Sector Snapshot

Orthopaedic Implants

Sector Definition

- Purpose: design, manufacture, and distribute medical devices used to replace or support damaged bones, joints, and soft tissues
- Key Customers & Applications:
 hospitals, specialty orthopaedic
 clinics, ambulatory surgical centres,
 focusing on surgical interventions for
 musculoskeletal conditions
- Products: hip and knee replacements, plates, screws and rods, bone grafts, surgical instruments and software



Sector Segmentation

By anatomical application

Joint Replacement: Hip, knee, shoulder, and other joints

Trauma: Plates, screws, and rods for fracture fixation

Spine: Intervertebral discs, fusion devices, and rods

Craniomaxillofacial (CMF): Cranial, facial & jawbone reconstruction

Extremities & Sports Medicine:

Ligament and tendon, cartilage repair, small joints

Orthobiologics: bone grafts, growth factors, and regenerative medicine products



Key Standards

- Industry Requirements: safety, efficacy and biocompatibility; durability under repeated loading; resistance to corrosion, wear & abrasion; sterility
- **Standards:** ISO, EU MDR 2017/745, FDA & ASTM, and other regional standards
- Compliance: regulatory approvals and certification, manufacturing quality management, post-market surveillance. Level of scrutiny depends on the assigned risk class, for implants usually II (moderate) or III (high)



Market Size & Growth

- Global Orthopaedic Implant Market: Valued at USD 47.4 bn in 2024, projected to reach USD 72 bn by 2032 (CAGR 5.3%)
- Main Growth Areas: aging population, better access to healthcare, technological advancements, growing adoption in minimally invasive procedures
- By Segment: strongest growth is expected in joint reconstruction and trauma implants





Market Structure

- Global OEMs: Stryker, Zimmer Biomet, Johnson & Johnson, Smith+Nephew, B. Braun
- Contract manufacturers: Tecomet,
 Orchid, Marle Group, In'Tech Medical
- Regional Dynamics: North America and Europe are set to remain the biggest markets globally, whereas Asia-Pacific is expected to show the fastest growth due to aging population and improving healthcare access



Selected Key Players

Large Johnson&Johnson **stryker B** BRAUN ZIMMER BIOMET Arthrex GLOBUS enovis... ORTHOFIX TECOMET. **CeramTec** dedacta ORCH D **KLS** martin medartis ARLE Ulrich medical tech **ELOS** Focus **Focused** Diversified

Underlying Key Drivers

- Aging Population: The increasing global elderly population leads to higher incidences of age-related orthopaedic conditions
- Rising Healthcare Spending & Insurance Coverage: Improving patient access to implants
- Shorter recovery times: Minimally invasive procedures, image-guided and robot-assisted surgeries, shift towards ambulatory surgical centers for simpler surgeries



Recent Key Trends

- Materials: use of biocompatible & resorbable materials, antibiotic coatings, hybrid and multi-material implants
- 3D Printing: for patient-specific implants and porous structures to improve bone ingrowth, 3D planning & visualisation software
- Smart & Sensor-Enabled Implants: collect post-op data for surgeons, monitoring load, pressure, and healing progress



Transaction Market

Historical Activity:

- Private equity funds have driven most of activity in the German market recently, aiming at strong local players
- Consolidation within the sector was led by local diversified players and private equity pursuing buy-and-build strategy
- The transactions focused on the contract manufacturers, as well as companies with medical know-how



Transaction Market

Key Drivers of Potential Deal Activity:

- Non-organic innovation, aiming at companies with differentiated, protected solutions that offer improvements in safety, efficiency, best-in-class outcomes
- Consolidation of contract manufacturers, aiming to provide OEMs with a one-stop shop to handle overall supply chain, from earlierstage design and development to post-market regulatory assistance





Transaction Market

Outlook & Potential Opportunities:

- Commoditization of orthopaedic implants, focus on cost-efficiency
- Intensive innovation race and high R&D to maintain leadership positions
- Continued interest of private equity in the sector, pursuing opportunities created by sector transformation and consolidation

Selected Deals

















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