

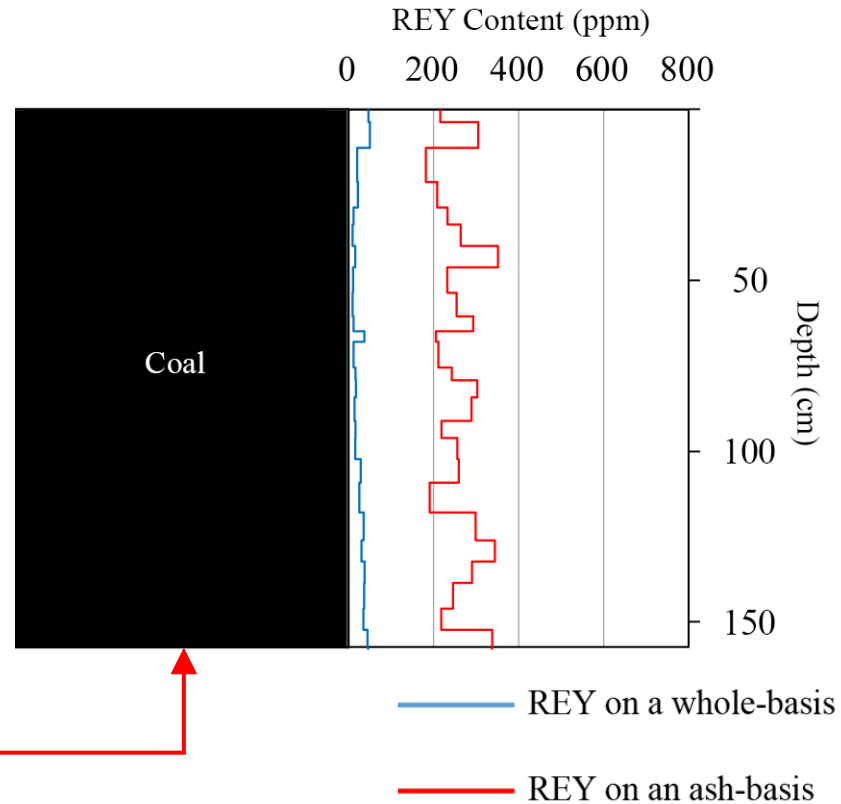
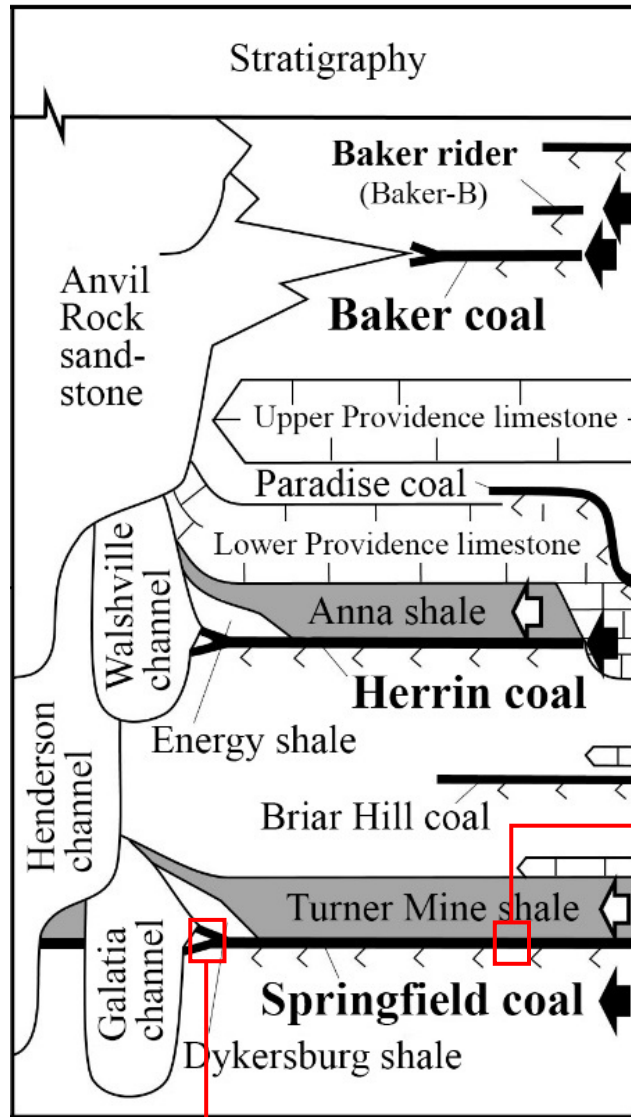
# Rare Earth Elements in the Illinois Basin Coals

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UK Center for Applied Energy Research

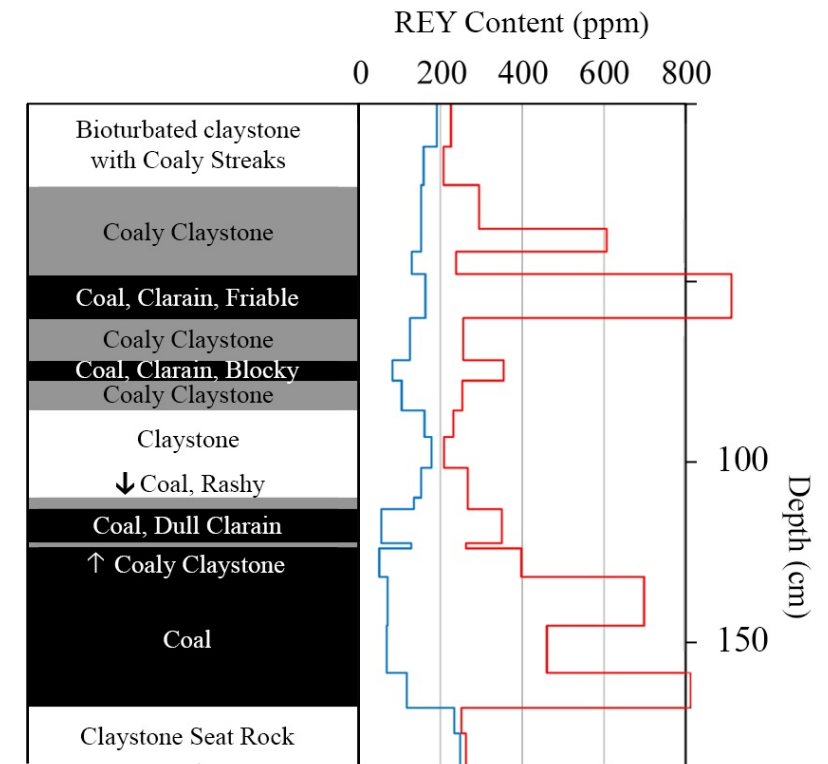


# 1. Vertical variations

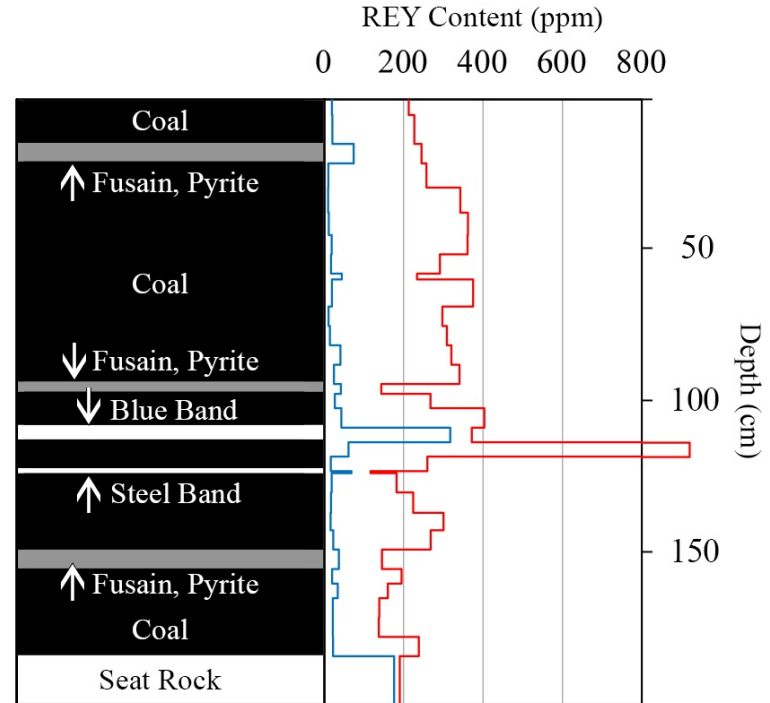
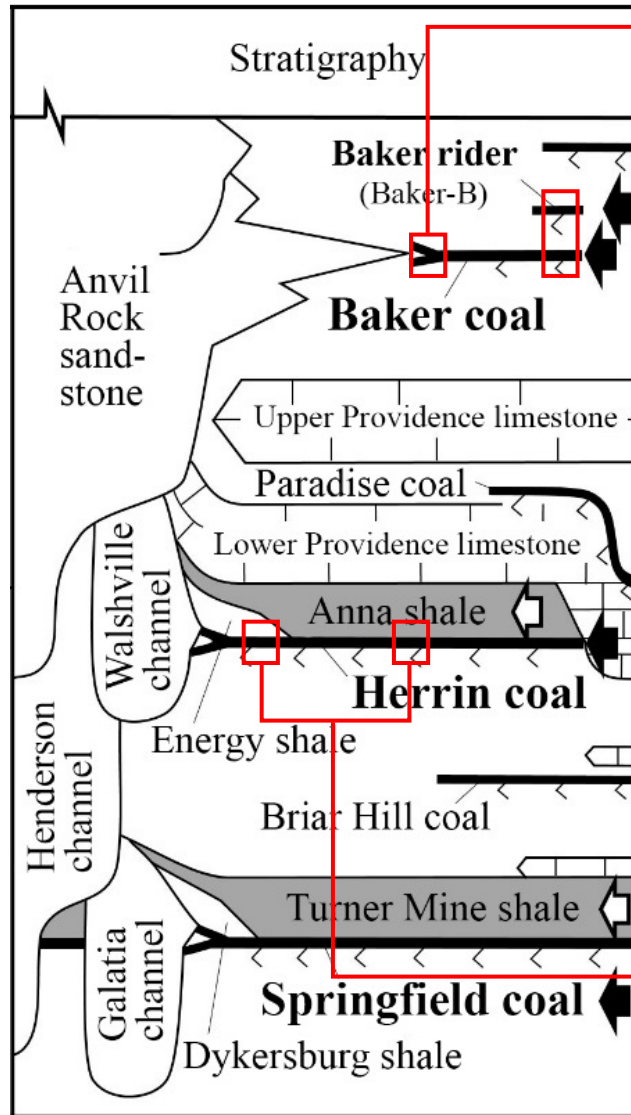


Average REE  
 Whole-basis: 39 ppm  
 Ash-basis: 232 ppm

Average REE  
 Whole-basis: 129 ppm  
 Ash-basis: 361 ppm



# 1. Vertical variations

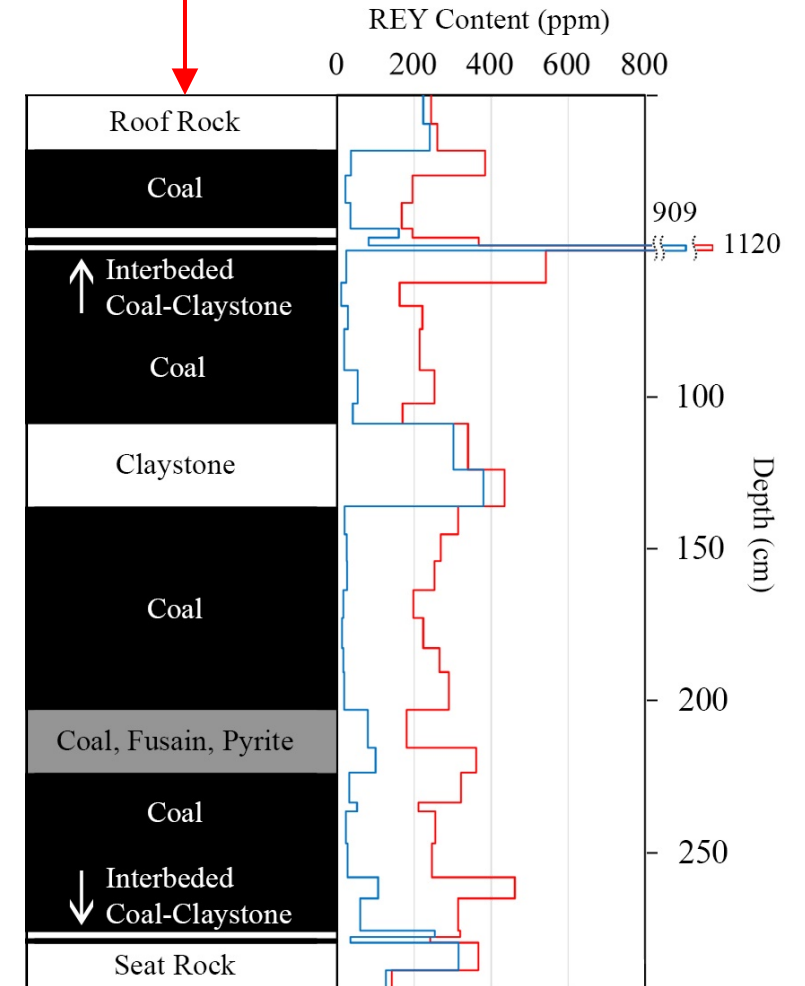


— REY on a whole-basis

— REY on an ash-basis

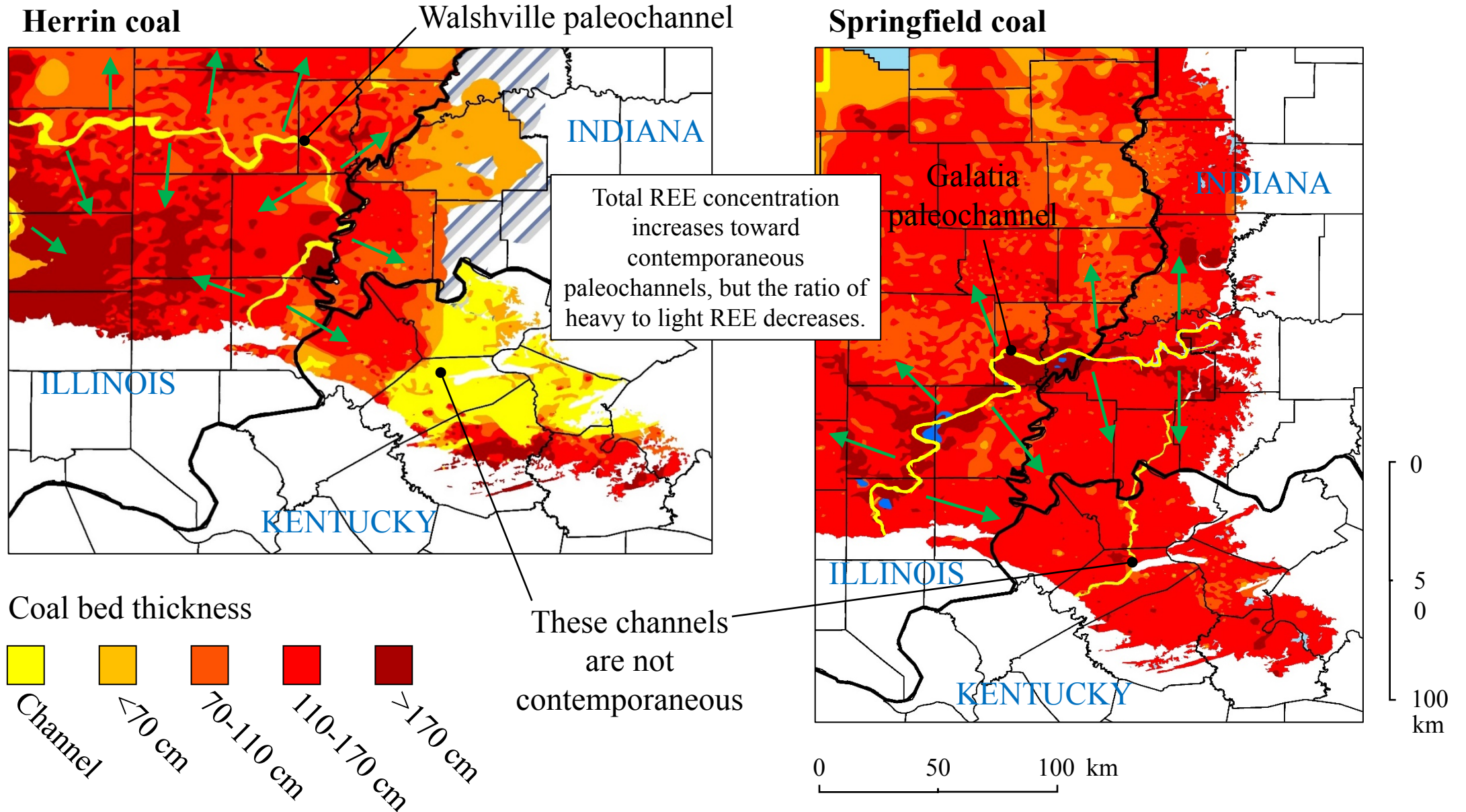
Average REE  
Whole-basis: 111 ppm  
Ash-basis: 279 ppm

Average REE  
Whole-basis: 177 ppm  
Ash-basis: 407 ppm



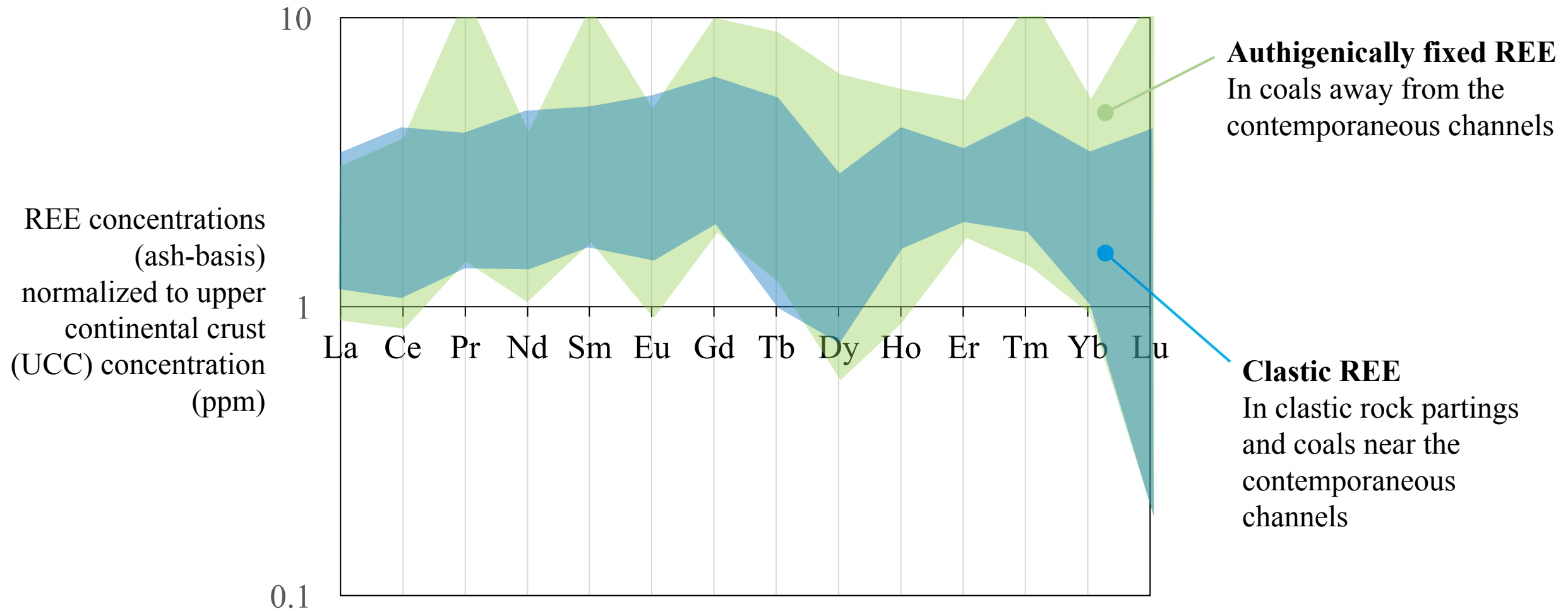


## 2. Lateral variation

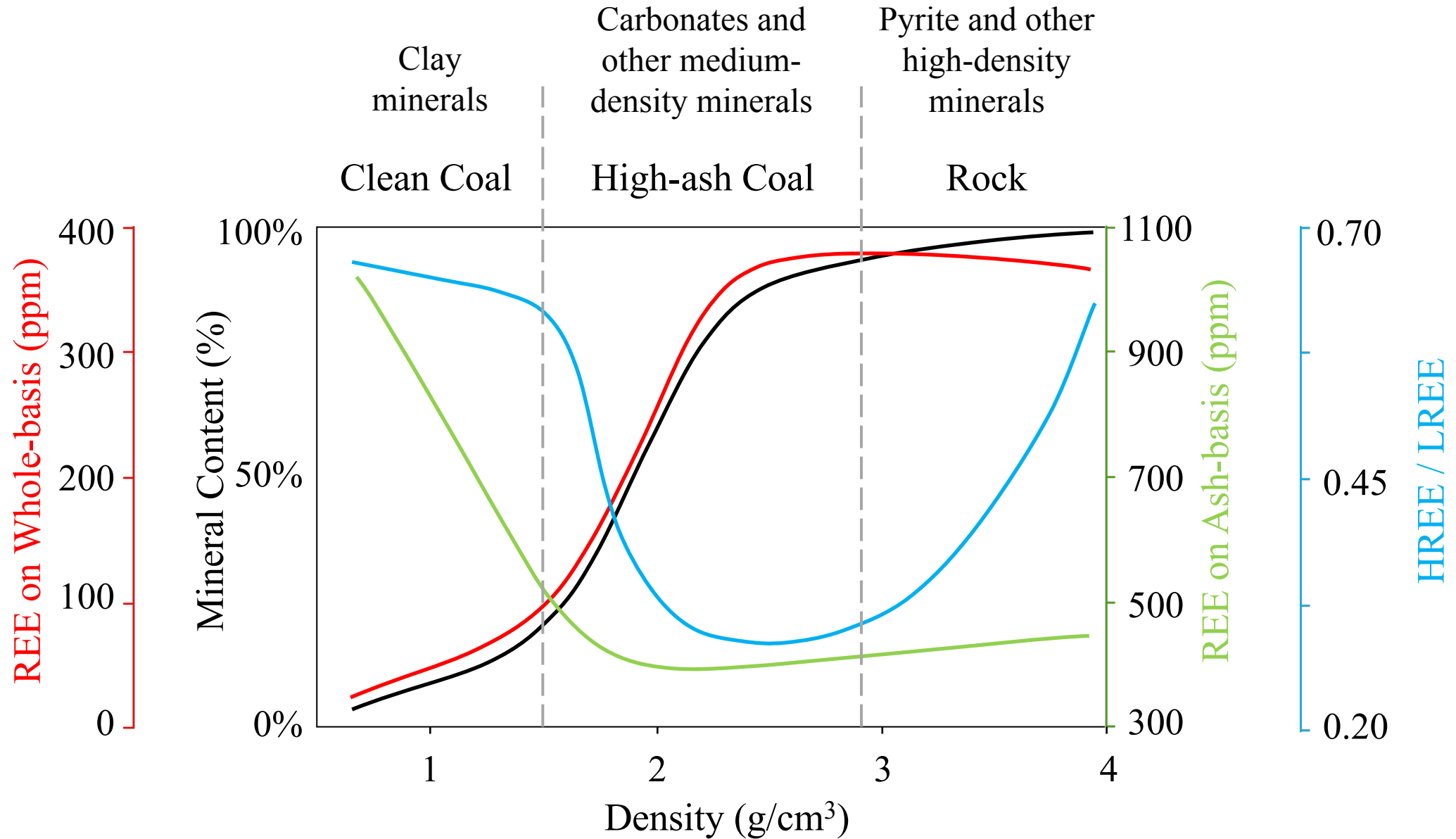




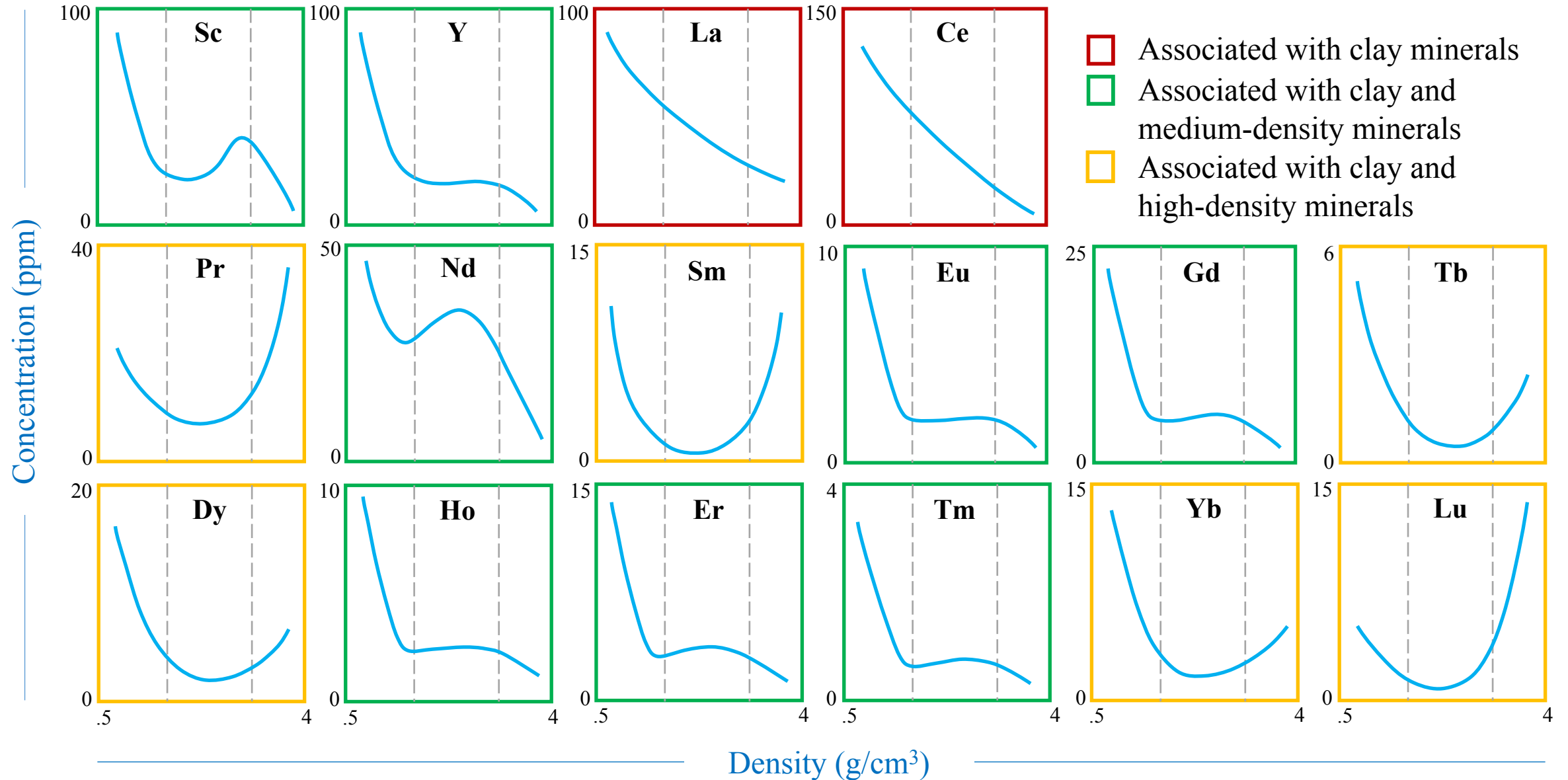
### 3. REE fractionation pattern



## 4. Associations



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