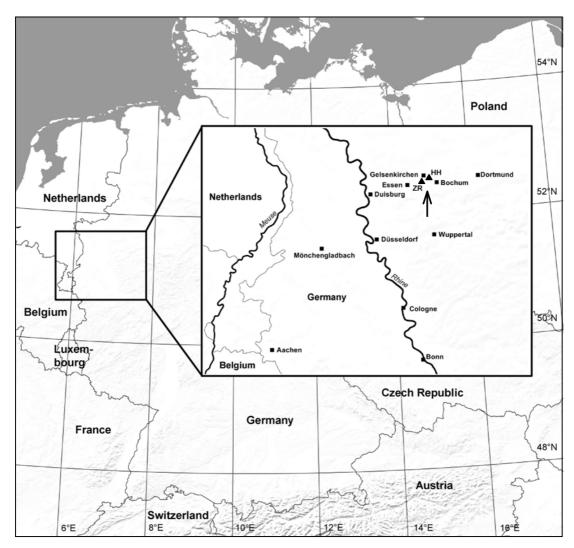
## *NANOGONA POLYDESMOIDES* (LEACH, 1815) – NEW FOR THE GERMAN FAUNA (DIPLOPODA, CHORDEUMATIDA, CRASPEDOSOMATIDAE)

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Nanogona polydesmoides is an Atlantic millipede species that is commonly found in Great Britain, Ireland (Blower 1985), France (Brolemann 1935, Schubart 1960) and Belgium (Kime 2004). There are also some records for the Scandinavian countries Norway and Sweden (Andersson *et al.* 2005). In alpine Italian caves an isolated subspecies *N. polydesmoides italica* (Manfredi, 1931) exists.

*N. polydesmoides* is an annual winter active woodland species with a preference for calcareous soils (Blower 1985). It has also been found on non-calcareous soils where is concrete or mortar due to human impact (in litt. H. J. Read).



**FIGURE 1:** Location of the findings of *Nanogona polydesmoides* (black triangle) on the colliery spoil heaps Zeche Rheinelbe (ZR) and Halde Hannover (HH) in Germany.

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Investigations of the myriapod fauna were made at the afforested colliery spoil heaps Zeche Rheinelbe (ZR) in Gelsenkirchen-Ueckendorf (51°29'N, 7°06'E) and Halde Hannover (HH) in Bochum-Hordel (51°30'N, 7°09'E) in the Ruhr Valley Area (West Germany, North Rhine-Westphalia, see Figure 1) by pitfall traps (06.iv.2007 - 25.vii.2007). There was one specimen of a juvenile of the family Craspedosomatidae on 25.vii.2007 (HH) that was certainly not known for the fauna of North Rhine-Westphalia before and could not be definitely determined to genus or species level. Only one juvenile could be found again at this site by hand collecting by the authors on 23.iii.2008. Finally two adult females were collected in the leaf litter at Halde Hannover on 19.x.2008. Surprisingly, by the investigation at Zeche Rheinelbe on 18.x.2008 found 5 males, 23 females and one subadult juvenile of this Craspedosomatidae species, also by hand collecting. All these specimens were determined using Brolemann (1935) and Blower (1985) as *Nanogona polydesmoides*. These are the first records of this species for North Rhine-Westphalia and Germany. There are unpublished records of this species by Schüsseler (1991) in the vicinity of Aachen (North Rhine-Westphalia, see Figure 1) near the Dutch border. These are however doubtful because the material is no longer available (Schüsseler in litt.).

The two colliery spoil heaps have a highly synanthropic character. These sites are also used by the residents for the disposal of garden waste. This could be one potential way for the introduction of this species. The possibility of the displaced ground material or seedlings due to renaturalisation of these sites is also conceivable. So it is probable that *Nanogona polydesmoides* occurs on further colliery spoil heaps in the Ruhr Valley Area too.

The synanthropic character in both heaps shows a rich diversity of millipedes and centipedes species on Zeche Rheinelbe (25 species) and Halde Hannover (31 species).

There was a high number of synanthropic species occurring in the Ruhr Valley Area such as *Stigmatogaster subterranea* (Shaw, 1789), *Geophilus alpinus* Meinert, 1870, *Archiboreoiulus pallidus* (Brade-Birks, 1920), *Blaniulus guttulatus* (Bosc, 1792), *Choneiulus palmatus* (Nemec, 1895), *Cylindroiulus britannicus* (Verhoeff, 1891) (only HH), *Cylindroiulus parisiorum* (Brölemann & Verhoeff, 1896) (only HH), *Cylindroiulus truncorum* (Silvestri, 1896), *Unciger foetidus* (C.L. Koch, 1838) (only ZR), *Brachyiulus pusillus* (Bosc, 1792), *Brachydesmus superus* Latzel, 1884 and *Polydesmus inconstans* Latzel, 1884 (only HH). The records of *C. parisiorum* and *G. alpinus* are the first published for North Rhine-Westphalia but are known to the authors from several other locations too.

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