

Environment and forest edges exploitation in northern France and Belgium during the Neolithic

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Summary: This synthesis of charcoal studies brings together 24 neolithic occupations in northern France and Belgium. The woody environment is quite similar all along the period. However, the variation of the percentage of Rosaceae species will be discussed even though in Hesbaye, their sudden arrival during the second part of the LBK has been interpreted as a consequence of human activities and forest edges management.

Key words: Neolithic, northern France, Belgium, forest edge, Rosaceae

INTRODUCTION

This work proposes a synthesis of charcoal analyses carried out in northern France and Belgium (Fig. 1), in order to study the woody environment during the Neolithic period (5500-2500 BC), as well as the development and the composition of forest edge.

Twenty four occupations, mostly habitat settlements, are taken into account (Table 1, Fig. 1). Charcoal fragments result mainly from domestic firewood. The unbalance between chronological periods and studied geographical areas reflects the lack of research on neolithic sites in northern France and Belgium (Table 1).

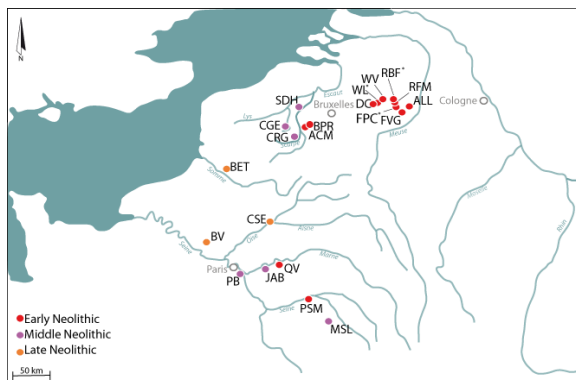


FIGURE 1. Location of the neolithic sites studied. See table 1 for abbreviations.

RESULTS AND PRELIMINARY DISCUSSION

The observation of the charcoal diagram (Fig. 2) shows the dominance of *Quercus* whereas the *Fraxinus* percentage is variable probably depending on the regional edaphic conditions. Hazelnut is present in all sites. *Ulmus* and *Tilia* appear more frequently during the Early Neolithic. This could be related to the decline of both species in the pollen diagram of the Hesbaye region, which has been correlated with the activities of the Bandkeramik people (Bakels, 1992: 16).

Fagus appears at the end of the Final Neolithic, which is a little bit earlier than the first mention in the synthetic pollen diagram of the Paris basin where the presence of *Fagus* is recorded since the second part of the Subboreal, around 3270±80 BP (Leroyer, 2006: fig. 4; see Leroyer *et al.*, in this volume).

	Abbr.	Settlement	Charcoal fgts	Bibliography	
EARLY NEOLITHIC	Pioneers (Hesbaye)	FPC	804	Salavert, 2010	
	RBF	Remicourt-En Bia Flo II	546		
	WL	Waremmе-Longchamps	308		
	WV	Waremmе-Vinave	316		
	AL	Ailleur	2030		
	ACM	Aubechies-Coron Maton	315	Salavert 2010	
	BPR	Blicquy-La Petite Rosière	465	Buydens, 1999	
	DC	Darion-Colia	3502		
	FPC	Fexhe-le-Haut-Clocher-Podri l'Cortri	1998	Salavert, 2010	
	FVG	Fexhe-le-Haut-Clocher-Voroux Goreux	811	Salavert, unpublished	
PSM	Pont-sur-Seine-Marnay	129			
RBF	Remicourt-En Bia Flo II	3142	Salavert, 2010		
RFM	Remicourt-Fond de Momalle	1425			
WL	Waremmе-Longchamps	3271			
MIDDLE NEOLITHIC	BI / VS/G	DC	1051	Buydens, 1999	
	MK	CGE	Carvin-Gare d'Eau	886	Salavert, unpublished
		CRG	Corbehem-Rue du Gouy	670	Dufraisse, unpublished
		SDH	Spierre-De Hel	1464	Buydens and Dambon in Vanmonfort <i>et al.</i> , 2001
	Chasséen	BV	Boury-en-Vauxin 1	259	Thiébault, 1991
		BV	Boury-en-Vauxin 2	150	
		PB	Paris-Bercy 1	4489	Pernaud, 1997
	NVI	PB	Paris-Bercy 2	162	
		JHC	Jablins-Le Haut du Château	2300	Solari in Bostyn <i>et al.</i> , 1992
		MSL	Mesnil-Saint-Loup-Les Vieilles Vignes	261	Salavert, unpublished
LATE NEO	SOM	BV	Boury-en-Vauxin	Thiébault, 1991	
	CSE	La Croix-Saint-Ouen-La Station d'Épuration	1658	Pernaud, 1997	
FINAL NEO	CSE	La Croix-Saint-Ouen-La Station d'Épuration	1891	Pernaud, 1997	
	BET	Bettencourt-Saint-Ouen			

TABLE 1. List of sites and cultures studied, number of charcoal fragments identified and main bibliographical references consulted for each of them.

The Rosaceae taxa (Maloideae, Prunoideae) appear at the second LBK period. The developing of such heliophilous species could be related to the opening of fields or pasture lands by the first farmers of Central Belgium and thus to human activities (Pernaud, 1997; Salavert, 2010). However, their absence in the pioneer charcoal assemblages and their brutal appearance may correspond to a particular exploitation and maybe the management of the edge forest for firewood, fruit gathering and fodder (Kreuz, 1992; Salavert, 2010). The percentage of Rosaceae varies and could indicate a difference in the degree of anthropization of the environment from site to site, and thus, the economic status of neolithic settlements (conclusions have to be

taken cautiously considering the preliminary nature of this work).

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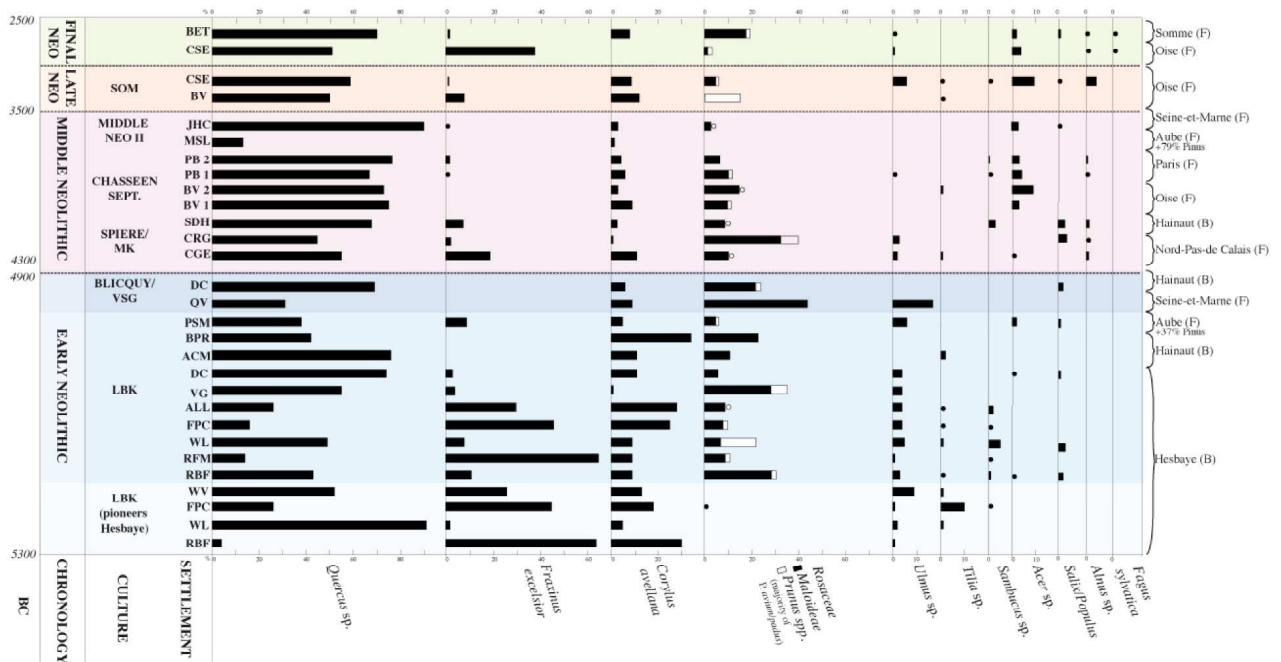


FIGURE 2. Simplified charcoal diagram of 24 neolithic occupations in northern France and Belgium (dots: <1%). Only main species identified are mentioned. Each colored stripe corresponds to a different chronological period. Inside the colored stripes, sites are potentially contemporaneous.