

# Health Care Evaluation Orthopaedics

On the way to value based health care



**NEDERLANDSE  
ORTHOPAEDISCHE  
VERENIGING | NOV**

## Summary “Health Care Evaluation Orthopaedics”

“Orthopaedics keeps people moving, from young to old”, that is the mission of the Netherlands Orthopaedic Association (NOV). Based on this principle, the NOV encourages its members to provide orthopaedic care that is of excellent scientific quality, that is effective and that is offered with compassion. Furthermore, the NOV explicitly included in its strategic plan that orthopaedic care should be evaluated and developed further based on the outcomes of scientific research with an international appeal. In this context, the project “Health Care Evaluation Orthopaedics” was started to create an inventory of where evaluation of care is necessary in order to guarantee an even better quality of care for the patient based on scientific substantiation. At the moment, many recommendations in guidelines have a low level of scientifically substantiated evidential value. As it is not always possible to substantiate all procedures with level I-II evidence-based methods, there is room for improvement from the patient’s perspective, which would clarify the added care value for him or her. The project “Health Care Evaluation Orthopaedics” resulted in an agenda of ten research questions from the daily practice of the patient and the orthopaedic surgeon. Scientific research is then the method to obtain answers to these questions. These scientific insights result in improved insights in the various diagnostic and treatment pathways, which enables the patient and the doctor to make a better choice. A contribution was obtained for this project from the Stichting Kwaliteitsgelden Medisch Specialisten (SKMS). [Foundation Quality Funds Medical Specialists]

This report provides information on the Health Care Evaluation Orthopaedics: the inventory and prioritisation of the most important subjects relating to improvements in value-based patient care\* that are relevant in the daily practice of the orthopaedic surgeon. In addition, a design was created to reflect how this value-based patient care can be substantiated with scientific research, with the aim being to improve the quality of the orthopaedic treatment. Improvements in the efficiency and the efficacy are also important points for attention. The Health Care Evaluation Orthopaedics reflects the NOV Quality Policy.

### *Approach/methodology*

The inventory of the subjects and the scientific substantiation of the daily medical procedures in orthopaedics were performed through analysis of the existing NOV guidelines and a survey amongst members of the NOV, the NOV working groups and other stakeholders, such as patient associations and healthcare insurance companies.

The subjects that were identified were then divided based on (anatomical) sub-specialisations and then prioritised. This prioritisation was performed per sub-specialisation based on the following criteria: relevance (severity, prevalence, costs); urgency; feasibility of research and the impact on the profession/society. The prioritisation was performed during a meeting of orthopaedic surgeons (active in teaching hospitals and peripheral centres), the VOCA (Vereniging Orthopedisch Chirurgische Assistenten = Association of Orthopaedic Surgical Residents), scientific researchers and representatives from - among others - patient associations, healthcare insurance companies, the Netherlands Association of General Practitioners (NHG), NIV section geriatric medicine, the Association for Sports Medicine and the Royal Netherlands Association for Physiotherapy (KNGF). Approximately 60 people attended this prioritisation meeting.

\*Value-based patient care: diagnostics and therapy that are objective (i.e. scientific), but also offer added value for the patient from the patient’s perspective and experience. Avoiding unnecessary diagnostic tests and treatments are important domains here.

### *Health Care Evaluation Orthopaedics*

The foundation for the Health Care Evaluation Orthopaedics is the scientific substantiation of the improvements in value-based patient care, which the participants then prioritised at the prioritisation meeting. The working group then assessed the subjects that had been assigned the highest priority and made a definitive choice. The working group took a number of factors into consideration. Firstly, it is important that value-based patient care is researchable, as setting up scientific research is a costly and time-consuming process. The required research must be feasible with a good chance of successful completion. Another pre-condition is the presence of the competencies in the Netherlands to perform the research. In addition, the research questions must also be relevant for other stakeholders, such as healthcare insurance companies and government. This is important, among other reasons, in order to raise the required financial resources to perform the scientific research. These considerations ultimately resulted in the recommendation by the working group to start with the following top 10 research questions.

1. What is the duration and choice of anticoagulant therapy for total knee and hip prosthesis?
2. Antibiotic prophylaxis for prosthesis surgery: single dose or 24 hours?
3. What is the best treatment for wound leakage following total knee and hip prosthesis?
4. Development of registration systems in accordance with LROI:
  - Club foot (start with this);
  - DDH;
  - CP hip;
  - Idiopathic scoliosis.
5. What is the effectiveness of pre-operative and post-operative physiotherapy for total knee and hip prosthesis?
6. What is the effectiveness of “stepped care” versus “usual care” for osteoarthritis of the knee?
7. What are effective indication fields for hip arthroscopy? Develop a register analogous to LROI.
8. What is the optimum timing for anterior cruciate ligament reconstruction?
9. What is the best treatment for SAPS: bursectomy versus decompression versus conservative?
10. Which type of intra-articular injection (dose ratio and products) is effective in the treatment of knee osteoarthritis?

### *Implementation of the ‘Health Care Evaluation Orthopaedics’*

These top 10 research questions will determine the research agenda for improved value-based patient care in the coming period. Of course the “Health Care Evaluation Orthopaedics” will need to be updated in the future. The progress of the implementation of the agenda will be monitored, supported and stimulated by the NOV Executive. Funding of the prioritised research will be obtained via the standard subsidy applications to the ZonMw programme “DoelmatigheidsOnderzoek (DO)” (Effectiveness Research) and other possible sources of subsidy, such as healthcare insurance companies (via a “Shared Savings Fund” that still needs to be established) and the “Reumafonds” (Arthritis Foundation).