Eyes of the needle
Spectral tissue sensing, an innovative technology for detecting various tissue types during percutaneous needle-based procedures in locoregional anesthesia and pain medicine

1. Each tissue type has its own optical signature. (This thesis)

2. Regional anesthesia equipment and imaging techniques used for interventional pain procedures have undergone substantial technological advances. (This thesis, chapter 1)

3. Spectral tissue sensing (STS) is a promising technique which provides direct information on the type of tissue at the needle tip. (This thesis, chapter 1)

4. STS seems to be a reliable tool in detecting intravascular needle position. (This thesis, chapter 3A and 3B)

5. The optical signature of fat is not only written in yellow. (This thesis, chapter 4 and 5)

6. STS can detect the needle transition from extraforaminal to an intraforaminal needle position with a sensitivity of 80% and a specificity with 71%. (This thesis, chapter 6)

7. Before launching the STS system in clinical practice there should be a clear definition of harmful intraneural needle position. (This thesis, chapter 7)

8. Business instead of physicians and inventors determines improvements in patient’s safety and care.

9. Probeer, elke keer als je tegen de lamp loopt, een beetje licht mee te nemen. Harrie Jekkers

10. The real voyage of discovery consists not in seeking new landscapes, but in having new eyes. Marcel Proust

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