	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	Smith & Nephew	REFLECTION CEMENTED	1	<0.0%	Yes
Smith & Nephew	ECHELON CEMENTLESS STEM	Smith & Nephew	REFLECTION CEMENTED	1	<0.0%	No
Smith & Nephew	CPCS	Smith & Nephew	REFLECTION CEMENTLESS	1	<0.0%	No
Zimmer	CPT	Smith & Nephew	REFLECTION CEMENTLESS	1	<0.0%	Yes
DePuy	LPS	Smith & Nephew	REFLECTION CEMENTLESS	1	<0.0%	Yes
Smith & Nephew	ECHELON CEMENTLESS STEM	Smith & Nephew	SP3	1	<0.0%	No
Smith & Nephew	SYNERGY CEMENTLESS STEM	Smith & Nephew	SP3	1	<0.0%	No
Orthodynamics	CANNULOK CEMENTLESS STEM	Orthodynamics	NOVAE	1	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Orthodynamics	NOVAE	1	<0.0%	Yes
Waldemar Link	SP112	Orthodynamics	NOVAE COPTOS	1	<0.0%	Yes
DePuy	CHARNLEY CEMENTED STEM	Orthodynamics	NOVAE SF	1	<0.0%	Yes
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	Mathys Orthopaedics Ltd	CCB MATHYS	1	<0.0%	No
Smith & Nephew	SLR-PLUS CEMENTED STEM	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	1	<0.0%	Yes
Mathys Orthopaedics Ltd	TWINSYS CEMENTLESS STEM	Mathys Orthopaedics Ltd	MATHYS CEMENTLESS CUP	1	<0.0%	No
Mathys Orthopaedics Ltd	CCA CEMENTED STEM	Joint Replacement Instrumentation Ltd	CSF	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	Joint Replacement Instrumentation Ltd	CSF	1	<0.0%	Yes
Zimmer	MS-30	Joint Replacement Instrumentation Ltd	CSF PLUS	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	Joint Replacement Instrumentation Ltd	FRF	1	<0.0%	No

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Finsbury	FREEMAN CEMENTED FINSBURY	Finsbury	SLF CEMENTLESS CUP (FINSBURY)	1	<0.0%	No
Finsbury	FREEMAN CEMENTLESS	Finsbury	SLF CEMENTLESS CUP (FINSBURY)	1	<0.0%	No
Zimmer	REVITAN CEMENTED STEM	Smith & Nephew	BICON-PLUS	1	<0.0%	Yes
Smith & Nephew	SLR-PLUS CEMENTED STEM	Smith & Nephew	BICON-PLUS	1	<0.0%	No
Joint Replacement Instrumentation Ltd	FURLONG HAC	Smith & Nephew	BOFOR	1	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTED STEM	Smith & Nephew	BOFOR	1	<0.0%	No
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Smith & Nephew	BOFOR	1	<0.0%	No
Waldemar Link	SP112	Smith & Nephew	EPF-PLUS	1	<0.0%	Yes
DePuy	REEF	Smith & Nephew	PE-PLUS	1	<0.0%	Yes
Smith & Nephew	CPS-PLUS	Smith & Nephew	POLAR CEMENTLESS CUP	1	<0.0%	No
DePuy	KAR	Smith & Nephew	POLAR CEMENTLESS CUP	1	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTED STEM	Smith & Nephew	POLAR CEMENTLESS CUP	1	<0.0%	No
Smith & Nephew	SL-PLUS CEMENTLESS STEM	Smith & Nephew	POLAR CEMENTLESS CUP	1	<0.0%	No
DePuy	CORAIL	DePuy	CHARNLEY CEMENTED CUP	1	<0.0%	No
Zimmer	ZMR CEMENTED STEM	DePuy	CHARNLEY CEMENTED CUP	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTED STEM	DePuy	CHARNLEY OGEE	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	DePuy	CHARNLEY OGEE	1	<0.0%	Yes
DePuy	CHARNLEY	DePuy	CHARNLEY OGEE	1	<0.0%	No
DePuy	ELITE PLUS CEMENTED STEM	DePuy	CHARNLEY OGEE	1	<0.0%	No
DePuy	KAR	DePuy	CHARNLEY OGEE	1	<0.0%	No
Orthodynamics	CANNULOK CEMENTLESS STEM	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	CHARNLEY	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	No
DePuy	CHARNLEY CEMENTED STEM	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	No
Zimmer	CPT	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	No
Biomet	OLYMPIA	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	Yes
DePuy	S-ROM CEMENTLESS STEM	DePuy	DURALOC CEMENTLESS CUP	1	<0.0%	No
Orthodynamics	CANNULOK CEMENTLESS STEM	DePuy	ELITE PLUS CEMENTED CUP	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER	DePuy	ELITE PLUS CEMENTED CUP	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	DePuy	ELITE PLUS CEMENTED CUP	1	<0.0%	Yes
B Braun / Aesculap	HUCKSTEP CEMENTLESS STEM	DePuy	ELITE PLUS CEMENTED CUP	1	<0.0%	Yes
Orthodynamics	CANNULOK CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
B Braun / Aesculap	HUCKSTEP CEMENTED STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
Biomet	REACH	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
DePuy	REEF	DePuy	ELITE PLUS OGEE	1	<0.0%	No
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
Smith & Nephew	SL-PLUS CEMENTLESS STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
Zimmer	VERSYS CEMENTED STEM	DePuy	ELITE PLUS OGEE	1	<0.0%	Yes
Biomet	CONELOCK	DePuy	PINNACLE	1	<0.0%	Yes
Joint Replacement Instrumentation Ltd	FURLONG HAC	DePuy	PINNACLE	1	<0.0%	Yes
B Braun / Aesculap	PREVISION CEMENTED STEM	DePuy	PINNACLE	1	<0.0%	Yes
Wright Medical UK Ltd	PROFEMUR CEMENTED STEM	DePuy	PINNACLE	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
Wright Medical UK Ltd	PROFEMUR CEMENTLESS STEM	DePuy	PINNACLE	1	<0.0%	Yes
DePuy	PROXIMA	DePuy	PINNACLE	1	<0.0%	No
Smith & Nephew	SPECTRON	DePuy	PINNACLE	1	<0.0%	Yes
Smith & Nephew	SYNERGY CEMENTLESS STEM	DePuy	PINNACLE	1	<0.0%	Yes
DePuy	ULTIMA STRAIGHT STEM	DePuy	PINNACLE	1	<0.0%	No
Zimmer	ZMR CEMENTED STEM	DePuy	PINNACLE	1	<0.0%	Yes
DePuy	C-STEM CEMENTED STEM	DePuy	S-ROM CEMEMNTLESS CUP	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	DePuy	S-ROM CEMEMNTLESS CUP	1	<0.0%	Yes
Waldemar Link	SP112	DePuy	S-ROM CEMEMNTLESS CUP	1	<0.0%	Yes
DePuy	S-ROM CEMENTED STEM	DePuy	S-ROM CEMEMNTLESS CUP	1	<0.0%	No
DePuy	S-ROM CEMENTLESS STEM	DePuy	S-ROM CEMEMNTLESS CUP	1	<0.0%	No
Orthodynamics	CANNULOK CEMENTLESS STEM	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	Yes
DePuy	CORAIL	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	No
DePuy	C-STEM CEMENTED STEM	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	No
Waldemar Link	SP112	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	Yes
DePuy	ULTIMA STRAIGHT STEM	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	No
DePuy	ULTIMA TPS STEM	DePuy	ULTIMA CEMENTED CUP	1	<0.0%	No
Orthodynamics	CANNULOK CEMENTLESS STEM	DePuy	WROBLESKI GOLF BALL	1	<0.0%	Yes
DePuy	CHARNLEY	DePuy	WROBLEWSKI ANGLE BORE SOCKET	1	<0.0%	No
Zimmer	CPT	DePuy	WROBLEWSKI ANGLE BORE SOCKET	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
DePuy	ELITE PLUS CEMENTED STEM	DePuy	WROBLEWSKI ANGLE BORE SOCKET	1	<0.0%	No
Orthodynamics	CANNULOK CEMENTLESS STEM	Corin	HI-NEK CEMENTED CUP	1	<0.0%	Yes
Stryker Howmedica Osteonics	EXETER V40	Biomet	ARCOM SHP	1	<0.0%	Yes
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	BIOMET MULLER	1	<0.0%	No
Biomet	BIMETRIC CEMENTLESS STEM	Biomet	EXCEED	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	Biomet	EXCEED	1	<0.0%	Yes
Waldemar Link	MP NECK CEMENTED STEM	Biomet	EXCEED	1	<0.0%	Yes
Biomet	REACH	Biomet	EXCEED	1	<0.0%	No
Biomet	STANMORE MODULAR	Biomet	EXCEED	1	<0.0%	No
Biomet	BIMETRIC CEMENTED STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	No
DePuy	CORAIL	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	Yes
Biomet	KENT HIP	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	No
Biomet	MALLORY-HEAD CEMENTED STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	No
Stryker Howmedica Osteonics	OMNIFIT CEMENTLESS STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	Yes
Stryker Howmedica Osteonics	RESTORATION CEMENTLESS STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	Yes
Biomet	TAPERLOC CEMENTED STEM	Biomet	MALLORY-HEAD CEMENTLESS CUP	1	<0.0%	No
Biomet	REACH	Biomet	RANAWAT/ BURSTEIN	1	<0.0%	No
Biomet	TAPERLOC CEMENTED STEM	Biomet	RINGLOC	1	<0.0%	No
DePuy	CORAIL	Biomet	STANMORE-ARCOM	1	<0.0%	Yes
B Braun / Aesculap	BICONCONTACT CEMENTLESS STEM	B Braun / Aesculap	CHIRULEN	1	<0.0%	No
DePuy	KAR	B Braun / Aesculap	CHIRULEN	1	<0.0%	Yes

Stem Manufacturer	Stem Brand	Cup Manufacturer	Cup Brand	No Of Procedures	%	Mix and Match
B Braun / Aesculap	PREVISION CEMENTED STEM	B Braun / Aesculap	CHIRULEN	1	<0.0%	No
B Braun / Aesculap	EXCIA	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	1	<0.0%	No
Stryker Howmedica Osteonics	EXETER V40	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	1	<0.0%	Yes
B Braun / Aesculap	HUCKSTEP CEMENTLESS STEM	B Braun / Aesculap	PLASMACUP CEMENTLESS CUP	1	<0.0%	No
DePuy	S-ROM CEMENTLESS STEM	Amplitude	SATURNE	1	<0.0%	Yes

Table 12(a) Total condylar knee brands entered into NJR in 2007 for primary total knee replacements

Manufacturer	Brand	Total Operations	
		60,013	
DePuy	PFC SIGMA BICONDYLAR KNEE	20,859	34.8%
Zimmer	NEXGEN	8,176	13.6%
Biomet	AGC	7,552	12.6%
Stryker Howmedica Osteonics	SCORPIO	5,665	9.4%
Smith & Nephew	GENESIS 2	2,900	4.8%
Smith & Nephew	ENDOPLUS BICONDYLAR KNEE	2,551	4.3%
DePuy	LCS	2,465	4.1%
Stryker Howmedica Osteonics	KINEMAX	1,778	3.0%
Smith & Nephew	PROFIX	1,324	2.2%
Stryker Howmedica Osteonics	TRIATHLON	981	1.6%
Wright Medical UK Ltd	ADVANCE BICONDYLAR KNEE	798	1.3%
Finsbury	MRK	716	1.2%
Biomet	VANGUARD	640	1.1%
Biomet	MAXIM	431	0.7%
Exactech (UK) Ltd	OPTETRAK	425	0.7%
B Braun / Aesculap	COLUMBUS	420	0.7%
Corin	ROTAGLIDE +	405	0.7%
Zimmer	NK2 BICONDYLAR KNEE	397	0.7%
Wright Medical UK Ltd	INSALL-BURSTEIN 2	315	0.5%
B Braun / Aesculap	E-MOTION BICONDYLAR KNEE	211	0.4%
Zimmer	FS	179	0.3%
Zimmer	INNEX	160	0.3%
Van Straten Medical	CCI	148	0.2%
Biomet	ALPINA	87	0.1%
Zimmer	INSALL-BURSTEIN 2	77	0.1%
Smith & Nephew	JOURNEY	66	0.1%
Waldemar Link	TACK	54	0.1%
Mathys Orthopaedics Ltd	MATHYS BICONDYLAR KNEE	35	0.1%
Biomet	CKS	25	<0.0%
Medacta UK Ltd	MEDACTA BICONDYLAR	23	<0.0%
B Braun / Aesculap	- none selected -	20	<0.0%
Jointmedica Limited	Joint Medica Bicondylar	18	<0.0%
Joint Replacement Instrumentation Ltd	JRI BICONDYLAR KNEE	18	<0.0%

Manufacturer	Brand	Total Operations	
Soverign Medical	CCI	16	<0.0%
Smith & Nephew	LEGION	15	<0.0%
Wright Medical UK Ltd	ADVANTIM	14	<0.0%
Corin	AMC	8	<0.0%
Finsbury	DBK	8	<0.0%
Zimmer	SAL	7	<0.0%
ImplantCast	ACS	7	<0.0%
Wright Medical UK Ltd	AVANCE	5	<0.0%
Smith & Nephew	TC PLUS	4	<0.0%
Intavent - Orthofix	OPTETRAK	3	<0.0%
Orthopaedic Surgical Implants Ltd	ACTIVE BICONDYLAR KNEE	3	<0.0%
Biomet	OXFORD TMK	1	<0.0%
DePuy	PFC BICONDYLAR KNEE	1	<0.0%
Finsbury	FS 1000	1	<0.0%
Implants International	ST LEGER	1	<0.0%

Table 12(b) Total condylar knee brands entered into NJR in 2007 for revision knee replacements

Manufacturer	Brand	Total Operations	
		1,840	
DePuy	PFC SIGMA BICONDYLAR KNEE	640	34.8%
Zimmer	NEXGEN	324	17.6%
Stryker Howmedica Osteonics	SCORPIO	203	11.0%
Biomet	AGC	162	8.8%
Smith & Nephew	GENESIS 2	90	4.9%
Biomet	MAXIM	88	4.8%
Smith & Nephew	LEGION	88	4.8%
Stryker Howmedica Osteonics	KINEMAX	69	3.8%
Wright Medical UK Ltd	ADVANCE BICONDYLAR KNEE	24	1.3%
Smith & Nephew	PROFIX	20	1.1%
Exactech (UK) Ltd	OPTETRAK	19	1.0%
Finsbury	MRK	16	0.9%
DePuy	LCS	13	0.7%
Smith & Nephew	ENDOPLUS BICONDYLAR KNEE	13	0.7%
Zimmer	NK2 BICONDYLAR KNEE	12	0.7%
Stryker Howmedica Osteonics	TRIATHLON	12	0.7%
Corin	ROTAGLIDE +	11	0.6%
Zimmer	FS	9	0.5%
Biomet	VANGUARD	7	0.4%
Smith & Nephew	TC Plus	5	0.3%
B Braun / Aesculap	E-MOTION BICONDYLAR KNEE	3	0.2%
Waldemar Link	TACK	3	0.2%
Van Straten Medical	CCI	2	0.1%
Wright Medical UK Ltd	INSALL-BURSTEIN 2	2	0.1%
Biomet	RHK	1	0.1%
Zimmer	SAL	1	0.1%
Intavent - Orthofix	OPTETRAK	1	0.1%
Wright Medical UK Ltd	GUARDIAN BICONDYLAR KNEE	1	0.1%
Zimmer	INSALL-BURSTEIN 2	1	0.1%

Table 13 Total condylar knee brands entered into NJR in 2007 for unicondylar knee replacements

Manufacturer	Brand	Total Operations	
		6,185	
Biomet	OXFORD PARTIAL KNEE	4,463	72.2%
Zimmer	MG UNI	624	10.1%
DePuy	PRESERVATION	363	5.9%
Corin	ACM/UNIGLIDE	333	5.4%
Waldemar Link	SLED	127	2.1%
Smith & Nephew	GENESIS UNI	90	1.5%
Stryker Howmedica Osteonics	EUIS	75	1.2%
Mathys Orthopaedics Ltd	MATHYS UNICONDYLAR KNEE	50	0.8%
Smith & Nephew	UC-PLUS	32	0.5%
Biomet	OXFORD UNI	16	0.3%
DePuy	SIGMA HP	6	0.1%
B Braun / Aesculap	E-MOTION UNICONDYLAR KNEE	3	<0.0%
Biomet	REPICCI	1	<0.0%
Smith & Nephew	JOURNEY UNI	1	<0.0%
Wright Medical UK Ltd	ADVANCE UNICONDYLAR KNEE	1	<0.0%

Table 14 Patello-femoral joint brands entered into the NJR in 2007 for patello-femoral joint replacement procedures

Manufacturer	Brand	Total Operations	
		6,185	
Stryker Howmedica Osteonics	AVON	434	58.6%
Smith & Nephew	COMPETITOR	142	19.2%
Wright Medical UK Ltd	WRIGHT MEDICAL PF	88	11.7%
Wright Medical UK Ltd	FPV	44	5.9%
Smith & Nephew	JOURNEY P.F.	16	2.2%
Waldemar Link	LUBINUS PF	10	1.3%
DePuy	GCK	5	0.7%
Biomet	PERFORMANCE PF	1	0.1%
Corin	LEICESTER	1	0.1%

Table 15 Fixed and rotating hinged knee brands 2007

Manufacturer	Brand	Total Operations	
		839	
Waldemar Link	ENDO ROTATING HINGE	270	32.2%
Zimmer	NEXGEN HINGE TYPE	150	17.9%
Stryker Howmedica Osteonics	MRH	145	16.7%
DePuy	NOILES	89	10.6%
Biomet	BIRMINGHAM ROT HINGE	67	8.0%
Smith & Nephew	RT PLUS	54	6.4%
Stanmore Implants Worldwide	SMILES HINGED/LINKED KNEE	20	2.4%
Biomet	STANMORE HINGE	15	1.8%
Waldemar Link	MC	8	1.0%
Waldemar Link	ENDO HINGE	7	0.8%
Wright Medical UK Ltd	GUARDIAN HINGED/LINKED KNEE	7	0.8%
Biomet	OSS	5	0.6%
Soverign Medical	Soverign Medical	1	0.1%
Waldemar Link	MEGA SYSTEM C	1	0.1%

Table 16 Brands of antibiotic bone cement entered into the NJR on 2007

Manufacturer	Brand	Total Operations	
		12,1931	
Heraeus Medical	PALACOS ANTIBIOTIC	53,983	44.3%
Schering-Plough	PALACOS ANTIBIOTIC	20,979	17.2%
Stryker Howmedica Osteonics	SIMPLEX ANTIBIOTIC	13,963	11.5%
Biomet	PALACOS ANTIBIOTIC	13,657	11.2%
DePuy	SMARTSET HV ANTIBIOTIC LOADED CEMENT	8,922	7.3%
DePuy	CMW1 ANTIBIOTIC LOADED CEMENT	5,570	4.6%
DePuy	CMW2 ANTIBIOTIC LOADED CEMENT	2,911	2.4%
DePuy	CMW3 ANTIBIOTIC LOADED CEMENT	718	0.6%
Heraeus Medical	PALAMED	579	0.5%
DePuy	SMARTSET ENDURANCE ANTIBIOTIC LOADED CEMENT	174	0.1%
Biomet	OSTEOPAL ANTIBIOTIC	130	0.1%
Biomet	OPTIVAC REGULAR	110	0.1%
Heraeus Medical	COPAL ANTIBIOTIC LOADED	75	0.1%
Biomet	BIOMET REFOBACIN REVISION	50	<0.0%
DePuy	CMW2000 ANTIBIOTIC LOADED CEMENT	48	<0.0%
DePuy	SMARTSET MV ANTIBIOTIC LOADED CEMENT	28	<0.0%
Biomet	OPTIPAC	13	<0.0%
Biomet	COPAL ANTIBIOTIC LOADED	11	<0.0%
DePuy	CMW1 PLAIN CEMENT	6	<0.0%
Biomet	CUSTOM MADE	1	<0.0%
DePuy	CEMVAC ANTIBIOTIC LOADED CEMENT	1	<0.0%
DePuy	ENDURANCE ANTIBIOTIC LOADED CEMENT	1	<0.0%
Midland Medical Technologies Ltd	WRIGHT MEDICAL BONE CEMENT	1	<0.0%

Table 17 Brands of non-antibiotic bone cement entered into the NJR in 2007

Manufacturer	Brand	Total Operations	
		9,478	
Stryker Howmedica Osteonics	SIMPLEX	3,654	38.6%
Schering-Plough	PALACOS	1,959	20.7%
Biomet	PALACOS	1,242	13.1%
DePuy	CMW2 PLAIN CEMENT	906	9.6%
DePuy	CMW1 PLAIN CEMENT	680	7.2%
Heraeus Medical	PALACOS	615	6.5%
DePuy	SMARTSET HV PLAIN CEMENT	202	2.1%
DePuy	CMW3 PLAIN CEMENT	152	1.6%
Corin	CORIPLAST	51	0.5%
Biomet	OSTEOPAL	14	0.1%
DePuy	CMW2000 PLAIN CEMENT	1	<0.0%
DePuy	ENDURANCE PLAIN CEMENT	1	<0.0%
DePuy	SMARTSET/ENDURANCE PLAIN CEMENT	1	<0.0%

Table 18 Brands of synthetic bone substitute entered into the NJR in 2007

Manufacturer	Brand	Total Operations	
		575	
Smith & Nephew	ENDOPLUS BONE SUBSTITUTE	309	53.7%
Stryker Howmedica Osteonics	BONESAVE	86	15.0%
Surgicraft	SURGICRAFT	42	7.3%
Wright Medical UK Ltd	OSTEOSET	35	6.1%
Synthes	DBX	33	5.7%
Corin	BIOFUSE	18	3.1%
ApaTech Products	APATECH BONE SUBSTITUTE	16	2.8%
Synthes	SYNTHES BONE SUBSTITUTE	12	2.1%
Smith & Nephew	ALLOGRAN (ENDOPLUS)	11	1.9%
Exactech (UK) Ltd	OPTEFORM	4	0.7%
Joint Replacement Instrumentation Ltd	REPROS	3	0.5%
Smith & Nephew	STIMULAN (ENDOPLUS)	2	0.3%
Stryker Howmedica Osteonics	SCORPIO	2	0.3%
Smith & Nephew	B-Gran	1	0.2%
Quadrant Medical Ltd	VITOSS	1	0.2%