Big Data and Radiomics and its effect on how we practice Radiology: an international view

RöKo International Donnerstag, 10.05.2018 von 9:45 bis 10:45 Uhr im Raum: Donner

Vorsitz / Moderation: Lotz J / Göttingen, Hackländer T / Wuppertal

**RÖKO INT 202.1**  
9:45 Uhr  
Big Data for Cardiac Imaging  
Referent(en): Leiner T

**RÖKO INT 202.2**  
10:00 Uhr  
Diskussion

**RÖKO INT 202.3**  
10:05 Uhr  
Artificial Intelligence in medical imaging: the present and future in China  
Referent(en): Jin Z

**RÖKO INT 202.4**  
10:20 Uhr  
Diskussion

**RÖKO INT 202.5**  
10:25 Uhr  
Radiology and Radiomics: How Korea reacts to a new challenge  
Referent(en): Choi Y

**Kurzzusammenfassung:** Radiomics approach can extract high-dimensional quantitative information from medical images, thus extracting invisible information beyond visual assessment. Radiomics have been actively applied to oncology field, especially in brain tumor research. However, considering heavy workload of image reading and the lack of expertise for such high-dimensional data handling, several things should be considered for radiomics to be applied in clinical practice, regarding:

1. Feasibility of pipeline implementation for image processing, feature extraction, and machine learning.
2. Reliability / reproducibility of radiomic features, which varies depending on image processing, feature extraction technique, or MRI scan protocol.
3. Impracticality of time consuming process of radiomics pipeline, such as ROI segmentation.

In this brief talk, I will talk about how we deal with above aspects of radiomics in one of top 5 institution of Korea, Severance hospital.

**RÖKO INT 202.6**  
10:40 Uhr  
Diskussion