Applications of the new geological map of Wallonia

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1. Introduction
2. Progress report

- 102 maps on 142 are completed
- 49 published
3. Applications

- Water resources management (water-catchments, hydrogeology, etc.)
- Mining
- Land-use planning (e.g., karstic hazards, implantation of windmills)
- Civil engineering
3a. Hydrogeology

Huy-Nandrin

Hydrogeological map (Ruthy, 2011) based on Dewalque et al. (1898)'s geological map

Mottequin & Marion (submitted)
Gerny plateau

Aye-
Marche-en-Famenne
(Lohest & Forir, 1902)

Rocherfort-Jemelle
(Stainier, 1900)
New geological map with hydrogeological data

Geology: Barchy & Marion (submitted), Barchy et al. (submitted)

Hydrology: Hallet & Meus (2011)
Schematic geological cross-section
3b. Mining

Stainier (1902)

Préalle quarry (Heyd)

Barchy & Marion (submitted)
La Préalle quarry
Geological 3D modeling of deposits

Chevalier (2010)
3c. Geological hazards

- Quicksands
- Karstic collapses
- Mining risks
- Etc.
Quicksands

(Aachen and Vaals formations; Upper Cretaceous)

Barchy & Marion (2000)
Lorette Cave (Rochefort)

Barchy et al. (submitted), Legros (2011)
4. Archaeology

Tracing the origin and provenance of building stones in archaeological remains/historical monuments (e.g., Roman villa of Waha)

Corbieau et al. (2010)
Tile
Limestone (Givetian)
Limestone (Trois-Fontaines Fm)
Sandstone (Lomme Fm)
Sandstone (Hampteau Fm)
5. Geological tourism

Pingot et al. (2010)
Ek et al. (2004)
6. Geological map online