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| **2K — Lumbar radiofrequency facet joint denervation** |
| **Summary of Intervention** |
| Radiofrequency denervation, also known as ‘dorsal rhizotomy’ or ‘radiofrequency ablation,’ is a non-surgical and minimally invasive procedure that uses heat to reduce or stop the transmission of pain signals arising from one or more spinal facet joints. It is only recommended when other alternatives have failed.  **This guidance applies to adults aged 19 years and over.** |
| **Number of interventions in 18/19** |
| **1,612** |
| **Proposal** |
| Lumbar radiofrequency facet joint denervation (RFD) should only be offered in accordance with NICE Guideline NG59 which recommends it as an adjunct in the management of chronic low back pain only when non-operative  treatment has failed, and the main source of pain is thought to arise from one or more degenerate facet joints. |
| **Rationale for Recommendation** |
| The facet joints are pairs of joints that stabilise and guide motion in the lumbar spine. These joints are innervated by the medial branches of the dorsal rami. In current clinical practice, suitable patients are first offered one or more diagnostic injections to determine which facet joints are contributing to their symptoms. This particular type of injection is called a ‘medial branch block,’ and differs to facet joint injections, which are no longer recommended  by NICE or GIRFT.  Manual therapy, with appropriate psychological therapies where necessary, should be considered as an early intervention to support the individual Medial branch blocks should be offered only in accordance with the low back  pain pathway (<https://www.boa.ac.uk/uploads/assets/e26cc007-74c3-4b22-94e408dd54ac79da/spinal%20pathfinder.pdf>).  Patients who experience a positive response to a medial branch block (i.e. a significant but short term improvement in pain symptoms) may be offered a neurodestructive procedure called radiofrequency denervation in an attempt to achieve longer-term pain relief. Some patients may experience a prolonged response to medial branch blockade such that further interventional treatment is no longer required.  Radiofrequency energy is delivered along an insulated needle in contact with the target nerves. This focussed electrical energy heats and denatures the nerve. This process may allow axons to regenerate with time requiring the  repetition of the radiofrequency procedure.  Research is ongoing to determine the optimum frequency of repeat radiofrequency denervation (https://www.nice.org.uk/researchrecommendation/radiofrequency-denervation-what-is-the-clinicaland-  cost-effectiveness-of-radiofrequency-denervation-for-chronic-lowback-pain-in-the-long-term). |
| **References** |
| 1. NICE Low back pain and sciatica in over 16s: assessment and management (November 2016): https://www.nice.org.uk/guidance/ng59.  2. NICE: https://www.nice.org.uk/guidance/ng59/evidence/full-guidelineinvasive-treatments-pdf-2726157998.  3. National Low Back and Radicular Pain Pathway 2017: https://www.boa.ac.uk/uploads/assets/e26cc007-74c3-4b22-94e408dd54ac79da/spinal%20pathfinder.pdf.  4. Back Skills Training (BeST): Group cognitive behavioural treatment for low-back pain in primary care: a randomised controlled trial and cost effectiveness analysis. Prof Sarah E Lamb DPhil et al on behalf of the Back  Skills Training Trial investigators: https://doi.org/10.1016/S0140-6736(09)62164-  5. STarT Back: https://www.nice.org.uk/guidance/ng59/resources/endorsed-resource-start-back-screening-tool-with-matched-treatmentoptions-4906309933.  6. Maas ET, Ostelo RWJG, Niemisto L, Jousimaa J, Hurri H, Malmivaara A, van Tulder MW. Radiofrequency denervation for chronic low back pain. Cochrane Database of Systematic Reviews 2015, Issue 10. Art. No.: CD008572. DOI: 10.1002/14651858.CD008572.pub2.  7. Faculty of Pain Management, Core Standards for Pain Management Services in the UK: https://fpm.ac.uk/standards-publications-workforce/core-standards. |