



Fixed and Variable Geometry
Total Shoulder Arthroplasty



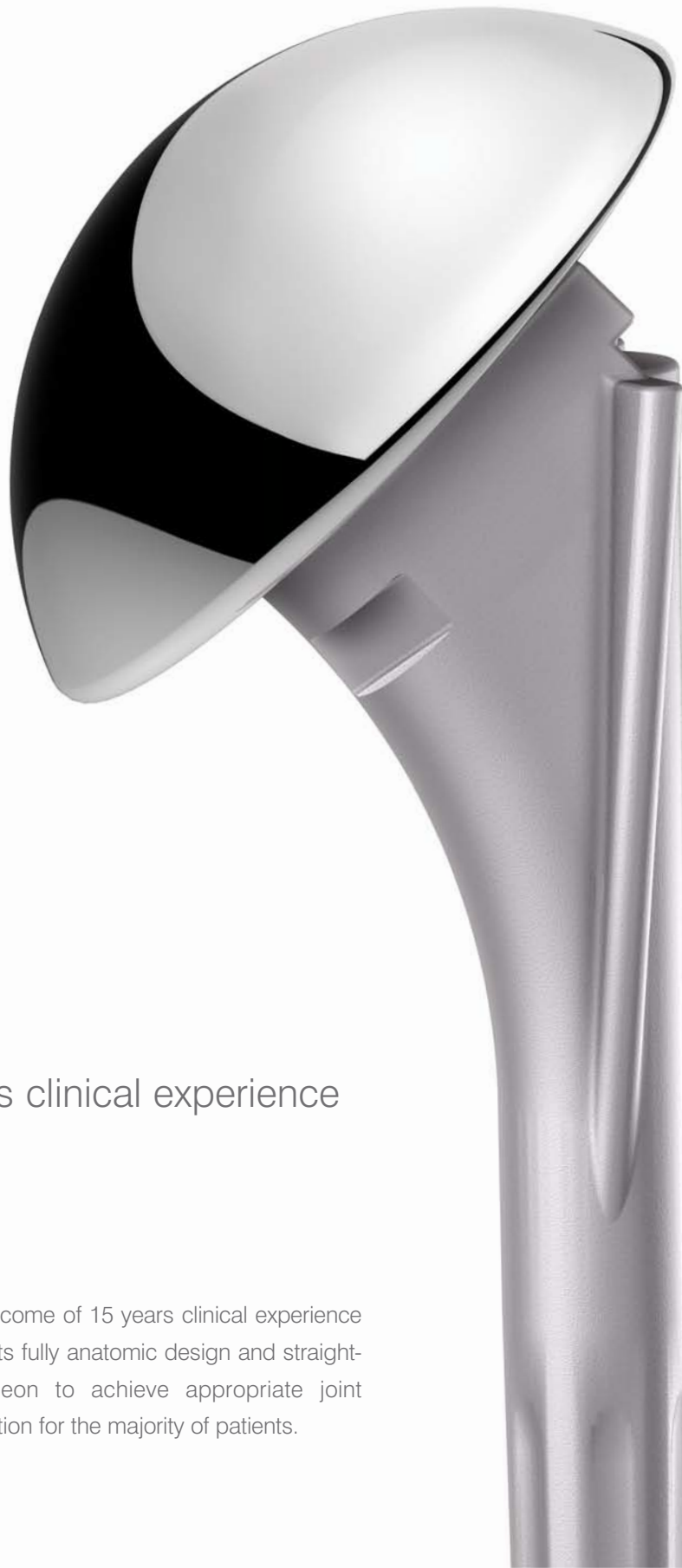




RECOVERY FUNCTION SURVIVORSHIP

DePuy believes in an approach to total shoulder replacement that places equal importance on recovery, function and survivorship.

Fixed for simplicity



Benefits from over **15** years clinical experience



The Global AP™ fixed stem is the outcome of 15 years clinical experience with the Global shoulder prosthesis. Its fully anatomic design and straightforward surgical technique assist the surgeon to achieve appropriate joint biomechanics, implant stability and range of motion for the majority of patients.

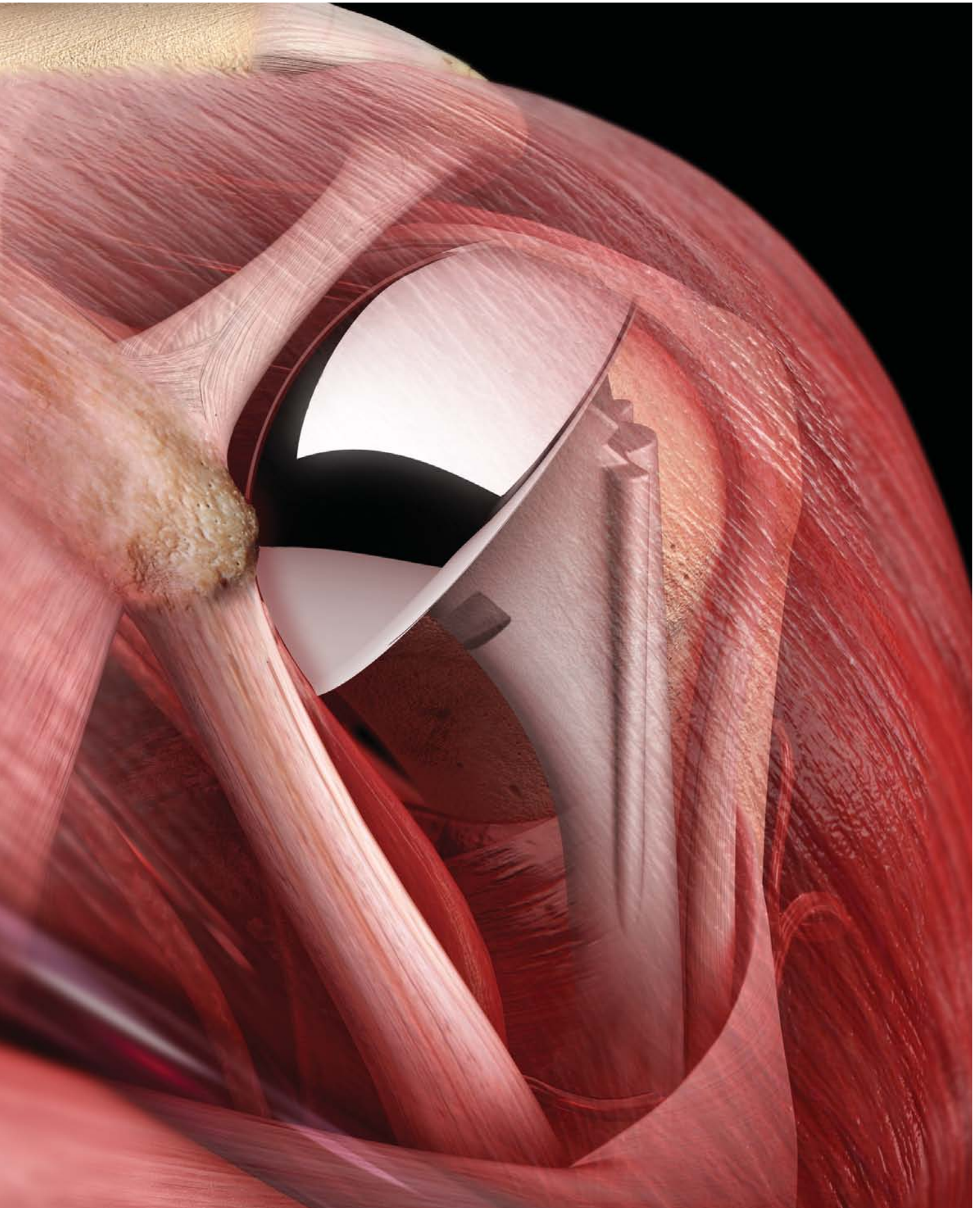
Variable for precision



variable version between ±15 degrees



The Global AP shoulder combines fixed and variable geometry in one system. Variation, of ±15 degrees, in inclination and version allows the surgeon to restore individual patient anatomy with increased accuracy compared to prostheses that are either a fixed neck or variable neck angle only design, thus providing joint stability and range of motion, without compromising implant fixation.

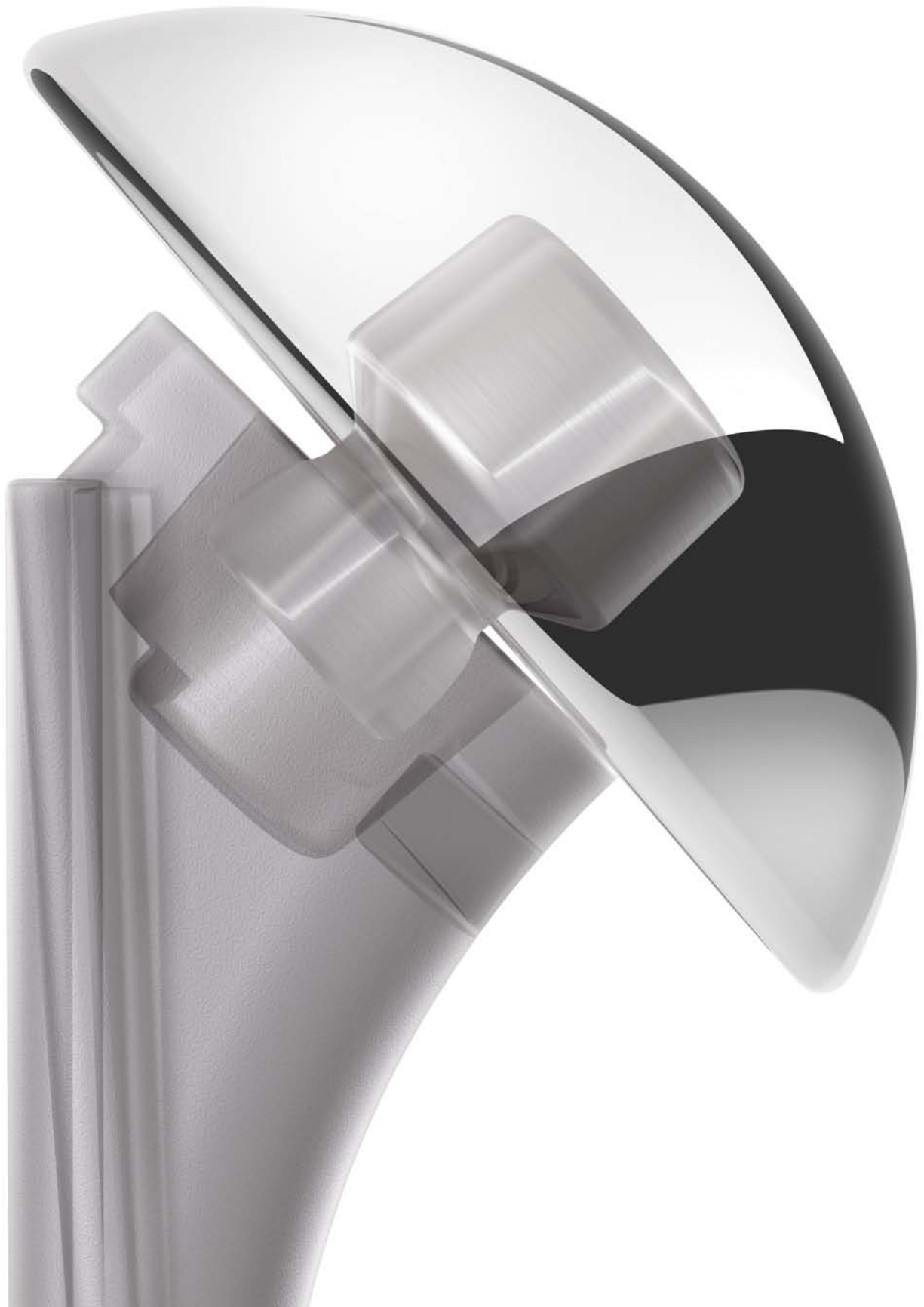


Anatomic implant design and sizing

Head size range and offset allow for proper restoration of patient anatomy.

The collarless stem allows the head to sit directly on the humeral resection plane, minimizing bone loss and restoring natural head geometry.

The Global AP prosthetic design closely corresponds, through incremental and proportional sizing, to the architecture of the natural shoulder. Variable geometry allows the surgeon to replicate the patient's natural biomechanics with greater accuracy by placing the humeral head in the correct three-dimensional space within the joint. The collarless design also avoids the need for space behind the head to accommodate the modular junction. In the Global AP shoulder, the head/neck construct adjusts to sit flush with the resected plane, avoiding unnecessary bone resection and preserving the patient's native humeral anatomy.



Robust implant design for reliable, long-term performance^{1,2}

Unique locking tapers are designed to withstand 10 million load cycles at one body weight and 100,000 peak load cycles at four times body weight, making the variable geometry Global AP shoulder a robust and durable implant.

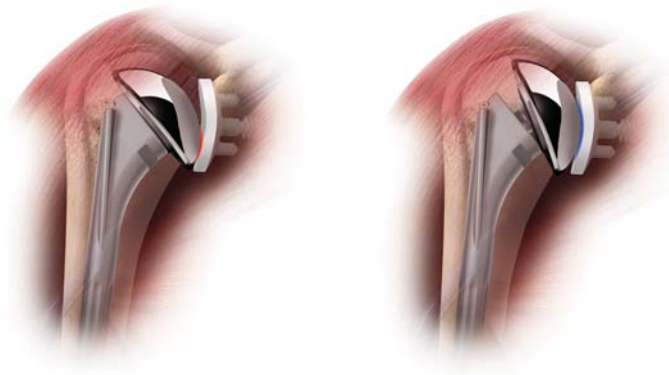
The Global AP shoulder is fully revisable, without removing a well-fixed humeral stem component, via the innovative revision instrumentation.

The Global AP shoulder is compatible with all DePuy Glenoid options.

The unique interlocking neck taper mechanism completes a particularly robust construct. It has been tested in vitro to withstand 10 million body weight motion cycles or 100,000 cycles under four times body weight. The assembly procedure is simple and reliable, and does not rely on screws, which can be difficult to control and have the potential to loosen over time. Once assembled, the system allows for straightforward disassembly to revise the head, if required, without disturbing a well-fixed stem.



Optimizing joint stability, function and load transfer



Variable inclination and version allows restoration of the appropriate humeral and glenoid relationship within the soft tissue envelope, for joint stability with excellent range of motion.

Free positioning of the humeral head, and a wide range of head options, gives excellent coverage of the resected surface, avoids peripheral bony projections and minimizes the risk of damage to the glenoid surface.

The ability to adapt to varying osteotomy angles allows for uniform contact and load transfer between the inferior surface of the humeral head and proximal humeral bone minimizing the risk of stress shielding potentially improving implant stability.



A non-adjustable head in a fixed angle assembly will make non-uniform contact with the osteotomy leaving the risk of an unstable implant and stress shielding.



An adjustable neck allows for uniform contact and load transfer between the inferior surface of the humeral head and the proximal humeral bone.

Straightforward, precise shoulder surgery



"Power-Tower"
Technology

Straightforward, familiar surgery, using a single set of instruments.

The implant is assembled and neck geometry is locked outside of the joint, for simplicity, precision and longevity.

A single set of Global AP instruments is used for both fixed and variable neck options. The fixed neck is implanted using the well-established procedure for the Global Advantage™ system, with one additional step to introduce the neck taper. Variable geometry is preoperatively templated and trialed within the joint. Neck geometry is then transferred to the definitive implant. The "Power Tower" provides accurate head position replication from trial to definitive implant during this transfer and minimizes the risk of humeral fracture, because it is not assembled in situ.





Implant options and sizes

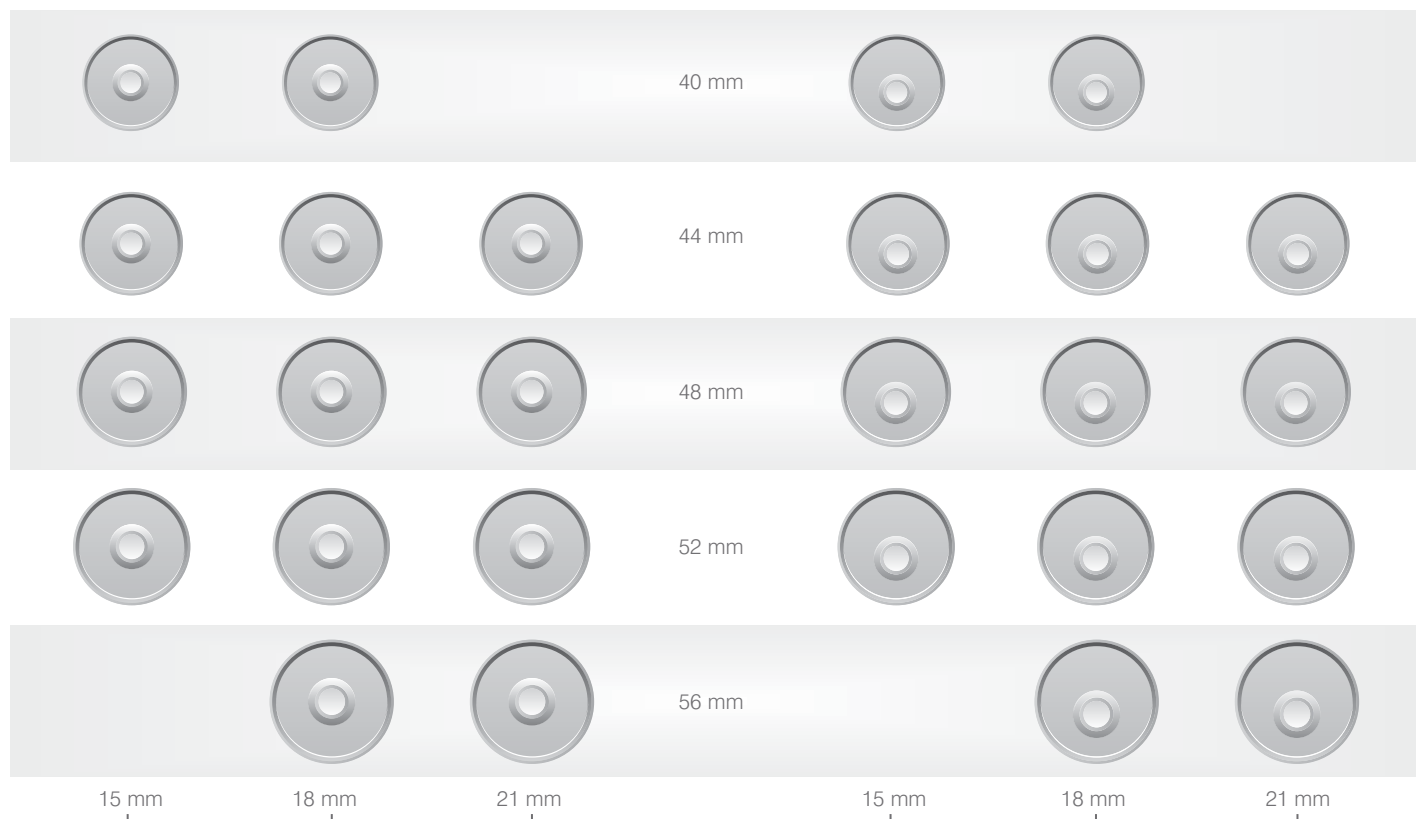
Stem options

	6 mm	8 mm	10 mm	12 mm	14 mm	16 mm
Standard stem	•	•	•	•	•	•
Porocoat stem	•	•	•	•	•	•
Long stem (standard only)		•	•	•	•	

Head options

Standard Heads

Eccentric Heads



Profile Height

Insert options

Variable taper option

Fixed taper option



Ordering Information

Instruments

140129	3.2 mm x 9 inch Short Threaded Guide Pin	2234-89-000	Clear Glenoid Sizer Disk 40 mm
2128-01-006	Humeral Reamer 6 mm	2234-90-000	Clear Glenoid Sizer Disk 44 mm
2128-01-008	Humeral Reamer 8 mm	2234-91-000	Clear Glenoid Sizer Disk 48 mm
2128-01-010	Humeral Reamer 10 mm	2234-92-000	Clear Glenoid Sizer Disk 52 mm
2128-01-012	Humeral Reamer 12 mm	2234-93-000	Clear Glenoid Sizer Disk 56 mm
2128-01-014	Humeral Reamer 14 mm	2234-95-000	Clear Glenoid Sizer Disk 56 XL
2128-01-016	Humeral Reamer 16 mm	2235-72-000	Drill Wrench
2128-61-000	Glenoid Reamer 40 XS / 40	2235-75-000	Angled Driver
2128-61-001	Glenoid Reamer 44 mm	2236-03-000	Universal Glenoid Handle
2128-61-002	Glenoid Reamer 48 mm	2236-21-000	Small Glenoid Pusher
2128-61-003	Glenoid Reamer 52 mm	2236-22-000	Large Glenoid Pusher - Angled
2128-61-004	Glenoid Reamer 56 / 56 XL	2236-26-000	Modified Crego Retractor
2128-61-005	Nubless Glenoid Reamer	2236-31-000	Celcon Darrach Retractor
2128-61-006	Center Drill Guide	2236-80-000	Anchor Peg Glenoid Trial 40 mm
2128-61-007	Pilot Hole / Peripheral Keeled Glenoid Drill Bit	2236-80-010	Anchor Peg Glenoid Trial 44 mm
2128-61-010	Keeled Glenoid Antirotation Peg	2236-80-020	Anchor Peg Glenoid Trial 48 mm
2128-61-011	Anti-rotation Peg Grasper	2236-80-030	Anchor Peg Glenoid Trial 52 mm
2128-61-012	Straight Drill Driver	2236-80-040	Anchor Peg Glenoid Trial 56 mm
2128-61-014	Keeled Glenoid Drill Guide	2236-80-050	Anchor Peg Glenoid Trial 56 XL
2128-61-015	Keeled Glenoid Tamp - Small	2236-80-060	Anchor Peg Center Drill Guide
2128-61-016	Keeled Glenoid Tamp - Large	2236-80-070	Anchor Peg Center Drill Bit 48 / 52 / 56 mm
2128-61-017	Glenoid Grasper	2236-80-075	Anchor Peg Center Drill Bit 40 / 44 mm
2128-61-024	Keeled Glenoid Trial 40 XS	2236-80-080	Anchor Peg Peripheral Drill Guide
2128-61-025	Keeled Glenoid Trial 40 mm	2236-80-090	Anchor Peg Peripheral Drill Bit
2128-61-026	Keeled Glenoid Trial 44 mm	2236-80-091	Anchor Peg Antirotation Peg
2128-61-027	Keeled Glenoid Trial 48 mm	2490-95-000	Fixation Pins 1/8 DIA X 3
2128-61-028	Keeled Glenoid Trial 52 mm	2810-01-003	Slotted Mallet
2128-61-029	Keeled Glenoid Trial 56 mm	2130-00-000	Ball Cylinder Trial Assembly
2128-61-030	Keeled Glenoid Trial 56 XL	2130-00-135	Fixed 135 Degree Neck Trial
2128-61-070	Ratchet T-Handle	2130-01-000	Revision Transfer Block
2128-61-071	Celcon Humeral Head Cutting Guide	2130-01-006	Osteotome 6 mm
2230-80-010	Humeral Head Sizer / Drill Guide 40 mm	2130-01-008	Osteotome 8 mm
2230-80-020	Humeral Head Sizer / Drill Guide 44 mm	2130-01-010	Osteotome 10 mm
2230-80-030	Humeral Head Sizer / Drill Guide 48 mm	2130-01-012	Osteotome 12 mm
2230-80-040	Humeral Head Sizer / Drill Guide 52 mm	2130-01-014	Osteotome 14 mm
2230-80-050	Humeral Head Sizer / Drill Guide 56 mm	2130-01-016	Osteotome 16 mm
2230-80-060	Humeral Head Sizer / Drill Guide Handle	2130-01-017	Large Osteotomy Cover
2234-88-000	Clear Glenoid Sizer Disk 40 XS	2130-01-018	Small Osteotomy Cover

2130-01-019	Head Measurement Gauge	2130-24-110	General Case & Inserts
2130-01-020	Resection Guide Assembly	2130-24-120	General Base
2130-01-029	Broach Handle Adapter	2130-24-130	General Case Lid
2130-01-030	Broach Handle	2130-24-140	General Top Insert
2130-01-040	Impaction Block Assembly	2130-24-150	General Middle Insert
2130-01-050	Orientation Device Assembly	2130-40-500	Humeral Head 40 x 15 Trial
2130-01-055	Taper Impactor	2130-40-510	Humeral Head 40 x 18 Trial
2130-01-060	Small Calcar Reamer 40 / 44 mm	2130-40-600	Humeral Head 40 x 15 Eccentric Trial
2130-01-065	Large Calcar Reamer 48 / 52 / 56 mm	2130-40-610	Humeral Head 40 x 18 Eccentric Trial
2130-01-070	Calcar Alignment Guide Assembly	2130-44-500	Humeral Head 44 x 15 Trial
2130-01-075	Extraction Handle	2130-44-510	Humeral Head 44 x 18 Trial
2130-01-080	Head Removal Tool	2130-44-520	Humeral Head 44 x 21 Trial
2130-01-085	Broach Removal Tool	2130-44-600	Humeral Head 44 x 15 Eccentric Trial
2130-01-100	4.5 mm Trial Driver	2130-44-610	Humeral Head 44 x 18 Eccentric Trial
2130-01-105	Trial Head Handle	2130-44-620	Humeral Head 44 x 21 Eccentric Trial
2130-01-110	Ball Taper Distractor	2130-48-500	Humeral Head 48 x 15 Trial
2130-01-120	Humeral Head Distractor	2130-48-510	Humeral Head 48 x 18 Trial
2130-02-000	Revision Insert	2130-48-520	Humeral Head 48 x 21 Trial
2130-04-000	Head Impactor	2130-48-600	Humeral Head 48 x 15 Eccentric Trial
2130-06-000	Humeral Stem 6 mm Broach / Trial	2130-48-610	Humeral Head 48 x 18 Eccentric Trial
2130-08-000	Humeral Stem 8 mm Broach / Trial	2130-48-620	Humeral Head 48 x 21 Eccentric Trial
2130-10-000	Humeral Stem 10 mm Broach / Trial	2130-52-500	Humeral Head 52 x 15 Trial
2130-12-000	Humeral Stem 12 mm Broach / Trial	2130-52-510	Humeral Head 52 x 18 Trial
2130-14-000	Humeral Stem 14 mm Broach / Trial	2130-52-520	Humeral Head 52 x 21 Trial
2130-16-000	Humeral Stem 16 mm Broach / Trial	2130-52-600	Humeral Head 52 x 15 Eccentric Trial
2130-18-000	3.2 mm Osteotomy Guide Pin - Short	2130-52-610	Humeral Head 52 x 18 Eccentric Trial
2130-20-000	3.2 mm Osteotomy Guide Pin - Long	2130-52-620	Humeral Head 52 x 21 Eccentric Trial
2130-22-000	X-Ray Templates	2130-56-510	Humeral Head 56 x 18 Trial
2130-24-000	Humeral 1 Case & Inserts	2130-56-520	Humeral Head 56 x 21 Trial
2130-24-010	Humeral 1 Base	2130-56-610	Humeral Head 56 x 18 Eccentric Trial
2130-24-020	Humeral 1 Case Lid	2130-56-620	Humeral Head 56 x 21 Eccentric Trial
2130-24-030	Humeral 1 Upper Insert	2130-99-010	Humeral DNI Size 8
2130-24-040	Humeral 1 Middle Insert	2130-99-020	Humeral Porocoat® Porous Coating DNI Size 8
2130-24-060	Humeral 2 Case & Insert	2130-99-030	Standard Head DNI 48 x 18
2130-24-070	Humeral 2 Base	2130-99-040	Eccentric Head DNI 48 x 18
2130-24-080	Humeral 2 Case Lid	2130-99-050	Neck Assembly DNI Components
2130-24-090	Humeral 2 Top Insert		
2130-24-100	Humeral 2 Lower Insert		

Ordering Information

Implants

Neck Implant Components

- 1130-00-000 Ball Taper Adjustable Neck Assembly
- 1130-02-000 Fixed 135 Degree Taper Assembly

Humeral Stem Components

- 1130-06-000 Humeral Stem 6 mm
- 1130-08-000 Humeral Stem 8 mm
- 1130-10-000 Humeral Stem 10 mm
- 1130-12-000 Humeral Stem 12 mm
- 1130-14-000 Humeral Stem 14 mm
- 1130-16-000 Humeral Stem 16 mm

PC Coated Humeral Stem Components

- 1130-06-200 Porocoat Coated Humeral Stem 6 mm
- 1130-08-200 Porocoat Coated Humeral Stem 8 mm
- 1130-10-200 Porocoat Coated Humeral Stem 10 mm
- 1130-12-200 Porocoat Coated Humeral Stem 12 mm
- 1130-14-200 Porocoat Coated Humeral Stem 14 mm
- 1130-16-200 Porocoat Coated Humeral Stem 16 mm

Humeral Stem Revision Components

- 1130-08-010 Humeral Stem 8 mm Long
- 1130-10-010 Humeral Stem 10 mm Long
- 1130-12-010 Humeral Stem 12 mm Long
- 1130-14-010 Humeral Stem 14 mm Long

Humeral Head Components

- 1130-40-500 Humeral Head 40 x 15
- 1130-40-510 Humeral Head 40 x 18
- 1130-44-500 Humeral Head 44 x 15
- 1130-44-510 Humeral Head 44 x 18
- 1130-44-520 Humeral Head 44 x 21
- 1130-48-500 Humeral Head 48 x 15
- 1130-48-510 Humeral Head 48 x 18
- 1130-48-520 Humeral Head 48 x 21
- 1130-52-500 Humeral Head 52 x 15
- 1130-52-510 Humeral Head 52 x 18
- 1130-52-520 Humeral Head 52 x 21
- 1130-56-510 Humeral Head 56 x 18
- 1130-56-520 Humeral Head 56 x 21
- 1130-40-600 Humeral Head 40 x 15 Eccentric
- 1130-40-610 Humeral Head 40 x 18 Eccentric
- 1130-44-600 Humeral Head 44 x 15 Eccentric
- 1130-44-610 Humeral Head 44 x 18 Eccentric
- 1130-44-620 Humeral Head 44 x 21 Eccentric
- 1130-48-600 Humeral Head 48 x 15 Eccentric
- 1130-48-610 Humeral Head 48 x 18 Eccentric
- 1130-48-620 Humeral Head 48 x 21 Eccentric
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- 1130-52-620 Humeral Head 52 x 21 Eccentric
- 1130-56-610 Humeral Head 56 x 18 Eccentric
- 1130-56-620 Humeral Head 56 x 21 Eccentric

References:

1. Norris, T.R. and J.P. Iannotti "Functional Outcome After Shoulder Arthroplasty for Primary Osteoarthritis: A Multicenter Study."
Journal of Shoulder and Elbow Surgery Vol.11, No.2, March/April 2002: 130-135.
2. Matsen, F.A. III, J.P. Iannotti, and C.A. Rockwood, Jr. "Humeral Fixation by Press-Fitting of a Tapered Metaphyseal Stem."
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