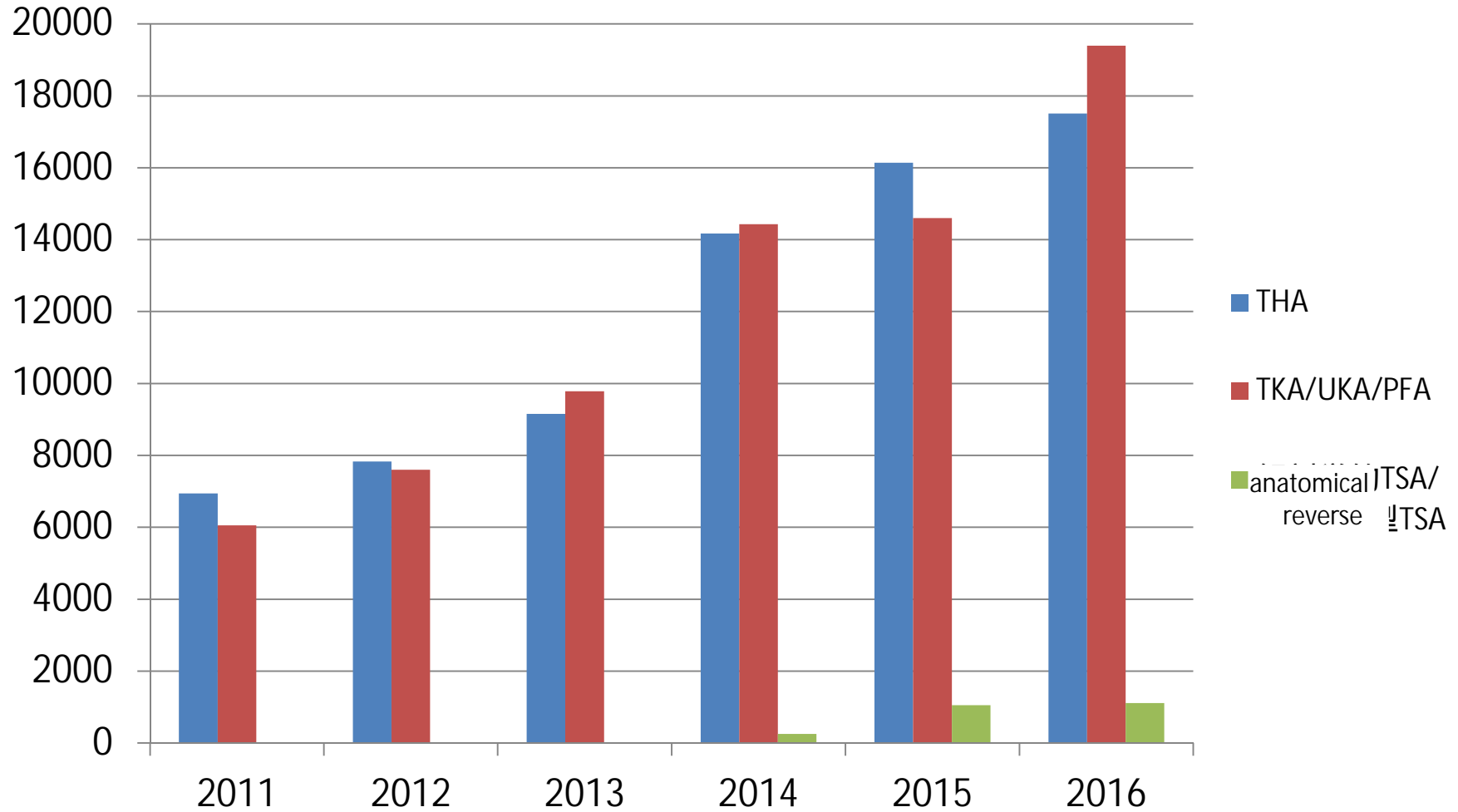


Japan Arthroplasty Register
Annual Report 2013 ~ 2016

Number of Registrations

cases



Number of hospitals

| Year | Numbers |
|-------|---------|
| 2006 | 10 |
| 2007 | 1 |
| 2008 | 58 |
| 2009 | 14 |
| 2010 | 11 |
| 2011 | 2 |
| 2012 | 34 |
| 2013 | 28 |
| 2014 | 93 |
| 2015 | 412 |
| 2016 | 403 |
| 2017 | 122 |
| total | 1188 |

| | primary | revision | total | | male | female | unknown |
|---------|---------|----------|-------|--|------|--------|---------|
| THA | 8384 | 769 | 9153 | | 1482 | 7667 | 4 |
| TKA/UKA | 9488 | 300 | 9788 | | 1758 | 8020 | 10 |

Record date : April 2013 ~ March 2014

| | primary | revision | total | | male | female | unknown |
|-------------|---------|----------|-------|--|------|--------|---------|
| THA | 13087 | 1082 | 14169 | | 2440 | 11706 | 23 |
| TKA/UKA | 14011 | 416 | 14427 | | 2700 | 11704 | 23 |
| Reverse TSA | 244 | 10 | 254 | | 95 | 159 | 0 |

Record date : April 2014 ~ March 2015

| | primary | revision | total | | male | female | unknown |
|-------------|---------|----------|-------|--|------|--------|---------|
| THA | 14994 | 1149 | 16143 | | 2727 | 13386 | 30 |
| TKA/UKA | 14197 | 406 | 14603 | | 2860 | 11728 | 15 |
| Reverse TSA | 1004 | 51 | 1055 | | 389 | 663 | 3 |

Record date : April 2015 ~ March 2016

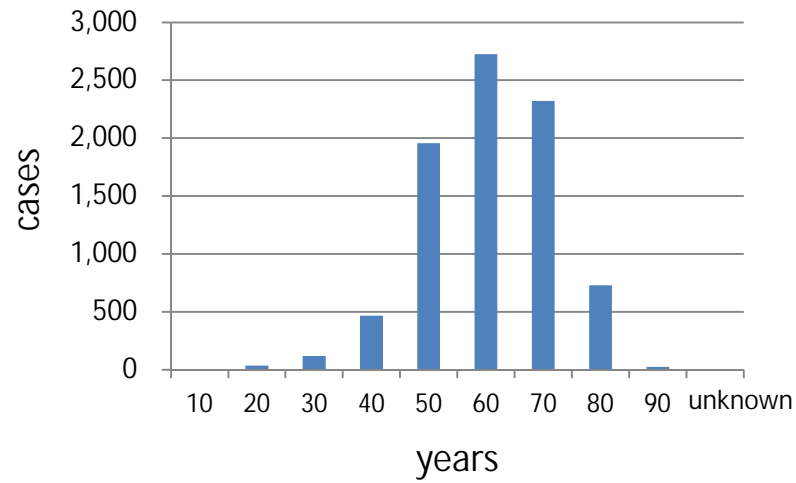
| | primary | revision | total | | male | female | unknown |
|------------------------------|---------|----------|-------|--|------|--------|---------|
| THA | 16373 | 1134 | 17507 | | 3062 | 14348 | 97 |
| TKA/UKA/PFA | 18839 | 557 | 19396 | | 3919 | 15453 | 24 |
| AnatomicalTSA/ reverseTSA | 1059 | 56 | 1115 | | 383 | 731 | 1 |

Record date : April 2016 ~ March 2017

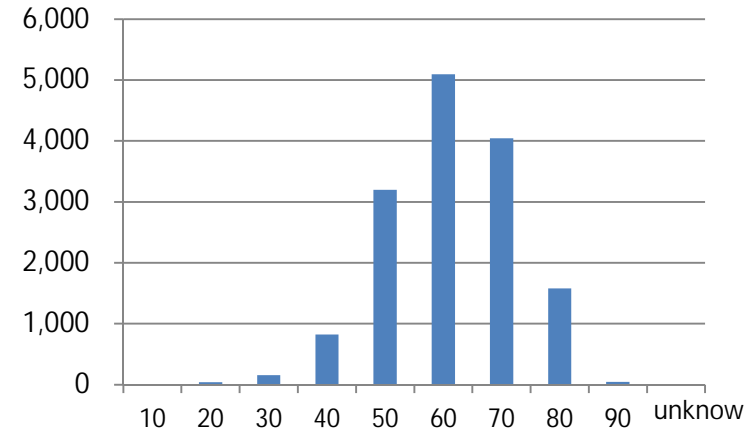
Anatomical TSA : June 2016~

Primary THA : Age distribution

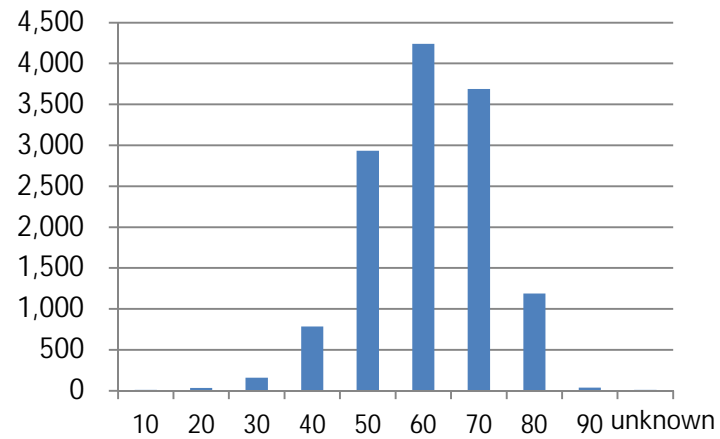
2013



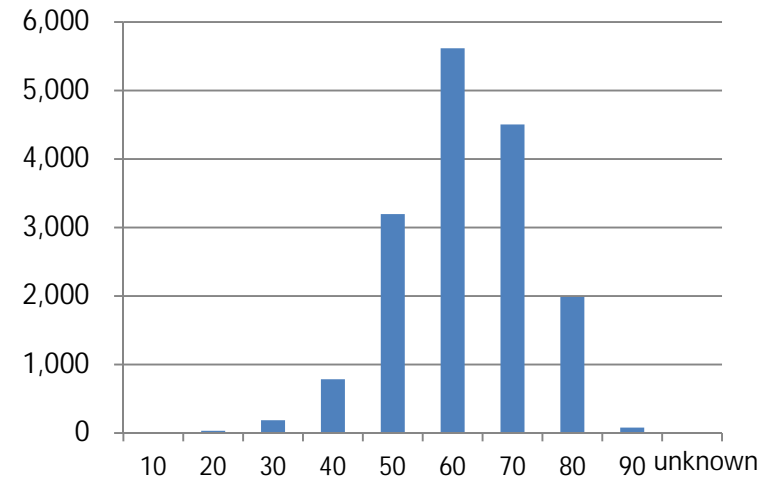
2015



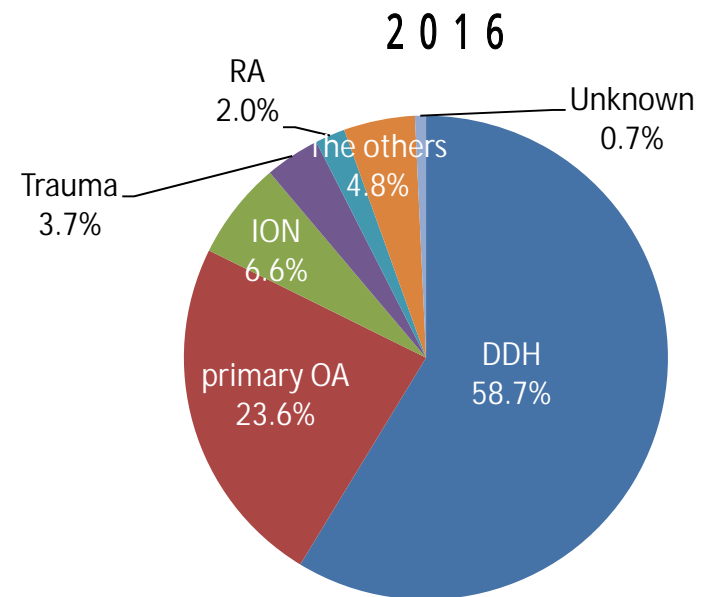
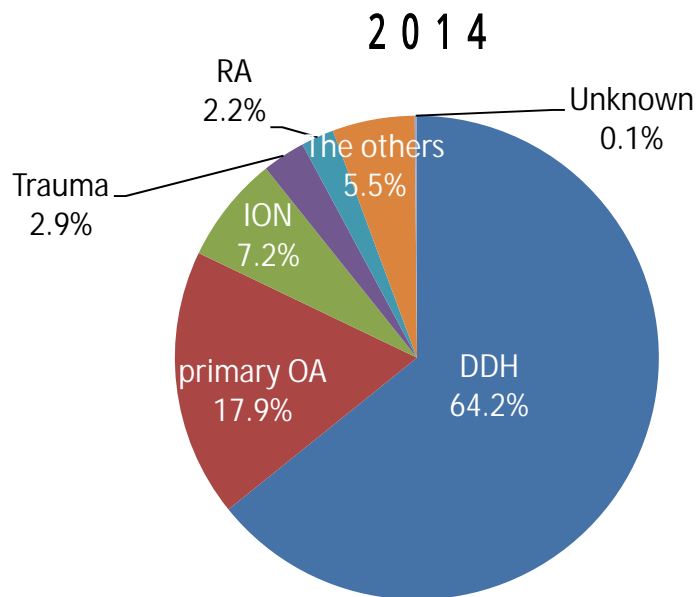
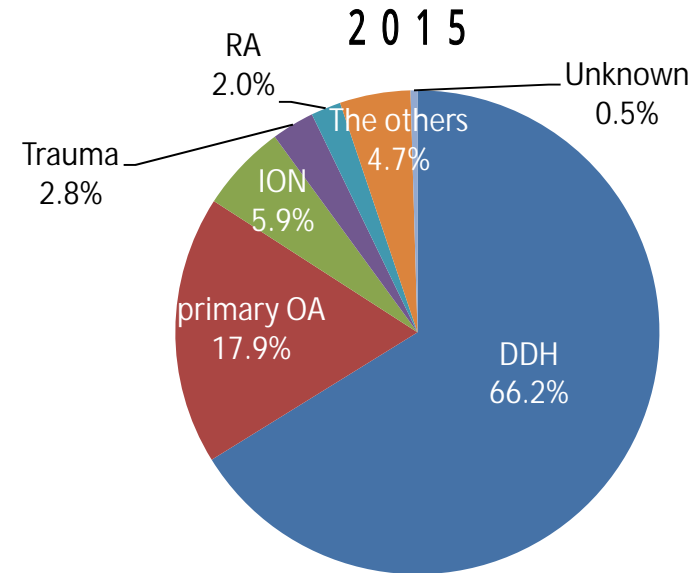
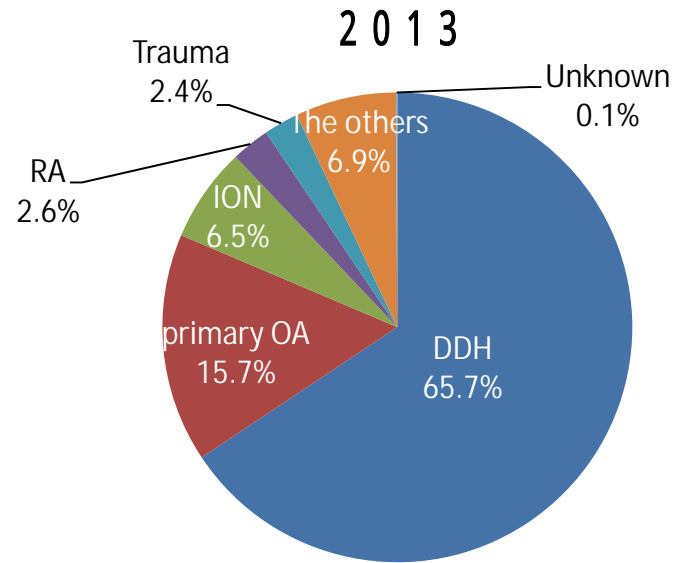
2014



2016

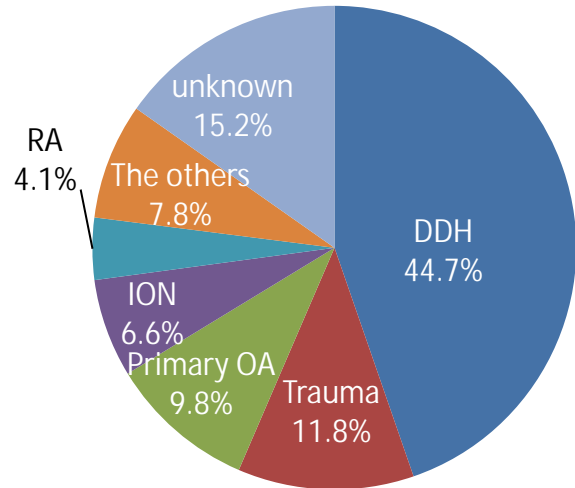


Primary THA : Initial diagnosis

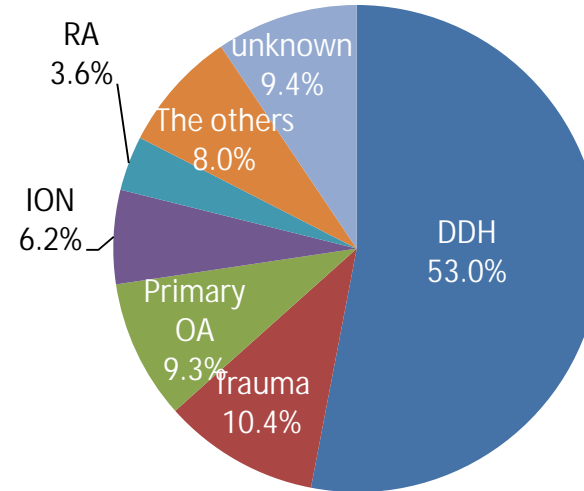


Revision THA : Initial diagnosis

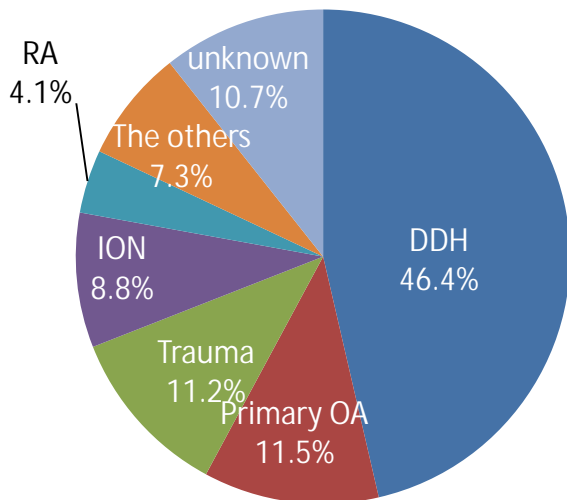
2013



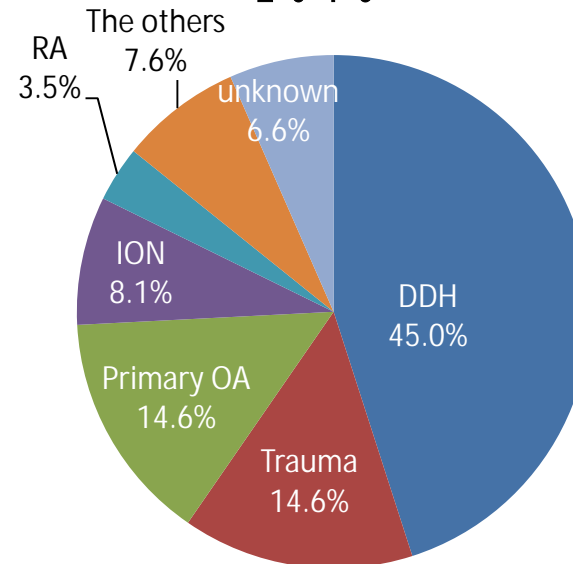
2015



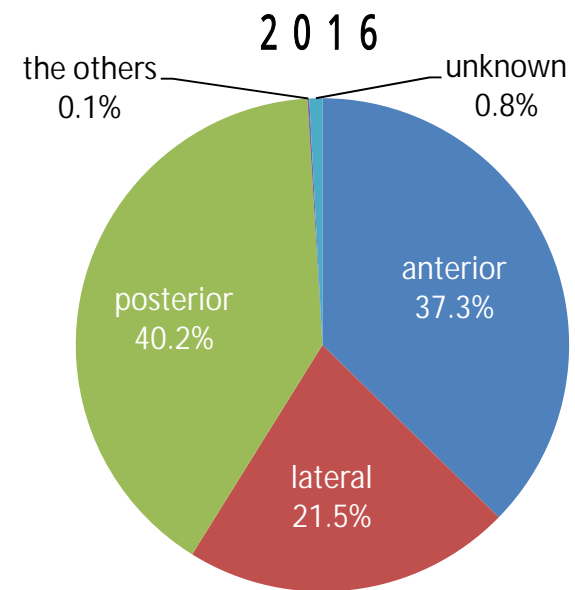
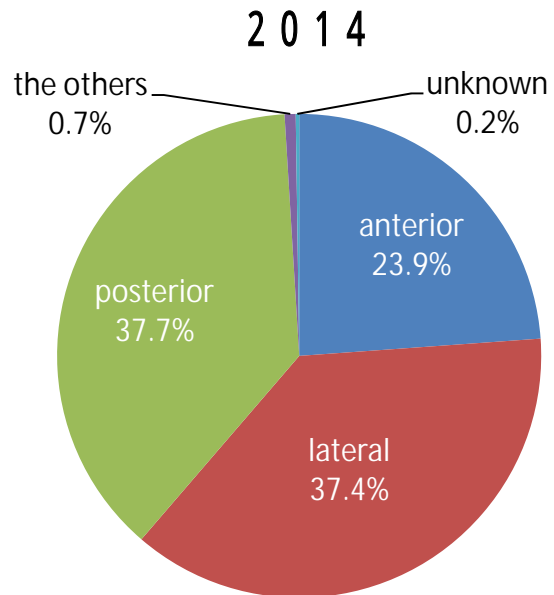
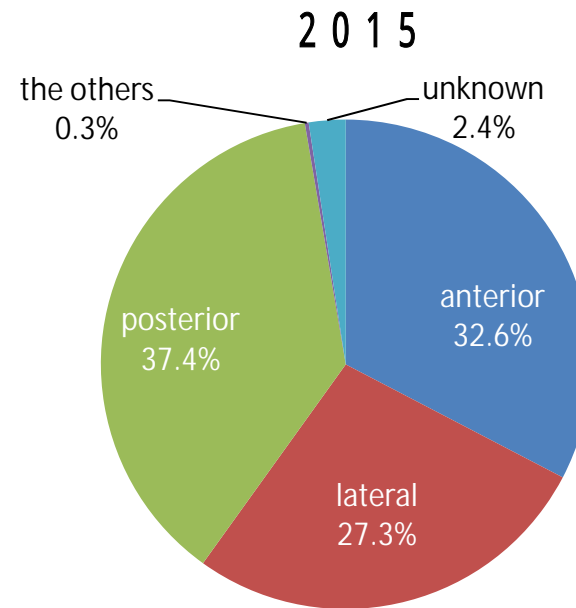
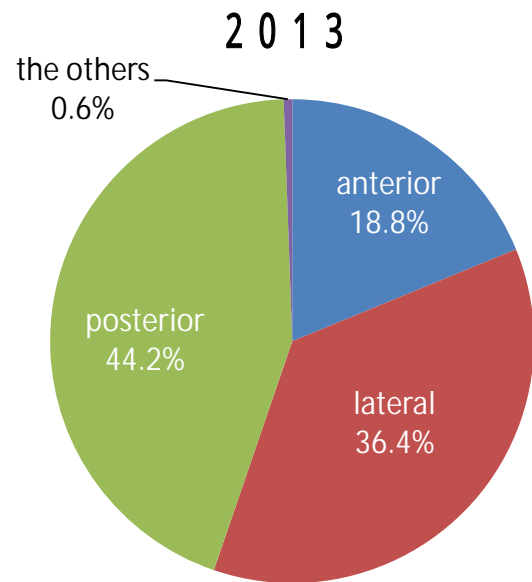
2014



2016

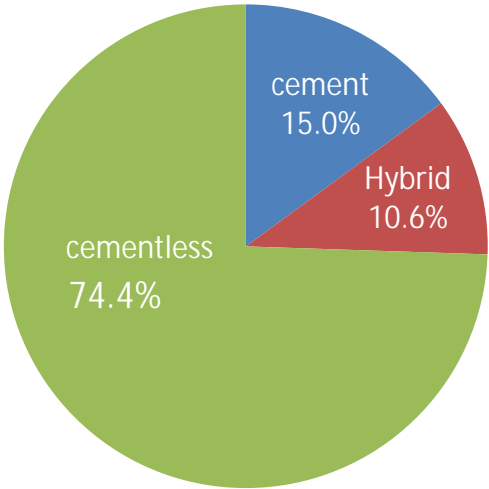


Approach

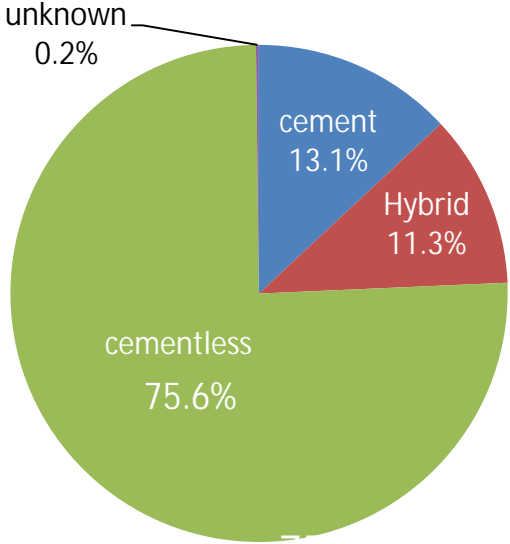


Cemented/Cementless

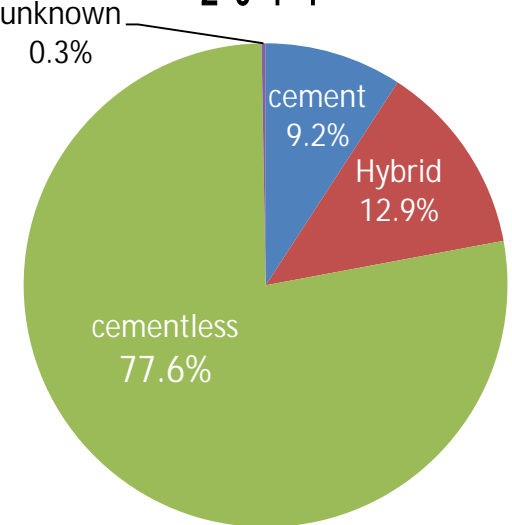
2013



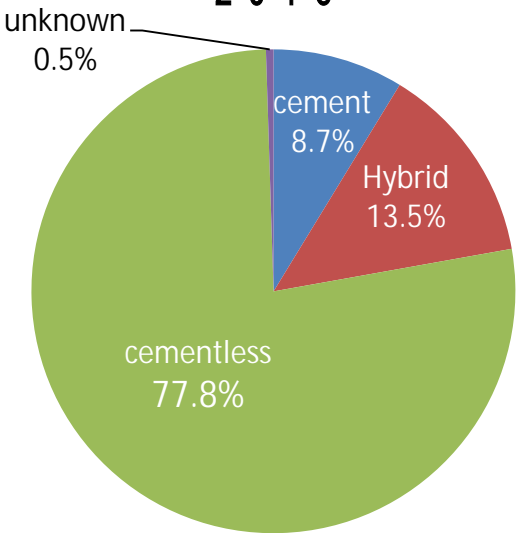
2015



2014

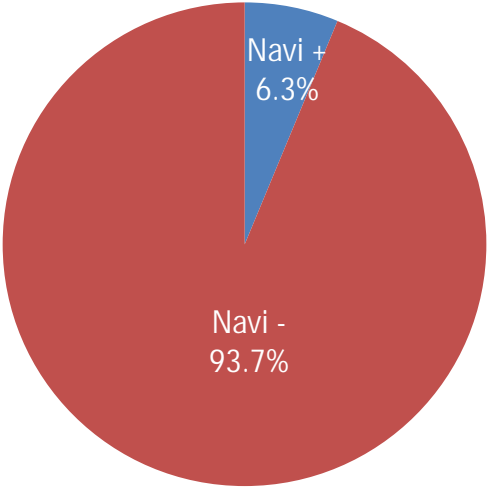


2016

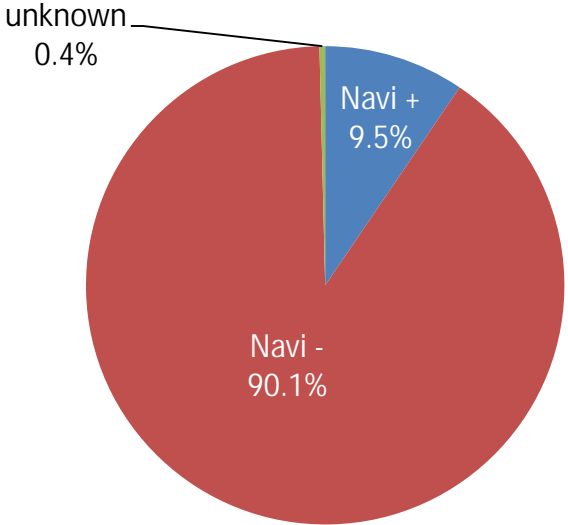


Navigation

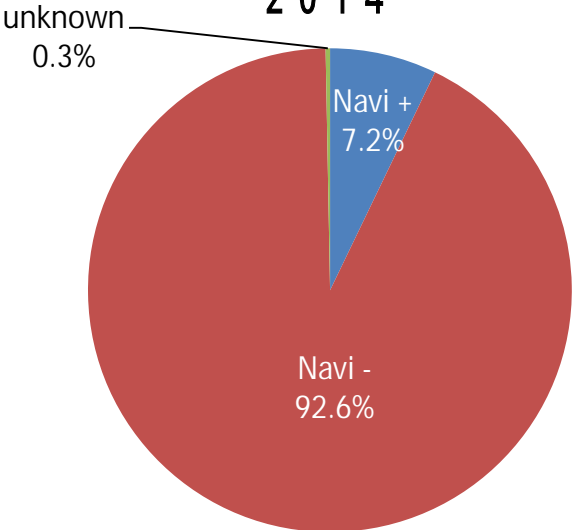
2013



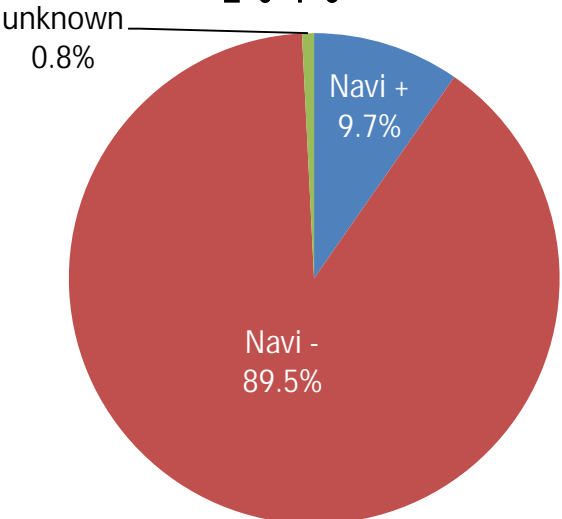
2015



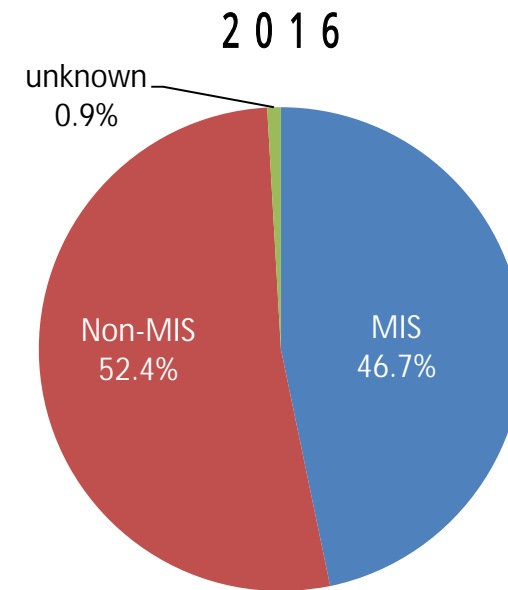
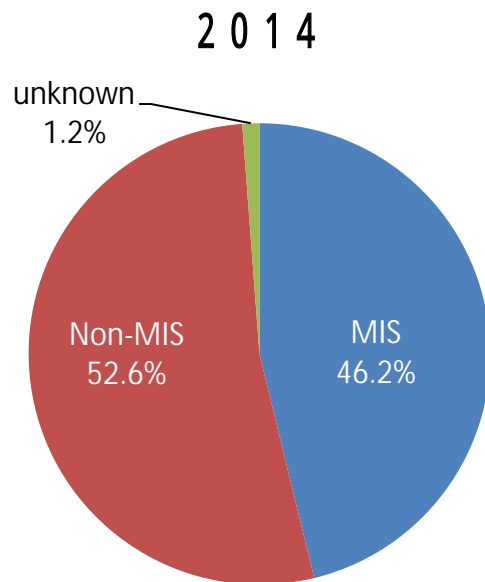
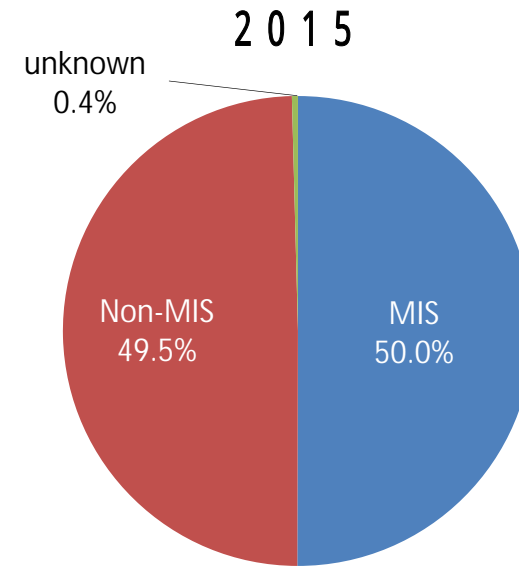
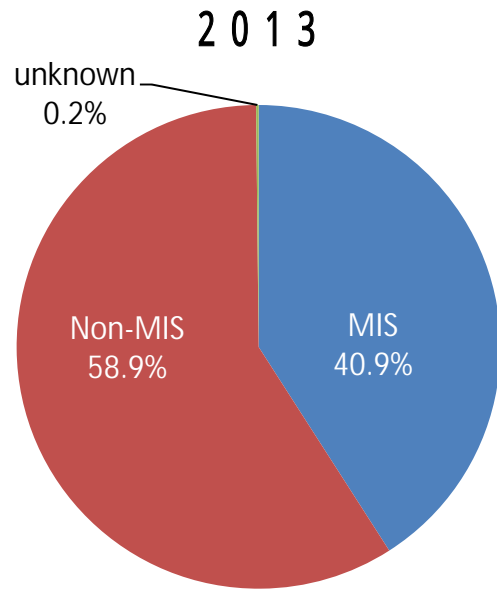
2014



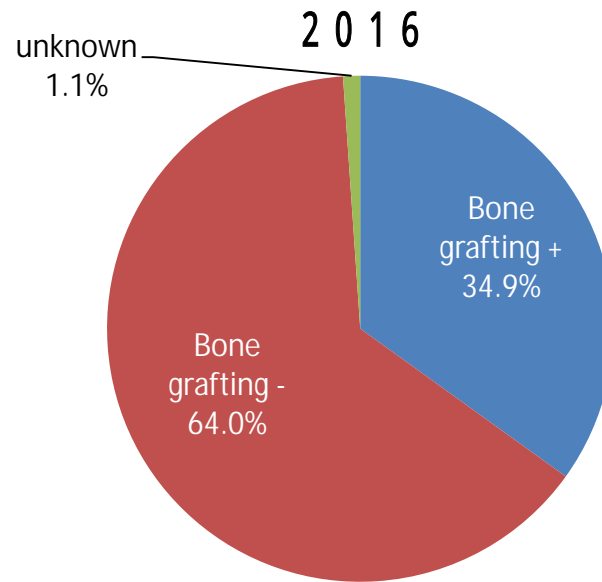
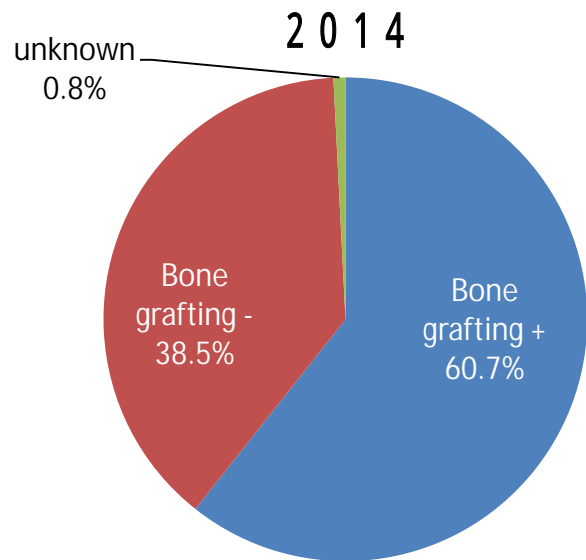
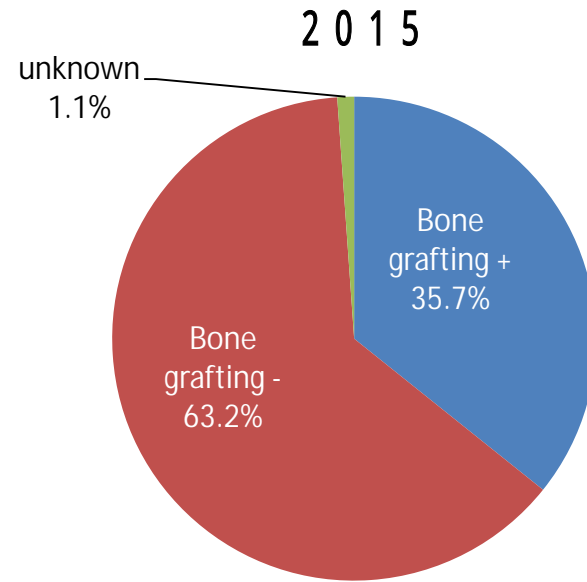
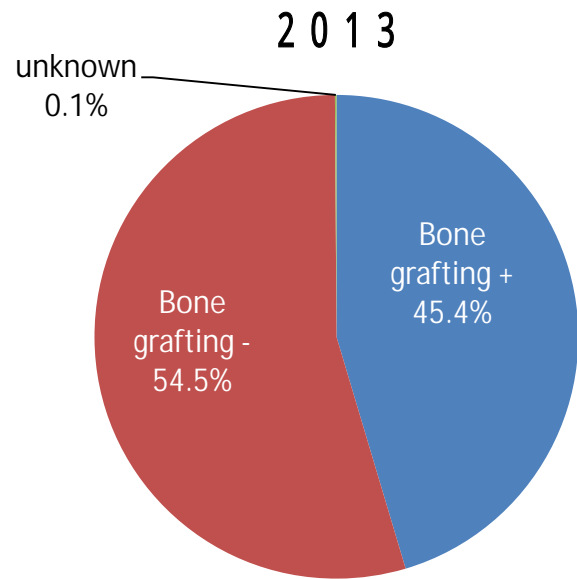
2016



MIS

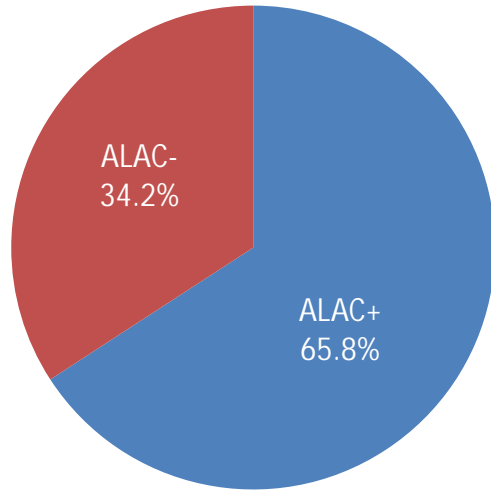


Bone grafting

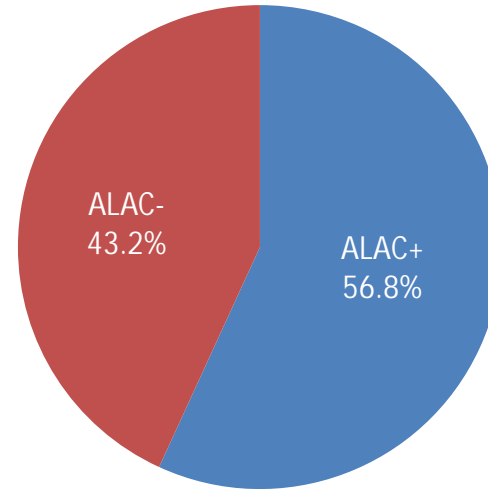


Antibiotic loaded cement (ALAC)

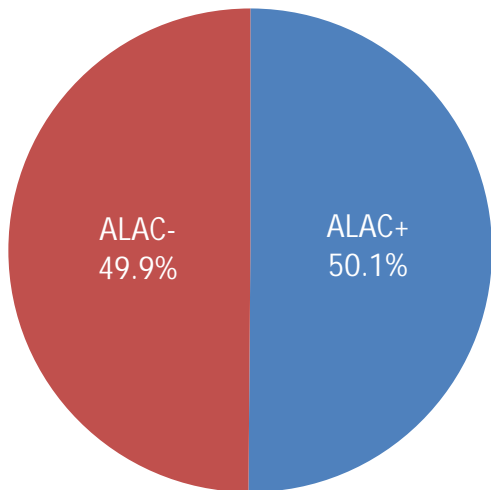
2013



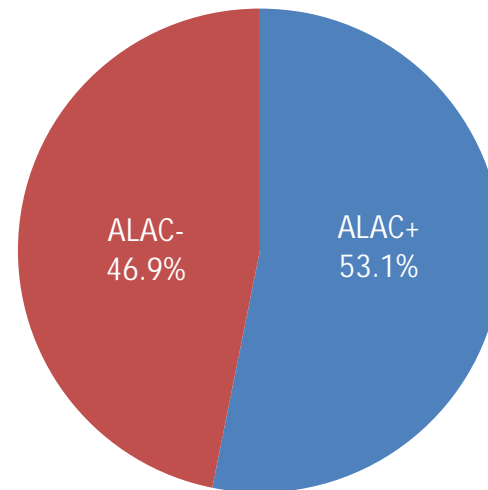
2015



2014



2016



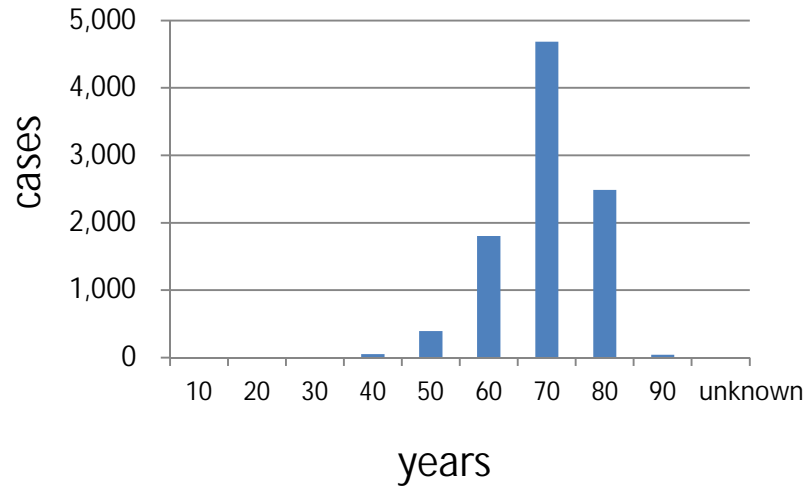
Causes of revision THA

| | 2 0 1 3 (n=769) | 2 0 1 4 (n=1082) | 2 0 1 5 (n=1149) | 2 0 1 6 (n=1134) |
|--------------------------------|--------------------|---------------------|---------------------|---------------------|
| Aseptic loosening (acetabulum) | 273 | 353 | 342 | 293 |
| Aseptic loosening (femur) | 169 | 192 | 215 | 179 |
| Infeccion | 124 | 148 | 167 | 192 |
| Polyethylene wear | 69 | 124 | 133 | 127 |
| Osteolysis (acetabulum) | 76 | 136 | 146 | 106 |
| Osteolysis (femur) | 52 | 81 | 107 | 70 |
| Implant breakage (acetabulum) | 38 | 57 | 60 | 62 |
| Implant breakage (femur) | 9 | 19 | 10 | 14 |
| Fracture (acetabulum) | 11 | 12 | 12 | 14 |
| Fracture (femur) | 37 | 53 | 76 | 77 |
| Dislocation · instability | 98 | 132 | 183 | 192 |
| The others | 81 | 123 | 129 | 125 |

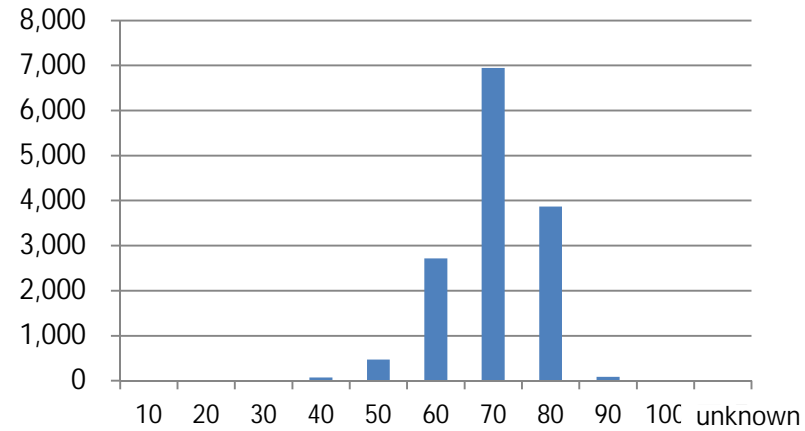
(multiple answers allowed)

Primary TKA/UKA: Age distribution

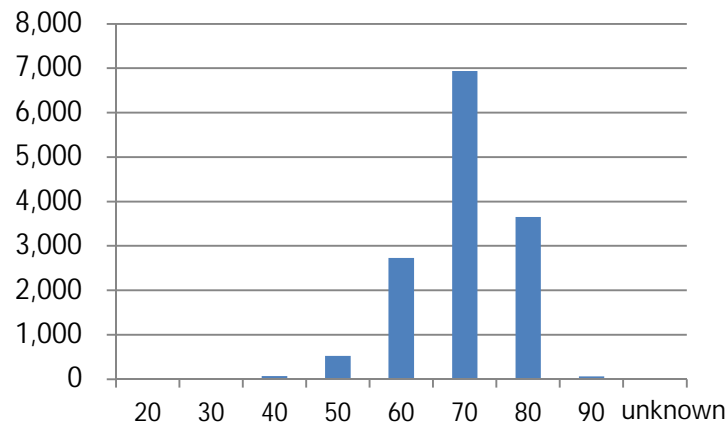
2013



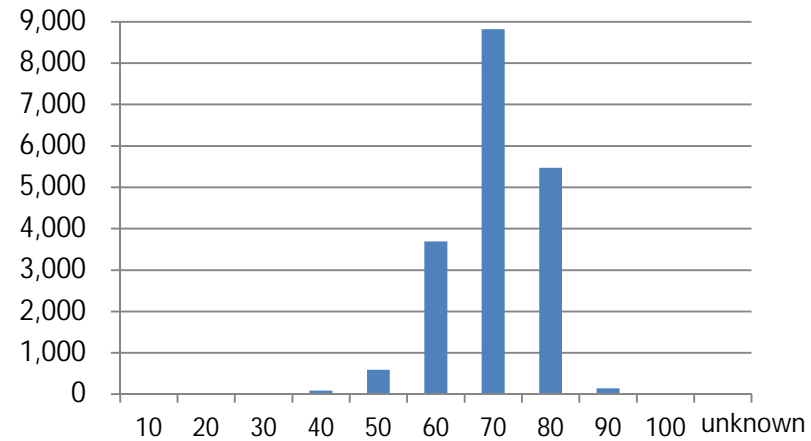
2015



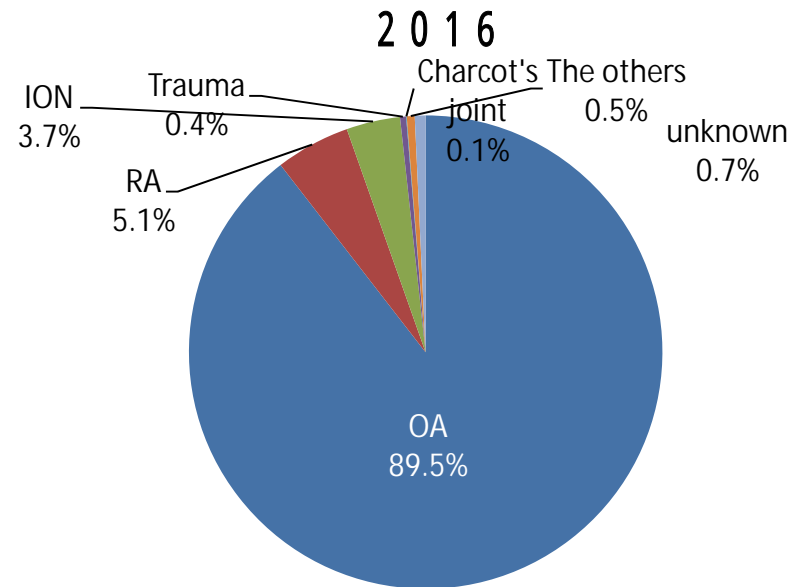
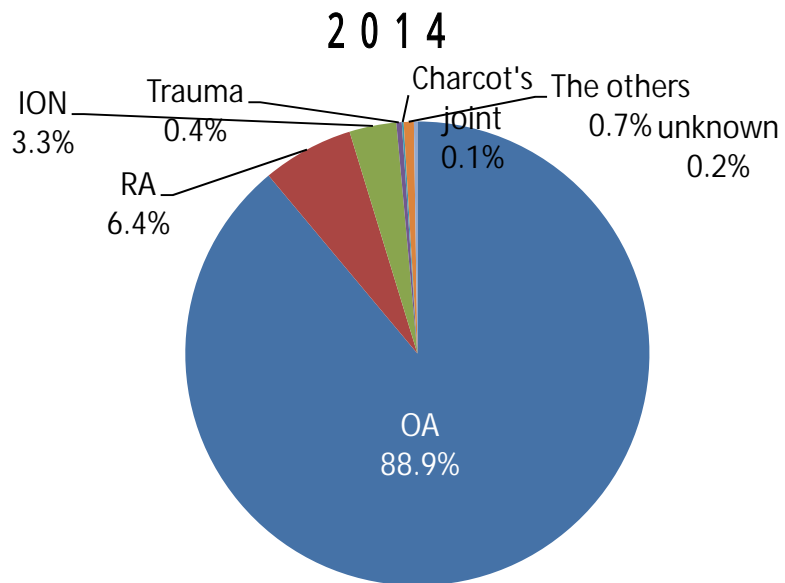
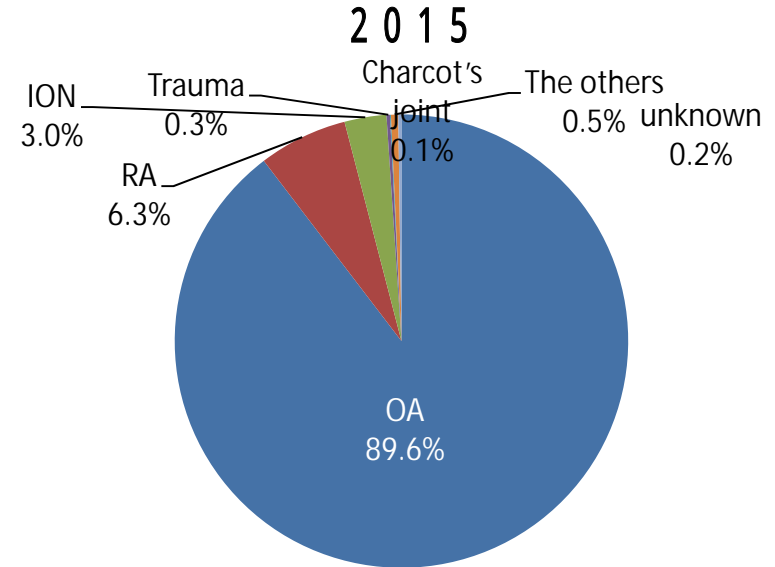
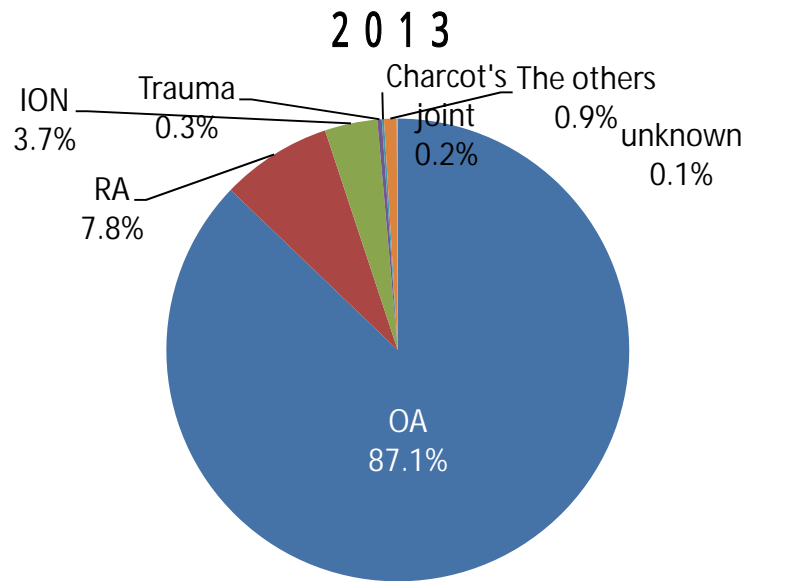
2014



2016

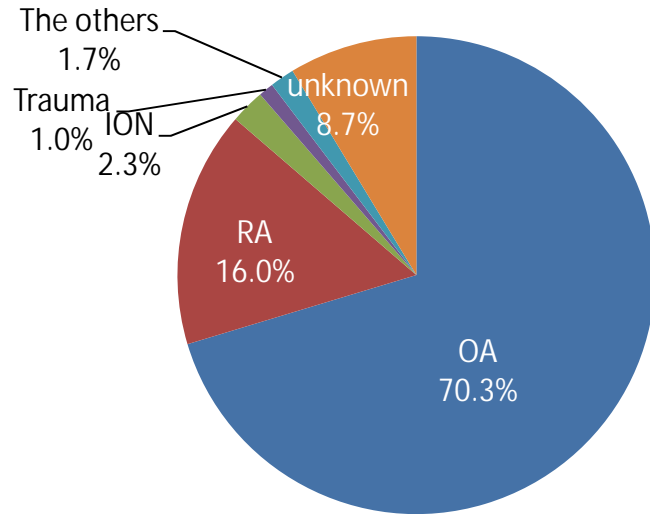


Primary TKA/UKA : Initial diagnosis

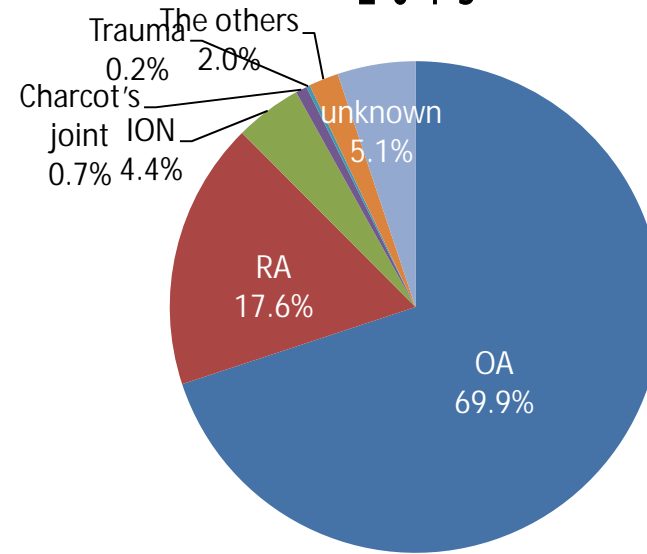


Revision TKA/UKA : Initial diagnosis

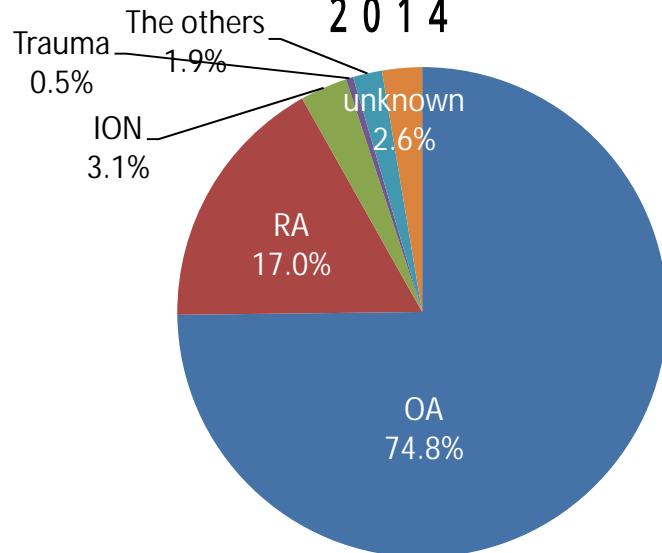
2013



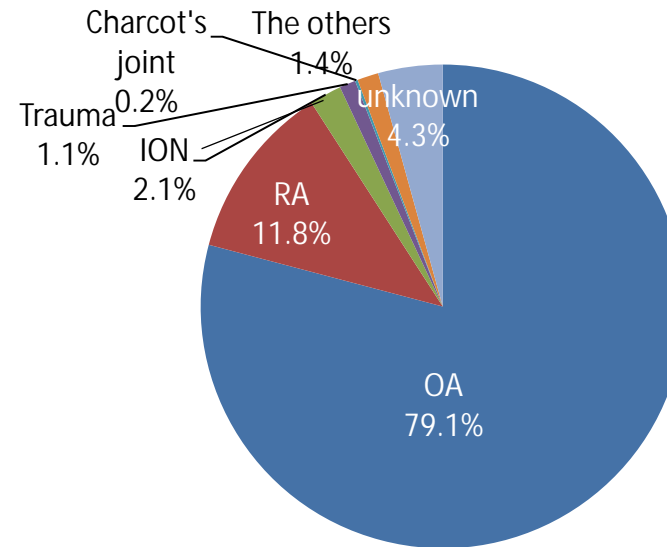
2015



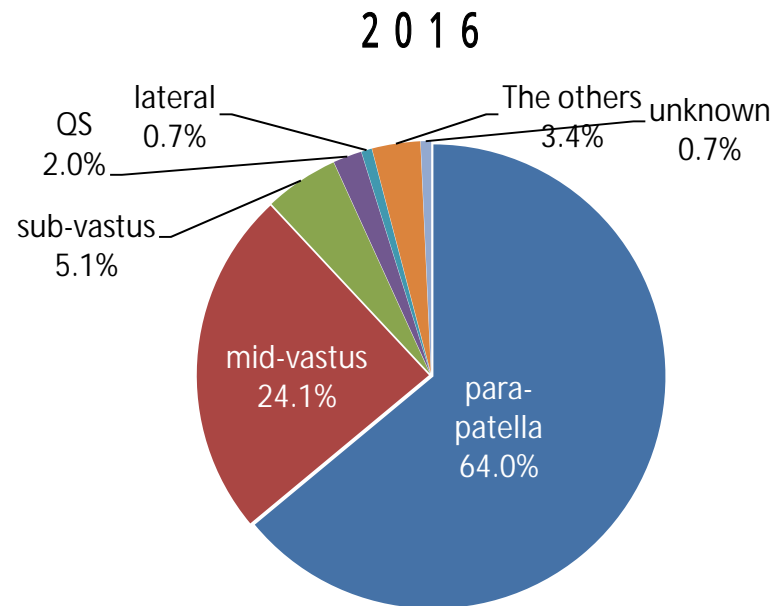
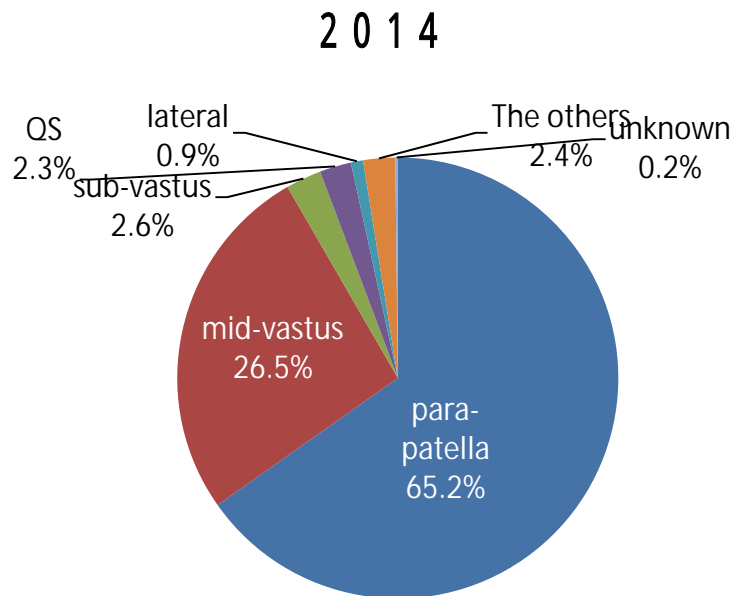
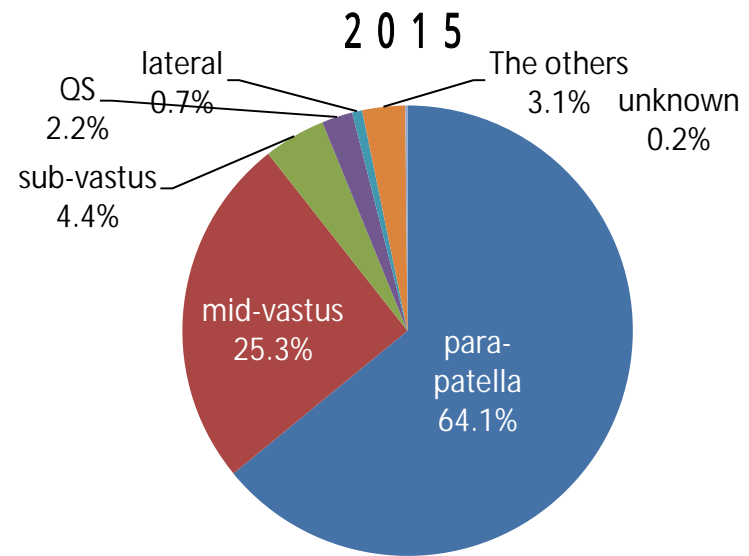
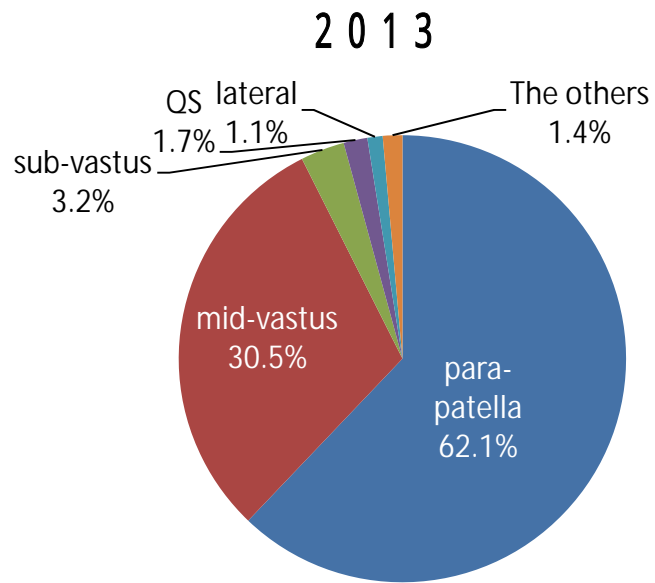
2014



2016

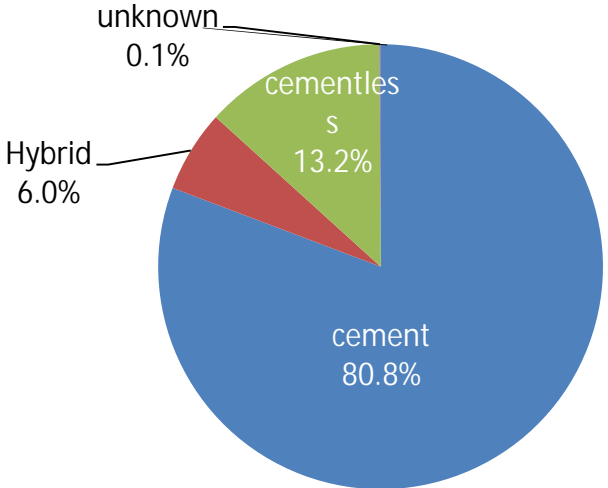


Approach

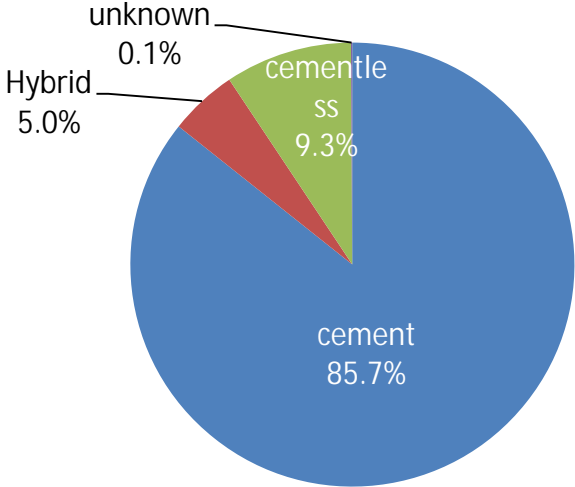


Cemented/Cementless

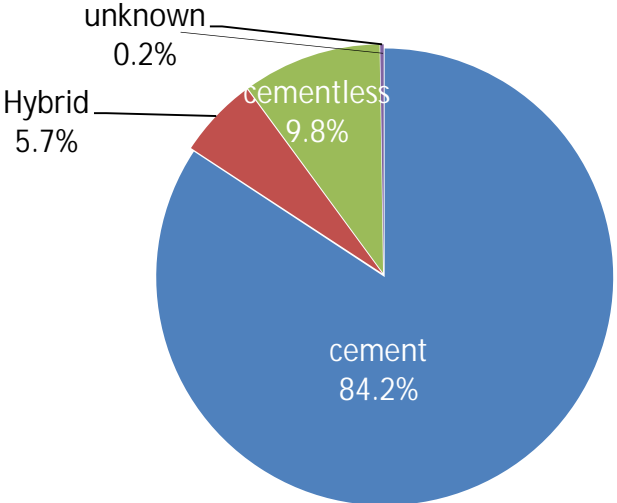
2013



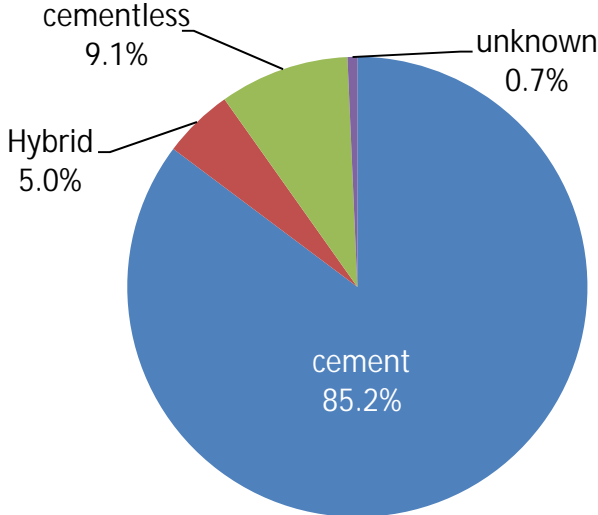
2015



2014

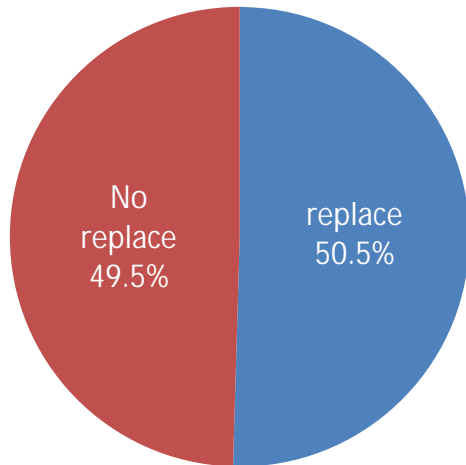


2016

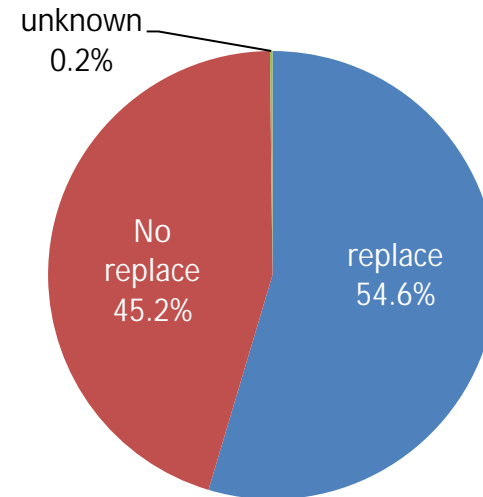


Patella replacement

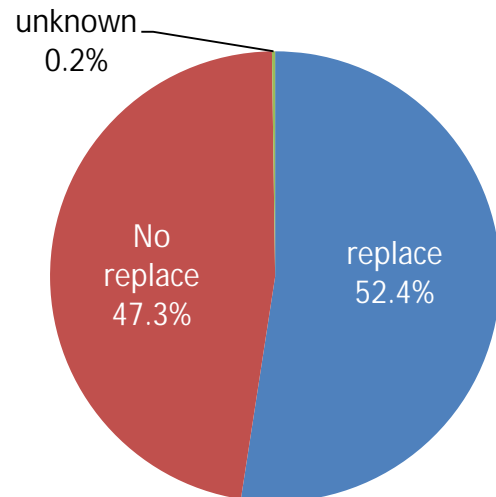
2013



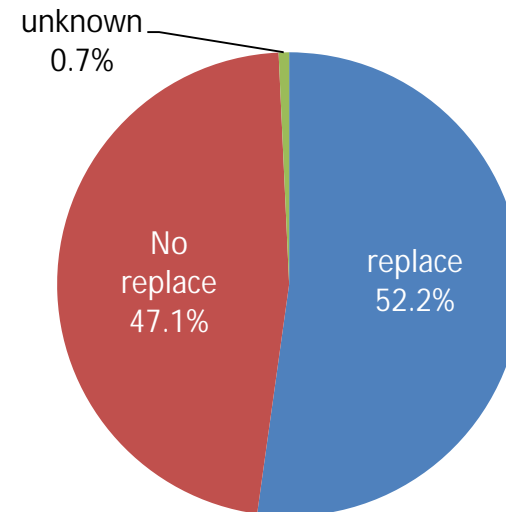
2015



2014

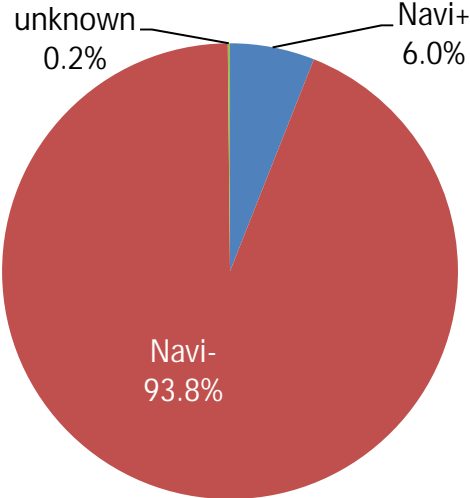


2016

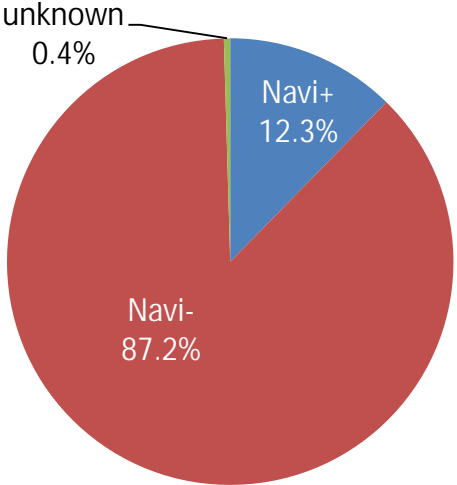


Navigation

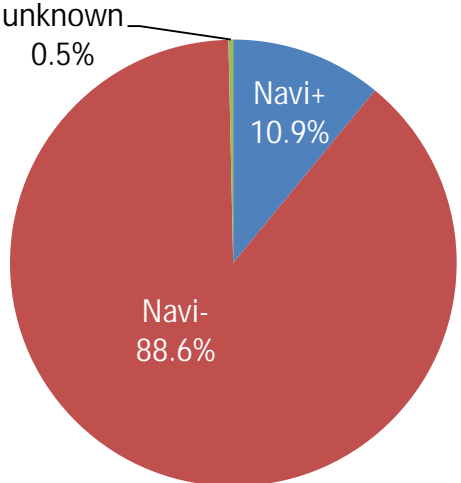
2013



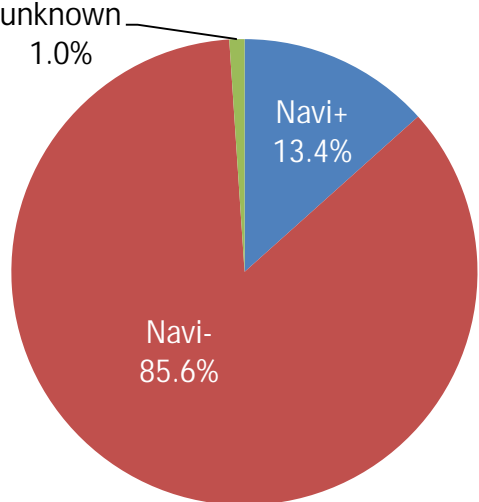
2015



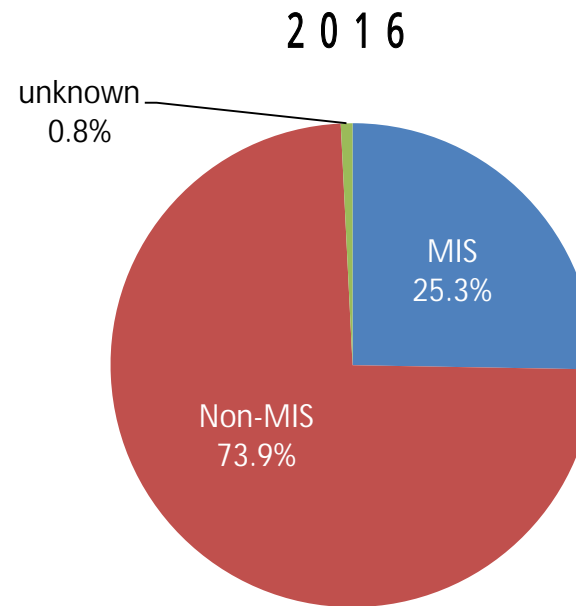
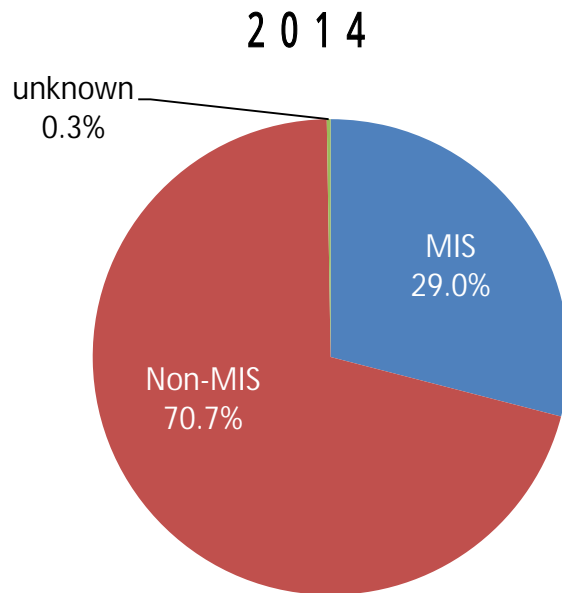
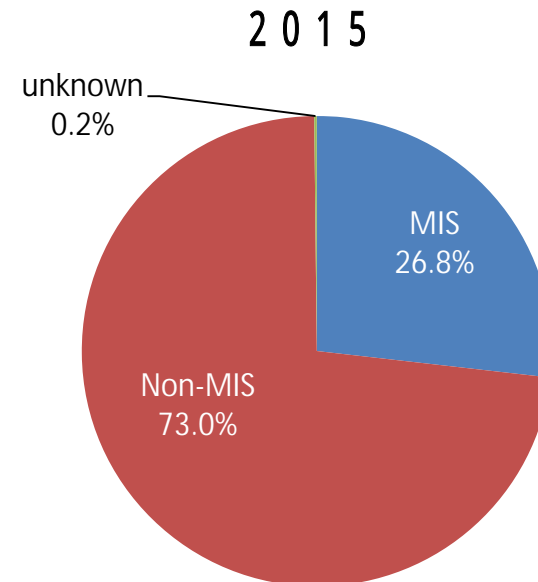
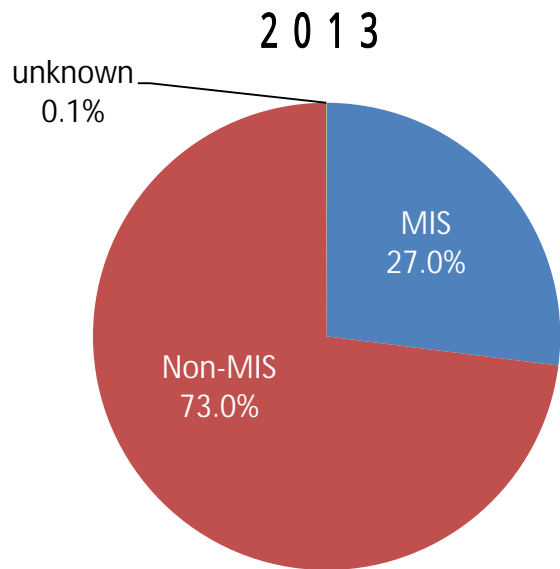
2014



2016

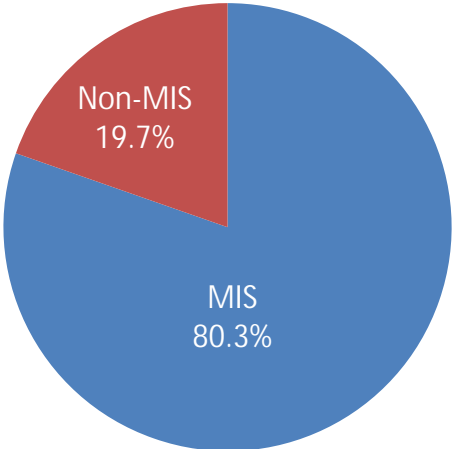


MIS

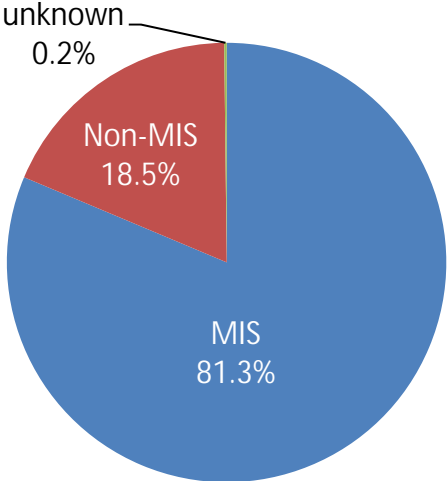


MIS (UKA)

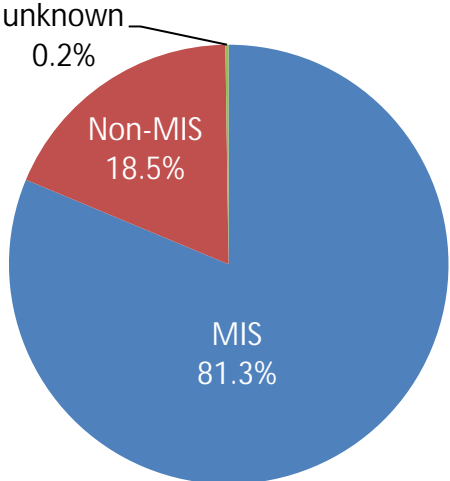
2013



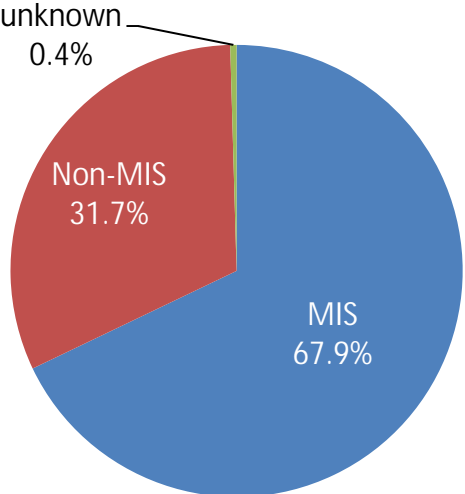
2015



2014



2016

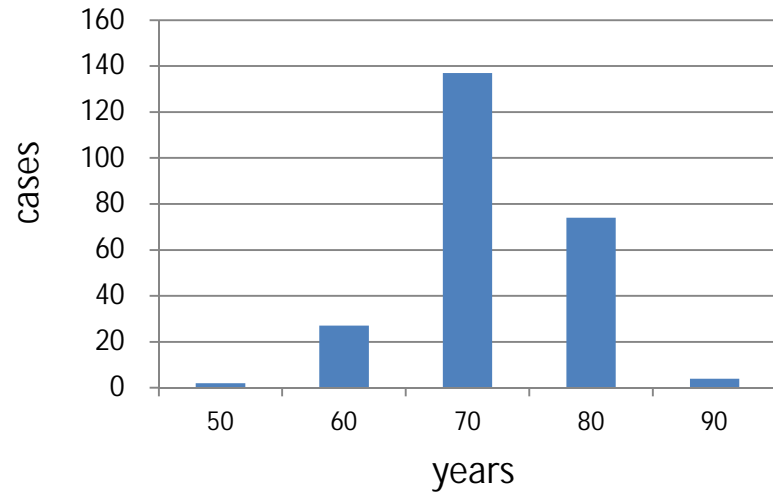


Causes of revision TKA/UKA

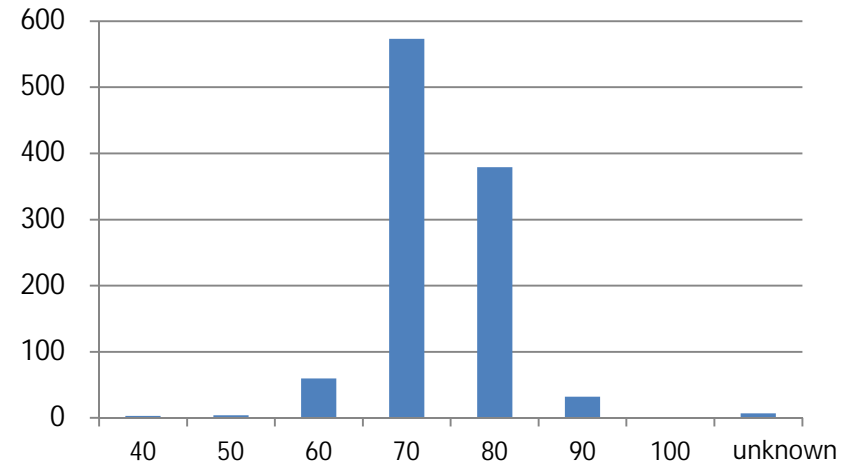
| | 2 0 1 3 | 2 0 1 4 | 2 0 1 5 | 2 0 1 6 |
|-----------------------------|---------|---------|----------------------------|---------|
| | (n=300) | (n=416) | (n=406) | (n=557) |
| | | | (multiple answers allowed) | |
| Loosening (femur) | 57 | 80 | 69 | 111 |
| Loosening (tibia) | 72 | 112 | 104 | 123 |
| Loosening (patella) | 6 | 8 | 2 | 2 |
| Infection | 95 | 119 | 121 | 203 |
| Polyethylene wear (tibia) | 39 | 51 | 51 | 50 |
| Polyethylene wear (patella) | 6 | 0 | 7 | 8 |
| Implant breakage (femur) | 1 | 2 | 2 | 2 |
| Implant breakage (tibia) | 5 | 12 | 8 | 10 |
| Implant breakage (patella) | 4 | 0 | 2 | 4 |
| Trauma | 5 | 11 | 10 | 11 |
| Dislocation · instability | 43 | 67 | 56 | 61 |
| ROM restriction | 16 | 4 | 15 | 16 |
| The others | 43 | 60 | 58 | 69 |

Primary reverse TSA : Age distribution

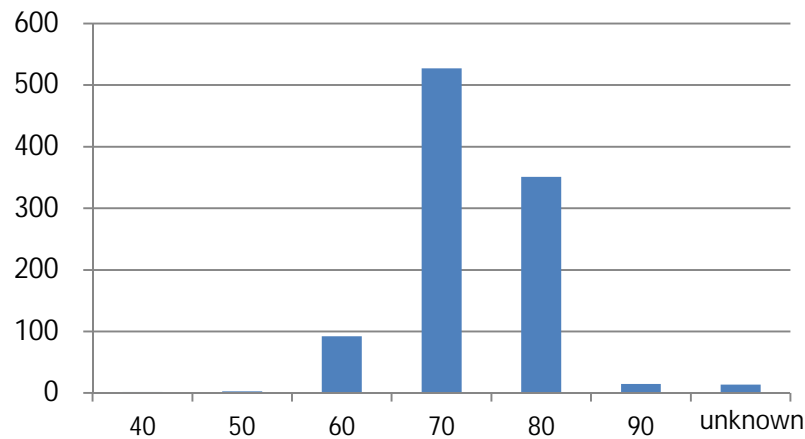
2014



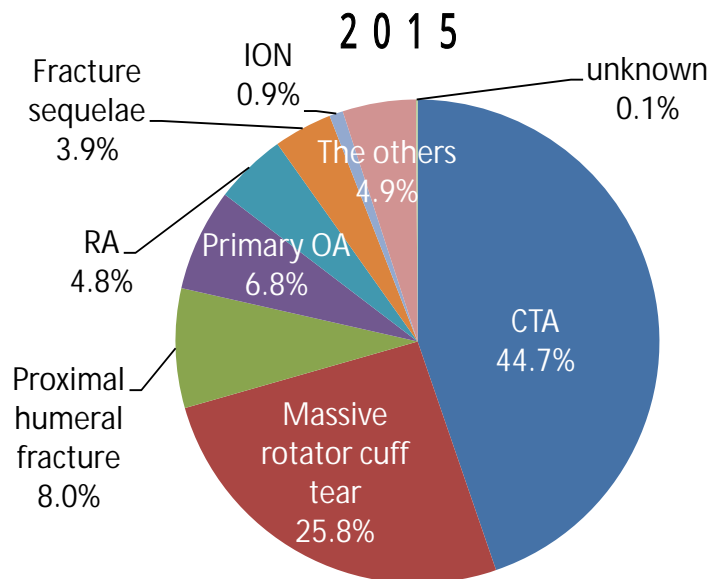
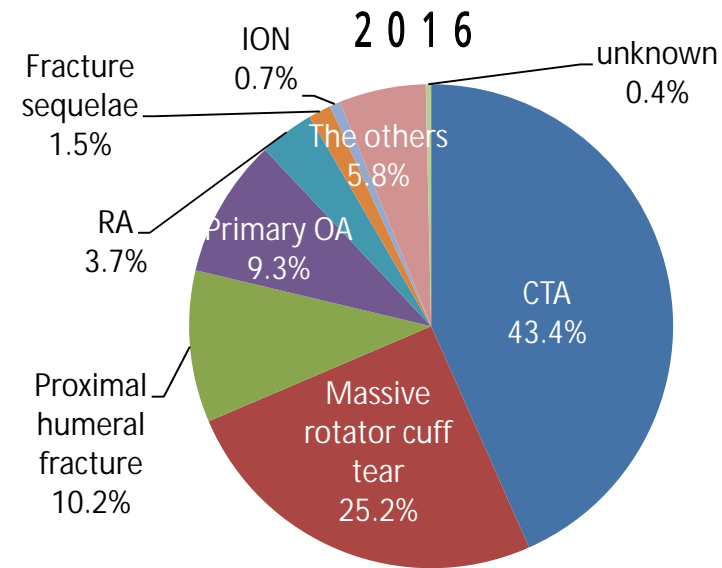
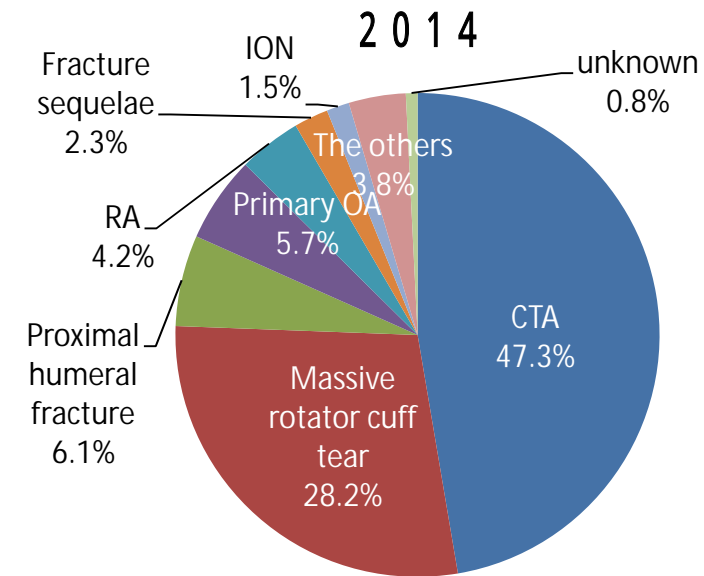
2016



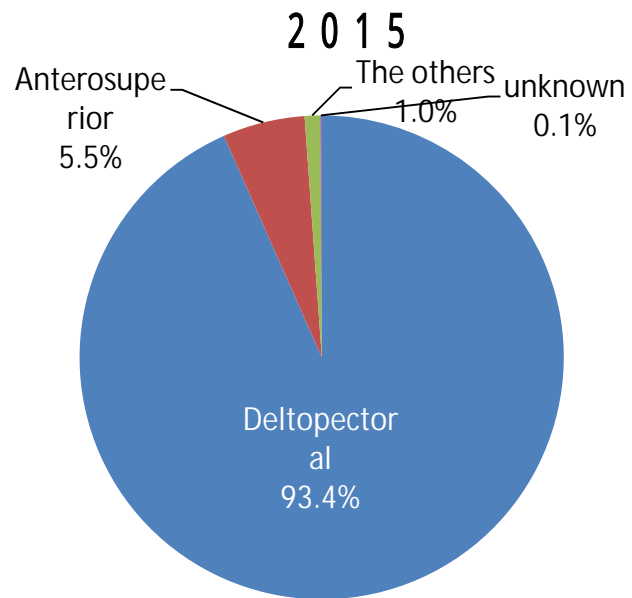
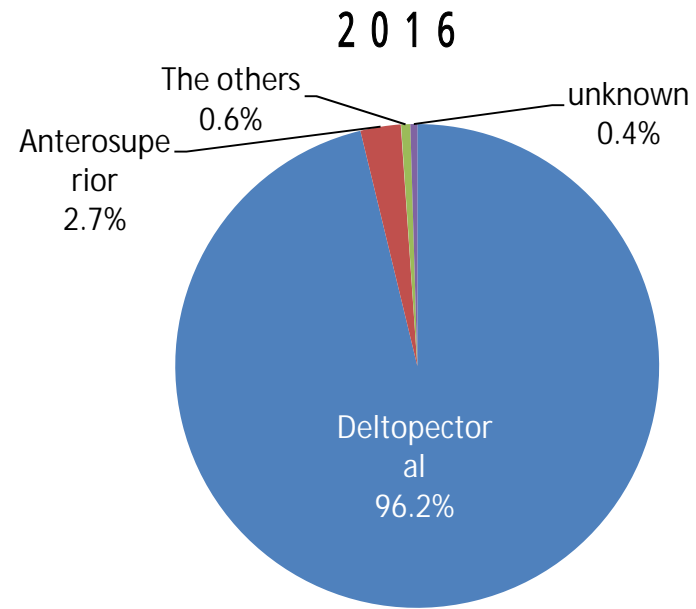
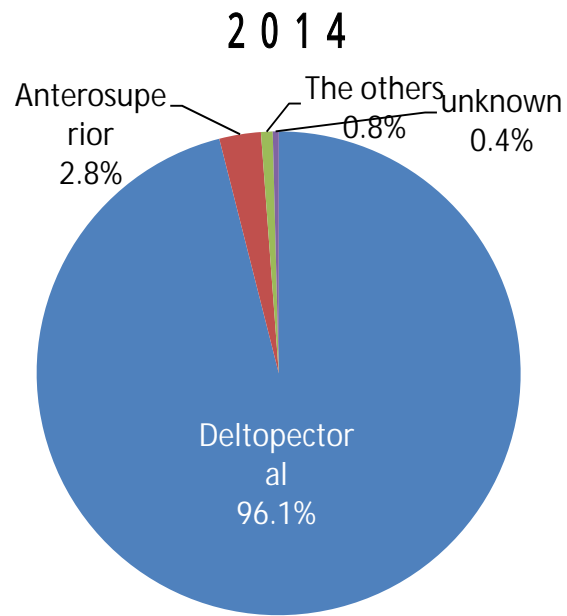
2015



Primary reverse TSA : Initial diagnosis



Approach



Cemented/Cementless

